

NEWTOWN

Buildout Analysis & Population Projections



JUNE, 2008

Future Growth in Newtown

Understanding Its Scope, Location, and Impacts

I. INTRODUCTION

The objective of this study is to provide an understanding of the magnitude of the town's residential growth potential and the varying impacts upon town government. It focuses on residential development because of the existing and potential magnitude of this land use – 90% of the Town is zoned for residential use. The primary tools for developing an understanding of growth and its ramifications are:

- A Buildout Analysis, utilizing the town's geographical information system, determined the current amount of vacant, developable land. The yield of new housing units possible on this land was then calculated, taking into consideration current zoning restrictions and natural resource constraints, including slopes, wetlands, and flood plains.
- Population Projections to the year 2030, prepared by H. C. Planning Consultants, Inc., were developed, including projections by age groups, so that the impact of changing demographics can be observed.
- A Benchmark Study compared Newtown with other towns that have achieved the projected buildout population of Newtown. This study gives a preview of the potential changes in a variety of governmental characteristics that Newtown may experience as its population continues to grow. Potential changes in staff and municipal expenditures are examples of benchmarks explored in this report.

II. METHODOLOGY

The Buildout Analysis calculates the maximum number of residential units that a town can accommodate at full development. The analysis includes maps and tables depicting existing and future growth of the town. The principal steps in developing the buildout include the following:

1. Create a Land Use Map by categorizing and mapping the current uses for each property. The purpose of this step is to determine the amount of vacant land that is available for residential development. The Land Use Map is in the Appendix.
2. Refine the Land Use Map by applying environmental constraints such as wetlands, flood plains, steep slopes, and water bodies. The Land Use Map with Environmental Constraints, showing areas of potential residential development, is in the Appendix.
3. Based on the amount of developable land, as shown on The Land Use Map with Environmental Constraints, calculate the number of new residential units possible under existing Zoning standards. Three calculations are completed in order to arrive at the buildout figure. The first calculation is a numeric calculation based upon zoning standards to determine the lot yield for a given property. This figure tends to be too high because of the irregular shapes of properties. The spatial analysis uses an approach that places units on a property and it tends to undercount possible units. The hybrid approach averages findings under the two previous methodologies and it is used as the final Buildout figure.

Population Projections for Newtown were prepared in three parts.

1. The total population of Newtown was projected using several different methods.
2. These projections were then averaged (excluding unusually low and high projections) to derive middle projections.
3. These middle projections were used as a 'control' total for projections of population by age and by sex.

The Population Projections also include an Appendix that gives approximations of future Newtown Public School enrollments.

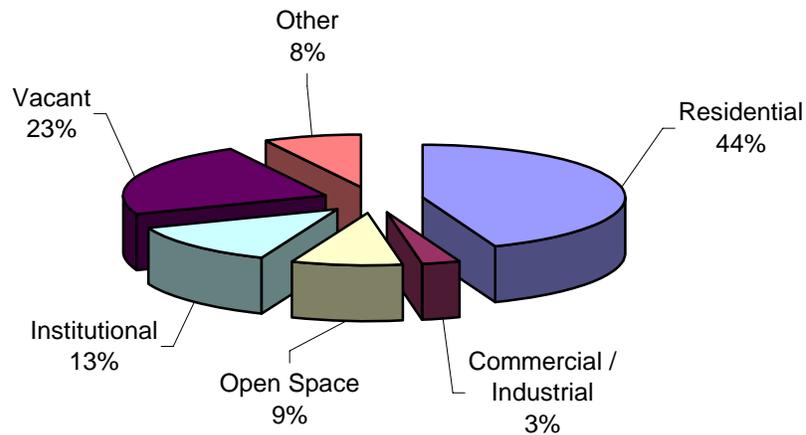
The Benchmark Study was done by collecting basic municipal data on Newtown and 2 comparable towns, Glastonbury and Trumbull. These current population of these towns approximated Newtown at buildout. After comparative data was reviewed, it was decided that Trumbull was a better fit for the study. Trumbull's current characteristics, in terms of percentages relative to Newtown, were then calculated/compared.

