

# Town of Chichester

## New Hampshire

- KEY**
- Political Boundaries**
- Neighboring Town Lines
  - Chichester Town Line
  - Lot Lines
- Natural Resource Co-occurrence**
- 1 point
  - 2
  - 3
  - 4
  - 5
  - 6
  - 7 - 10
- Conservation & Public Lands \***
- Protected conservation lands
  - Town-owned properties
- Roads**
- 1393
  - Principal Arterials
  - Collectors
  - Local Roads
  - Other/Class VI Roads
  - Trails
  - Utility Lines
- Hydrography**
- Perennial
  - Seasonal
  - Lakes / Ponds / Rivers
  - Wetlands (NWI / USGS)
- Topography**
- Contours (20' interval)
- Other Features**
- Village, settlement
  - Summit
  - Fairgrounds
  - Campground
  - Cemetery
  - Gravel pit - active / inactive
  - Natural feature
  - School

\* Conservation & Public Lands:  
Only the lands displayed in dark green vertical  
s-hatch have permanent protection from  
development.

### DATA SOURCES

#### NH GRANIT Data



Most of the data displayed here represents stock data sets obtained in 2001 from the NH GRANIT database as maintained by the Complex Systems Research Center (CSRC) at the University of New Hampshire (UNH).

The New Hampshire Geographically Referenced Analysis and Information Transfer System (NH GRANIT) is a cooperative project to create, maintain, and make available a statewide geographic data base serving the information needs of state, regional, and local decision-makers. A collaborative effort between the University of New Hampshire and the NH Office of State Planning (OSP), the core GRANIT System is housed at the UNH Institute for the Study of Earth, Oceans, and Space in Durham. The GRANIT approach to a state-wide GIS depends upon the cooperative efforts of a host of agencies, collaborating on various elements of database design and construction as well as application development.

NH GRANIT and CSRC maintain a continuing program to identify and correct errors in these data. CSRC, OSP, SPNHF and the cooperating agencies and organizations make no claims as to the validity or reliability or to any implied uses of these data.

#### Other Data:

- Habitat Data: refer to the explanation on the separate habitat map.

- Roads derived from NH DOT roads layer (5/2002) and USGS digital line graph with assorted corrections and updates digitized from '98 GRANIT digital ortho-photo quads and as ID'd by Town of Chichester.

- Town-Owned Land: Parcels were identified by Town of Chichester and digitized by SPNHF using 2002 digital tax map file provided by S.E.A. Consultants, Inc.

- Gravel Pits: digitized by SPNHF from GRANIT digital USGS maps and/or '98 digital orthophotos.

- Cemeteries: digitized by SPNHF using Garmin GPS 12 data collected by conservation commission.

- Lot Lines: 2002 town tax map derived from data by S.E.A. Consultants, Inc.

### NATURAL RESOURCE CO-OCCURRENCE ANALYSIS

High-value natural resource areas can best be identified by creating a resource co-occurrence map. This is typically the final stage in a GIS-based natural resource inventory (NRI) and it is developed by overlaying the selected resource layers in the GIS to identify locations where multiple co-occurrences of those resources exist.

Co-occurrences are displayed on the map with a graduated color ramp where the darker shades represent resource-rich areas where multiple factors exist.

The co-occurrence model for the Town of Chichester's NRI included nineteen natural resource factors as well as two parcel-based factors. Each factor was assigned a value of 1-4 points. Refer to the small inset maps along the right side of the poster to see the spatial extents and point values of each of these nineteen resource factors.

Note that the large co-occurrence map displayed here reflects only the natural resource component of the co-occurrence model. The two parcel-based factors of parcel size and proximity (displayed in the inset maps on the lower right corner) were done separately and were not included in the analysis for the large map.

### CO-OCCURRENCE SUBTOTALS

The co-occurrence analysis generated a total natural resource co-occurrence score by adding the values of all nineteen natural resource factors. Subtotals were also calculated based on the contributions of the scenic resource, water resource, or habitat resource components of this total. The first two of the smaller inset maps displayed to the right represent subtotals for the habitat component and the water resource component.

**HABITAT SUBTOTAL =** Unfragmented Blocks + NWI Wetlands + Undeveloped Riparian Zones + Ridgeline Wildlife Corridors + Ridgeline Wildlife Passpoints + Steep Slopes > 25% + South Facing Slopes > 10% + 100' Wetlands Buffers + Agricultural Lands + Open Lands & Early Successional Habitat + Deer Yards

The darker green areas may be particularly important from the standpoint of protecting wildlife habitat.