III. BUILDOUT ANALYSIS

Existing Development

- Newtown is approximately 77% developed.
- There are 33,885 acres zoned for residential development.
- Single-family residential development comprises that largest existing land use – 44% of the Town is devoted to this use.
- The second largest category, institutional use, comprises just short of 5,000 acres or 13% of the Town.
- The percentage of various land uses throughout the town is shown on the following chart.
- The “Other” Category includes primarily areas of roads, highways, and water bodies.
- “The Institutional” Category includes land owned by Newtown and the State of Connecticut.
- Newtown contains a total of 37,722 acres.

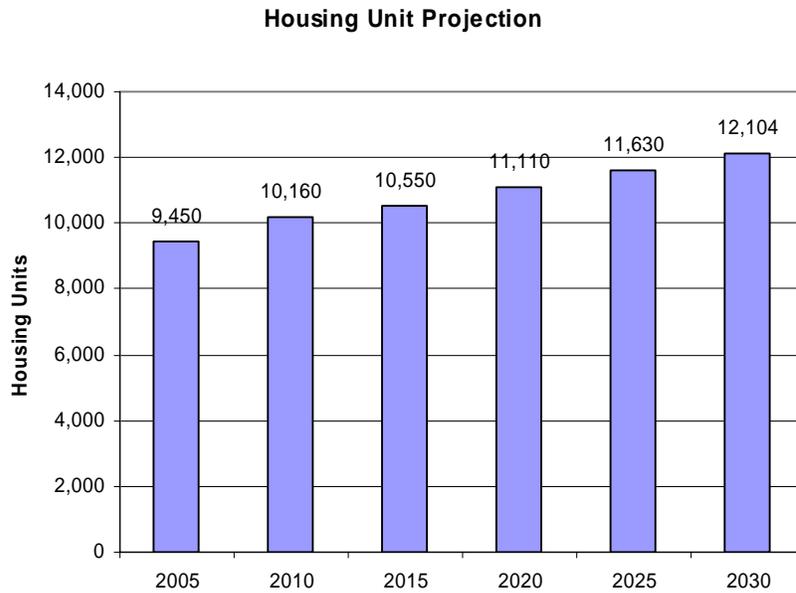
Existing Land Use in Acres



Future Development

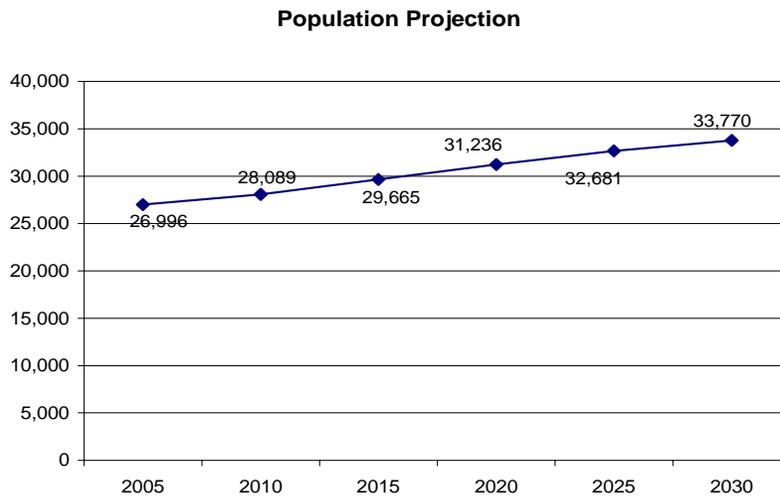
The map on page 5 highlights areas of future growth throughout the Town.

- An additional 2,435 housing units can be added at buildout.
- Currently there are 9669 units.
- At 2.79 persons/housing unit, the buildout population is estimated at 33,770.



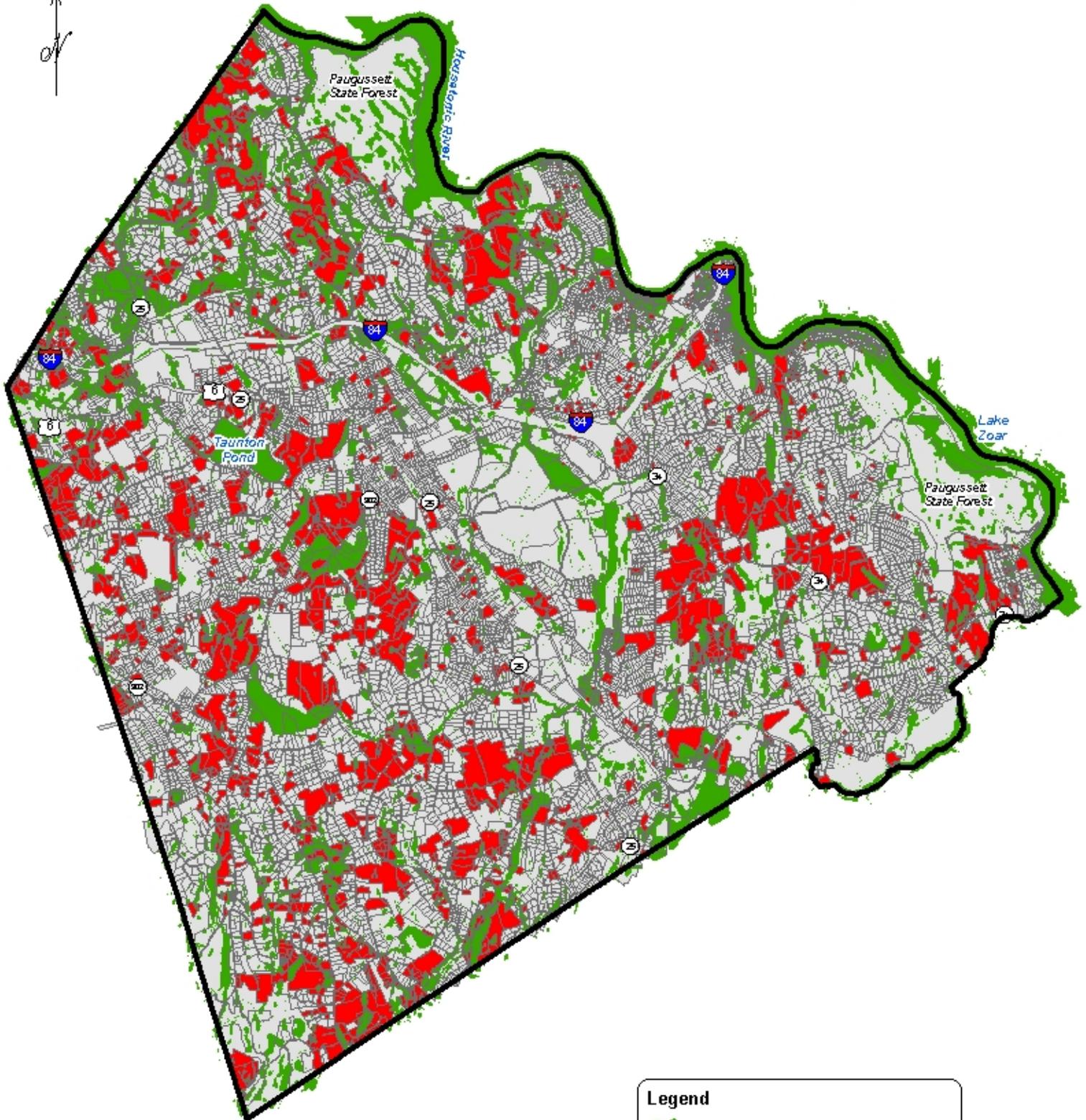
The buildout of housing units to 12,104 can be achieved by 2030.

The following chart shows the projected population trend. (See page 2-14 of HC Planning report, part 2 of this study.)



The buildout population of 33,770 can be achieved by 2030.