**WATER RESOURCE SUBTOTAL =** Drinking Water Protection Areas + Gravel Aquifer + Potentially Favorable Gravel Well Areas + Sanitary Radii + Flood Zones

The darker blue areas are particularly important from the standpoint of protecting drinking water supplies

### PARCEL-BASED FACTORS

The two parcel-based factors included parcel size and parcel proximity to existing conservation lands or other town open space. These are displayed in the third and fourth inset maps on the far right corner.

#### PARCEL SIZE FACTOR

The third inset map to the right displays the larger parcels in darker shades of gray based on the following point values:

0-10 acres:	0 points
10-20 acres:	1 point
20-50 acres:	2 points
50-100 acres:	3 points
> 100 acres:	4 points

#### PARCEL PROXIMITY FACTOR

Parcels were also assigned a value of 0-3 points depending upon their proximity either to existing protected lands or to certain town-owned lands. The town-owned lands included in this analysis were the three larger open space parcels of Spaulding Lot, Main Street Fields, and Carpenter Memorial Park.

The darker red parcels shown in the inset map on the far right corner are particularly important from the standpoint of building onto and linking existing protected parcels with the goal of establishing larger contiguous blocks of protected land.

#### Map Disclaimer

This map is one of a series of maps that was produced as part of a town-wide natural resource inventory for the Town of Chichester. It is intended to be used for planning purposes only. Any representations of property lines on this map are one interpretation of available data and should not be construed as binding or conclusive evidence of ownership.



CHICHESTER  
CONSERVATION  
COMMISSION

## Natural Resource Co-occurrence Map

Prepared by the Society for the Protection of NH Forests - July 2003

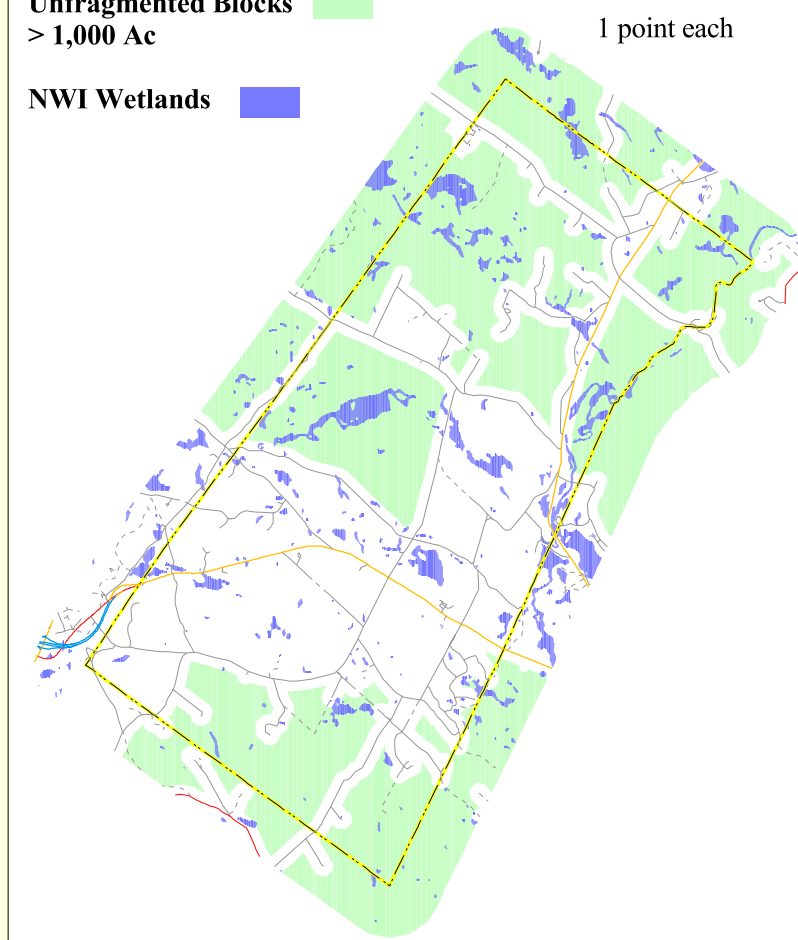
GIS Services, 54 Portsmouth Street, Concord, NH 03301  
(603) 224 - 9945 www.spnhf.org



### WILDLIFE HABITAT FACTORS - 1 point each

Unfragmented Blocks > 1,000 Ac 1 point each

NWI Wetlands

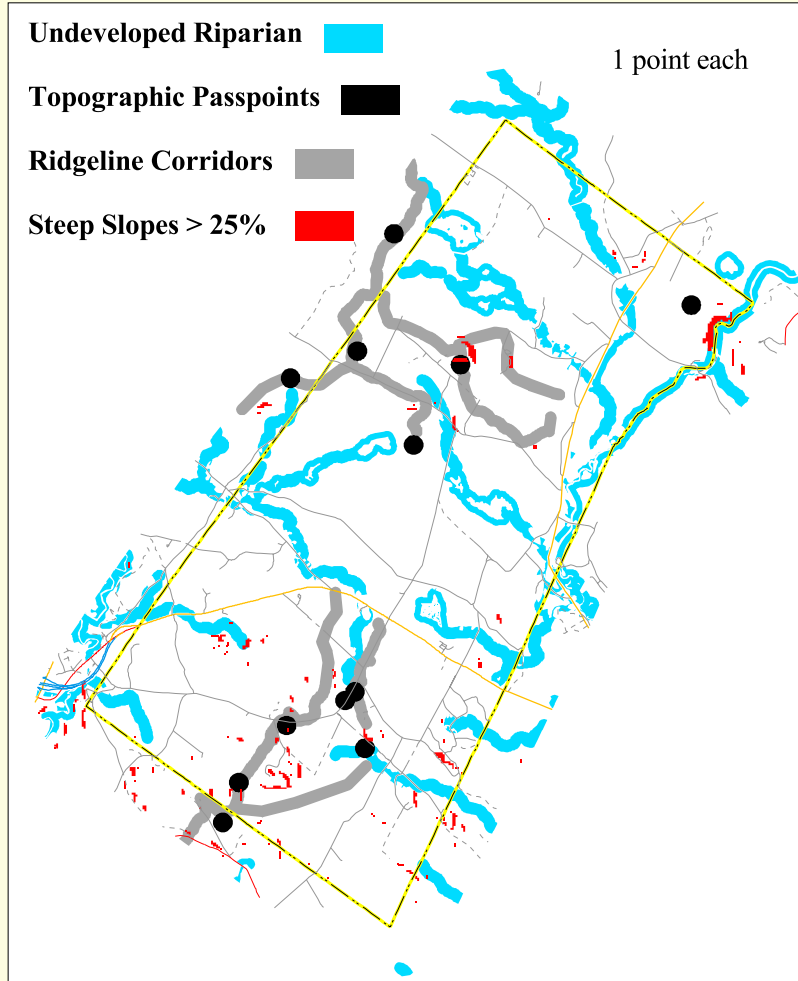


### Undeveloped Riparian 1 point each

Topographic Passpoints

Ridgeline Corridors

Steep Slopes > 25%



### NATURAL RESOURCE FACTORS

The six inset maps displayed in these two columns represent all nineteen contributing natural resource factors that were included in the Chichester co-occurrence model. The output of the co-occurrence analysis is displayed in the large map to the left.

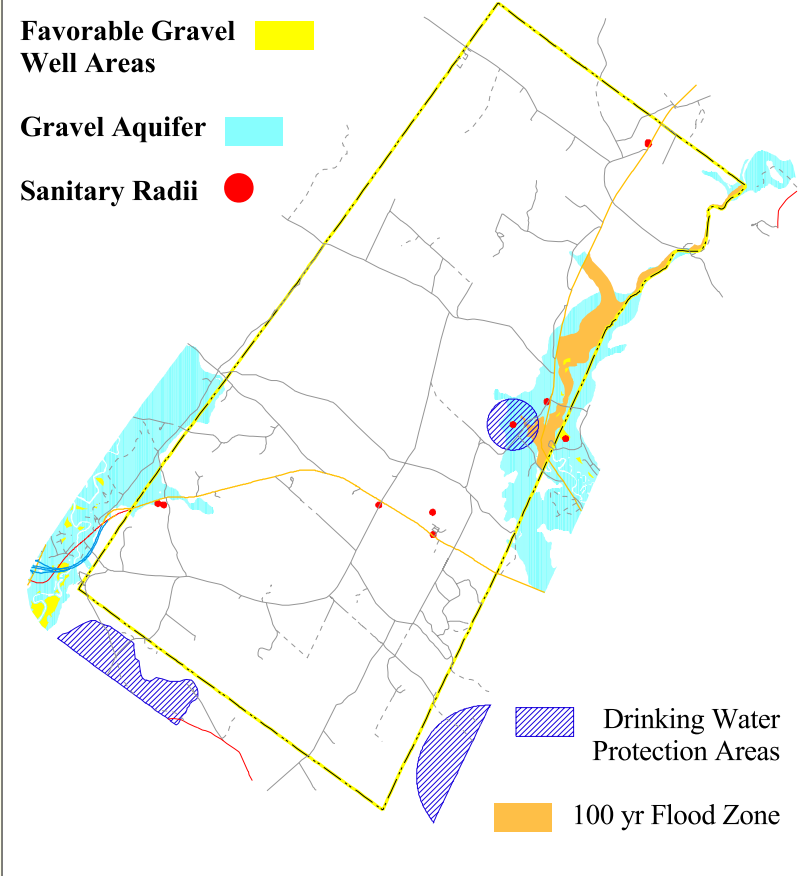
Two parcel-based factors, parcel size and parcel proximity, are displayed in the lower right corner but are NOT included in the "organic" resource co-occurrence analysis of the main map.