Newtown Potential Buildout Scenario



Legend

- Environmental Constraint
- Potentially Developable Parcels
- Developed / Committed / Non Residential Zone

5,000
Feet

Geography of Future Growth

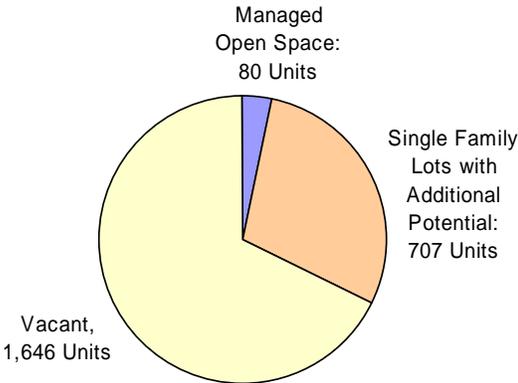
Figures on the amount of new residential growth are not especially instructive in and of themselves. However, considering growth in the context of different areas of Town adds a needed perspective. Additionally, projecting growth by functional areas can help departments plan for future workloads. This section of the report reviews growth on a geographical basis to include the following:

- Growth by Type of Land and Zone
- Growth by Sector – North, Southeast, Southwest
- Growth by Fire Districts
- Growth by Police Patrol Districts
- Growth by School Districts

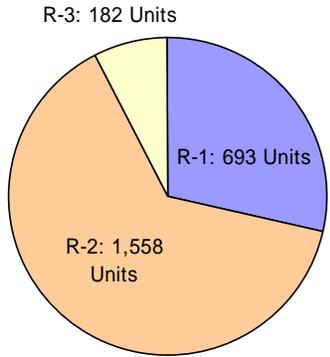
Geography of Future Growth by Type of Land and Zone

- The majority of new housing units will be developed on vacant land and on oversized existing residential lots. Managed open space will accommodate a very limited number of housing units.
- The R2 zone requiring 2-acre lots will accommodate the majority of new housing units.

Source of Future Residential Growth



Location of New Units by Zone



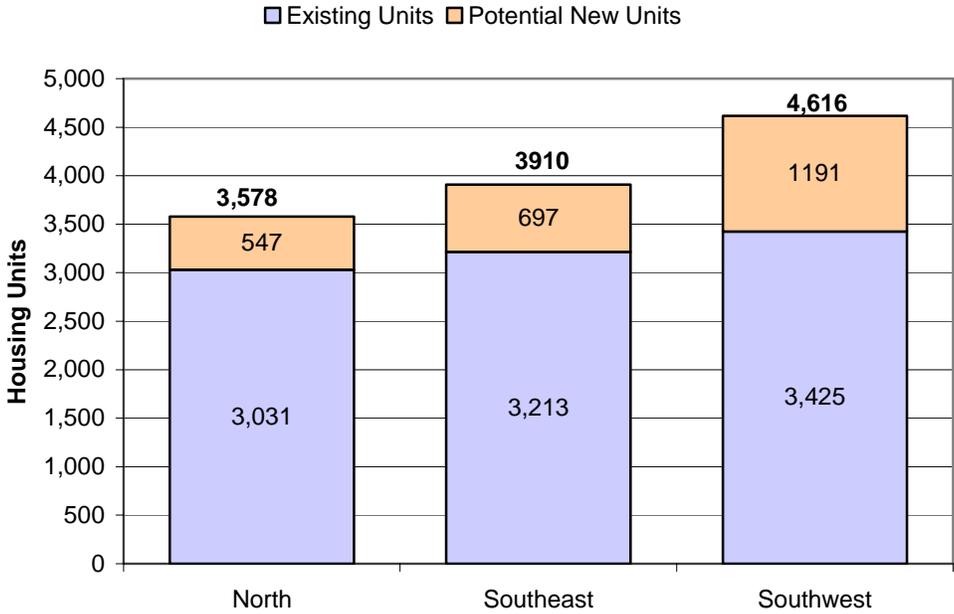
R1 - 1-acre zoning
 R2 - 2-acre zoning
 R3 - 3-acre zoning