### WATER RESOURCE FACTORS - 1 point each

Favorable Gravel Well Areas

Gravel Aquifer

Sanitary Radii



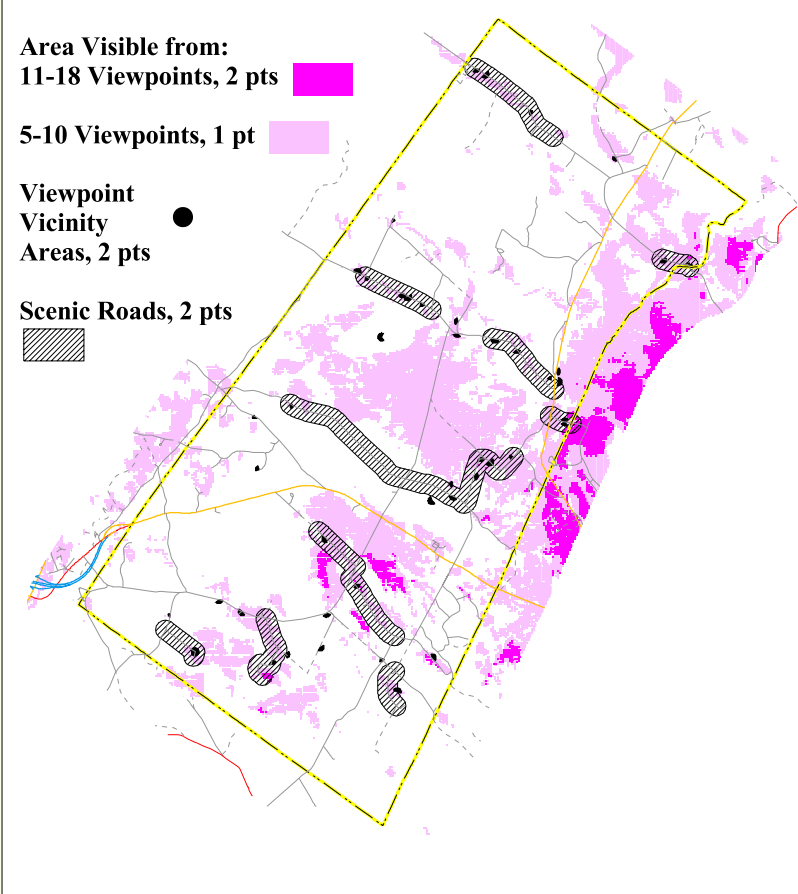
### SCENIC RESOURCE FACTORS

Area Visible from: 11-18 Viewpoints, 2 pts

5-10 Viewpoints, 1 pt

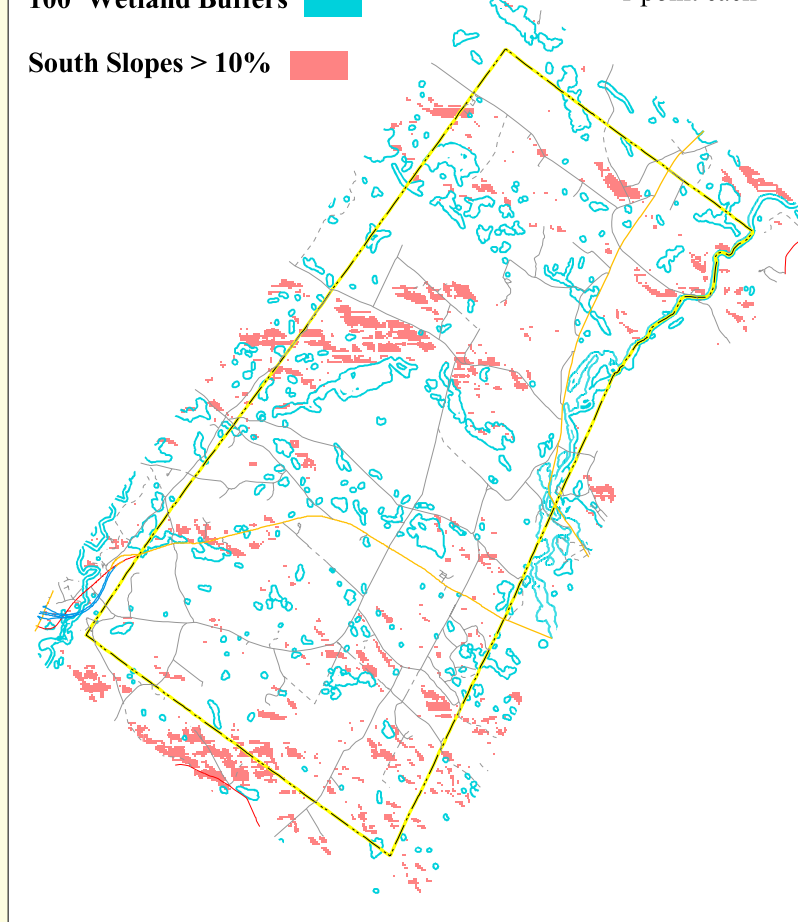
Viewpoint Vicinity Areas, 2 pts

Scenic Roads, 2 pts



### 100' Wetland Buffers 1 point each

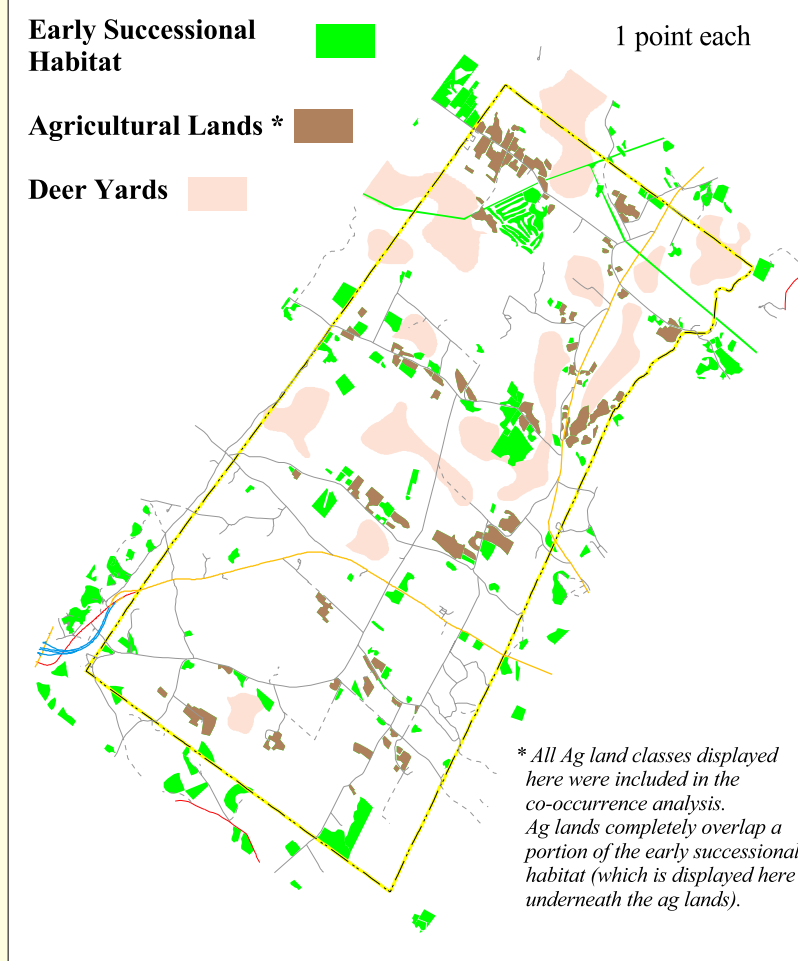
South Slopes > 10%



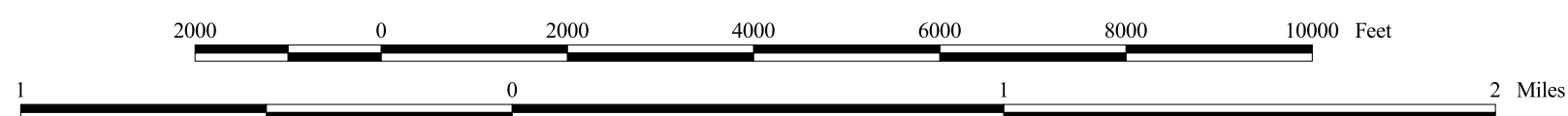
### Early Successional Habitat 1 point each

Agricultural Lands \*

Deer Yards



\* All Ag land classes displayed here were included in the co-occurrence analysis. Ag lands completely overlap a portion of the early successional habitat (which is displayed here underneath the ag lands).



### WILDLIFE HABITAT SUBTOTAL

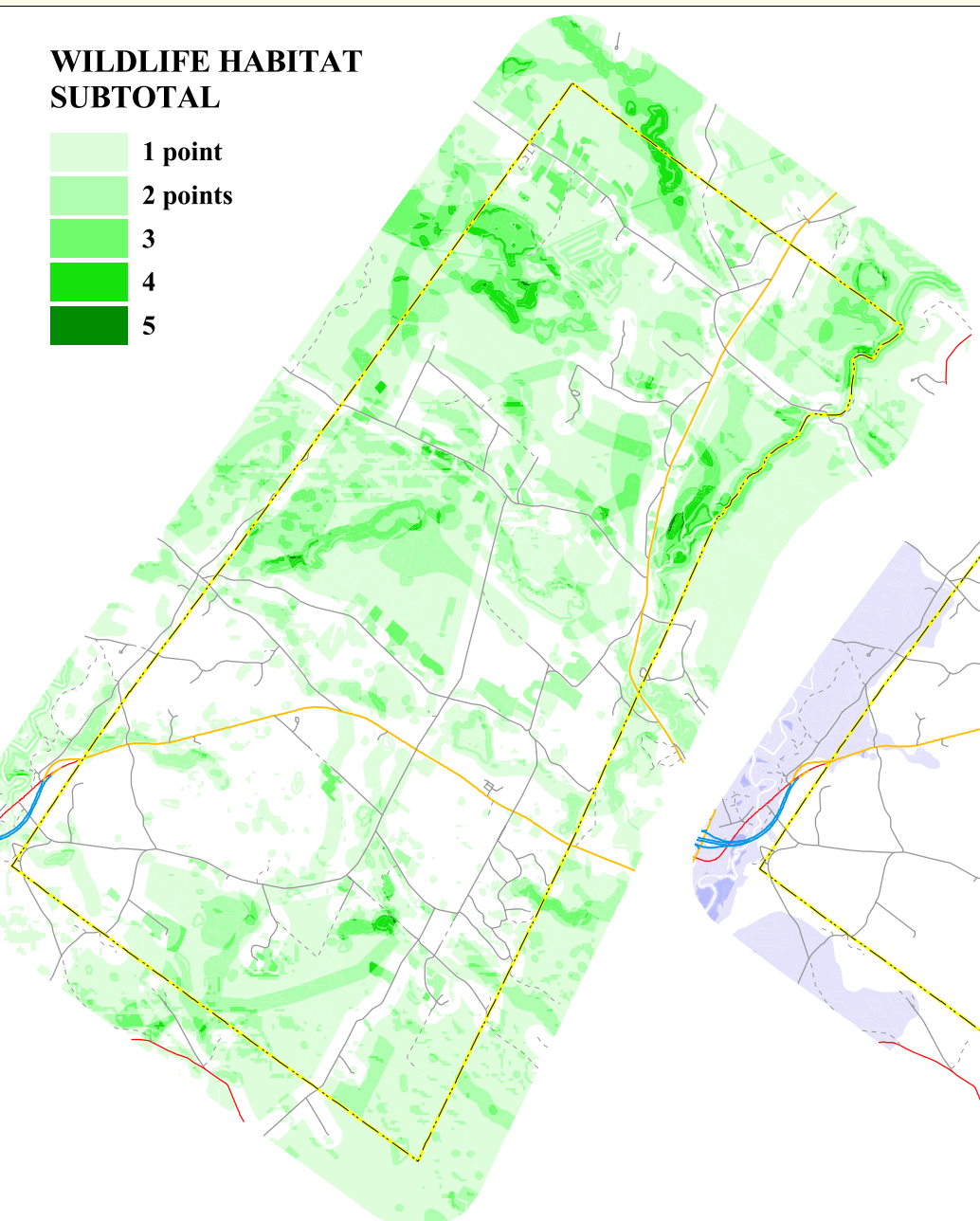
1 point

2 points

3

4

5

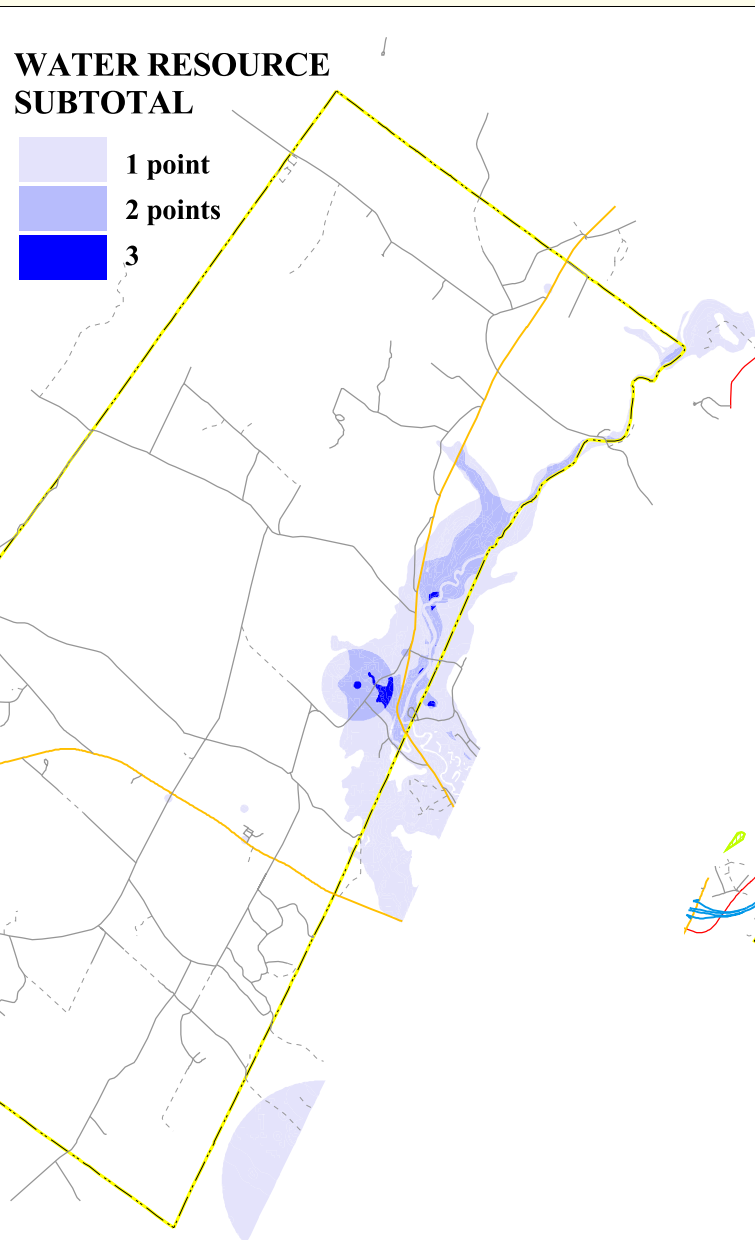


### WATER RESOURCE SUBTOTAL

1 point

2 points

3



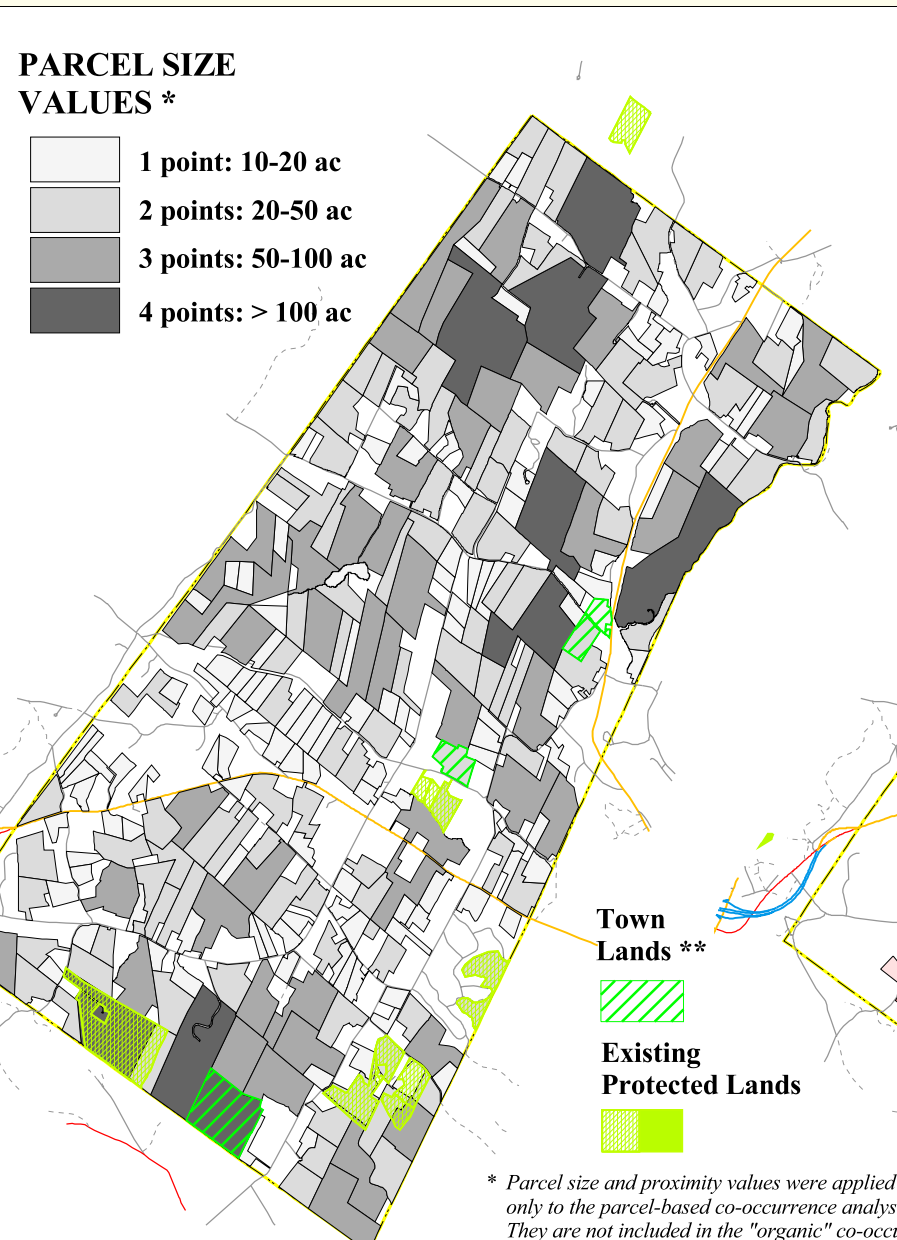
### PARCEL SIZE VALUES \*

1 point: 10-20 ac

2 points: 20-50 ac

3 points: 50-100 ac

4 points: > 100 ac

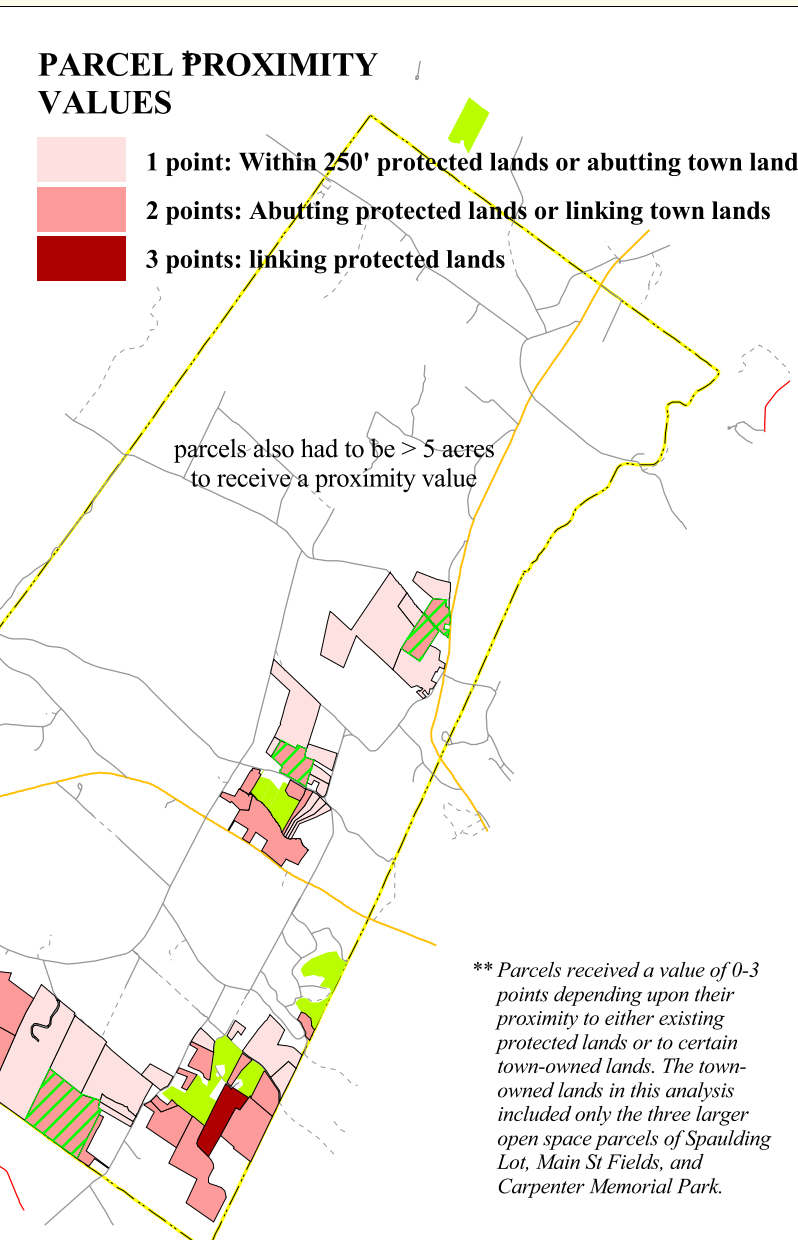


### PARCEL PROXIMITY VALUES

1 point: Within 250' protected lands or abutting town land

2 points: Abutting protected lands or linking town lands

3 points: Linking protected lands



\*\* Parcels received a value of 0-3 points depending upon their proximity to either existing protected lands or to certain town-owned lands. The town-owned lands included in this analysis included only the three larger open space parcels of Spaulding Lot, Main St Fields, and Carpenter Memorial Park.

\* Parcel size and proximity values were applied only to the parcel-based co-occurrence analysis. They are not included in the "organic" co-occurrence analysis (represented by the main map frame above).