Geography of Future Growth by Sector

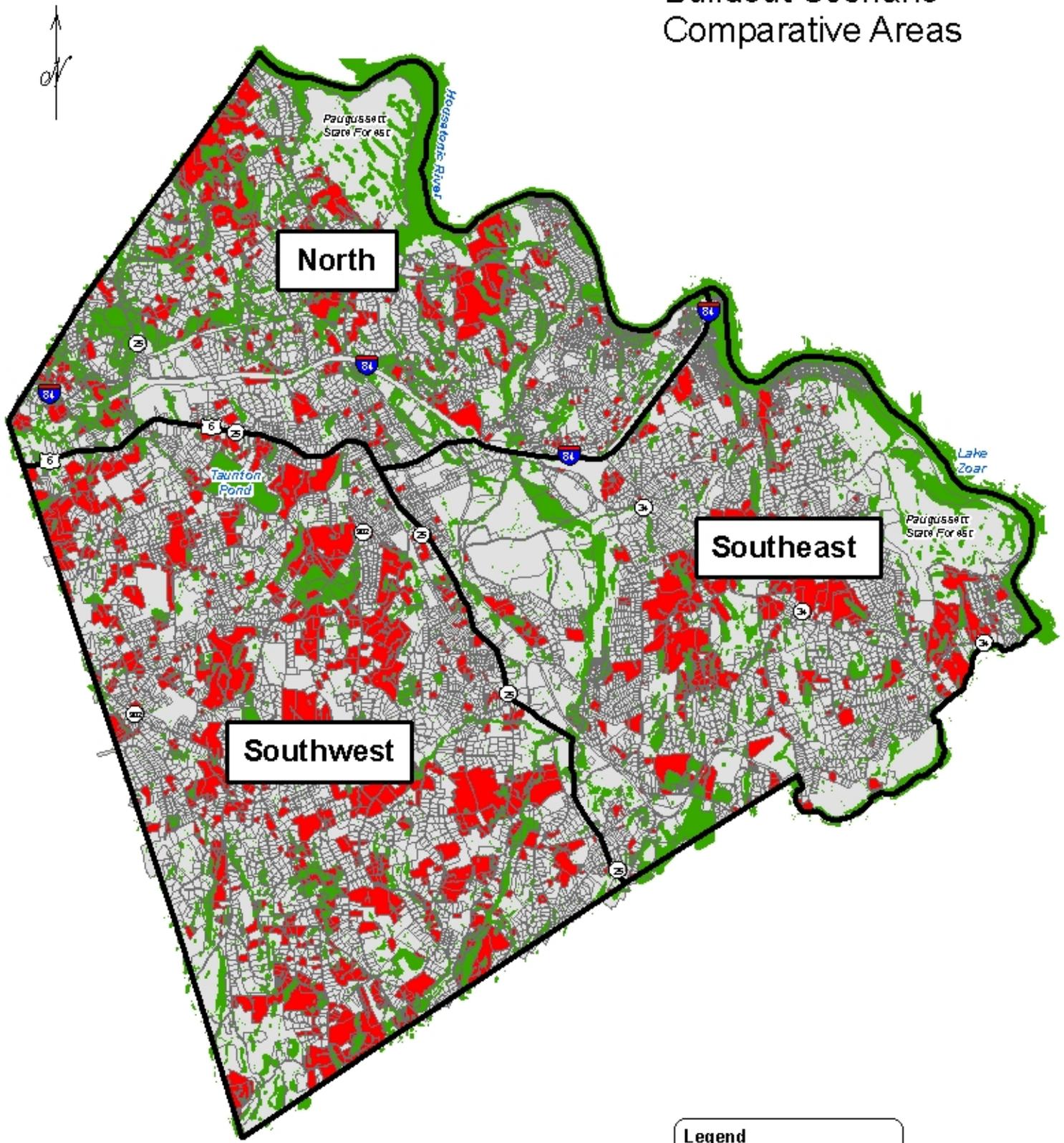
The map on page 8 divides the Town into 3 sectors of approximately equal area and provides a comparative context for Town wide growth.

- The area with the greatest potential for future development is the Southwest Sector. It can add 1,191 new units for a total of 4,616, a growth rate of 35%.
- The North Sector of Town has the least potential for growth, an additional 547 units, for a growth rate of 18%.
- The Southeast Sector can grow by 22%, adding 697 units for a total of 3,910.

Potential Growth by Sector



Newtown Potential Buildout Scenario - Comparative Areas



5,000 Feet

Legend

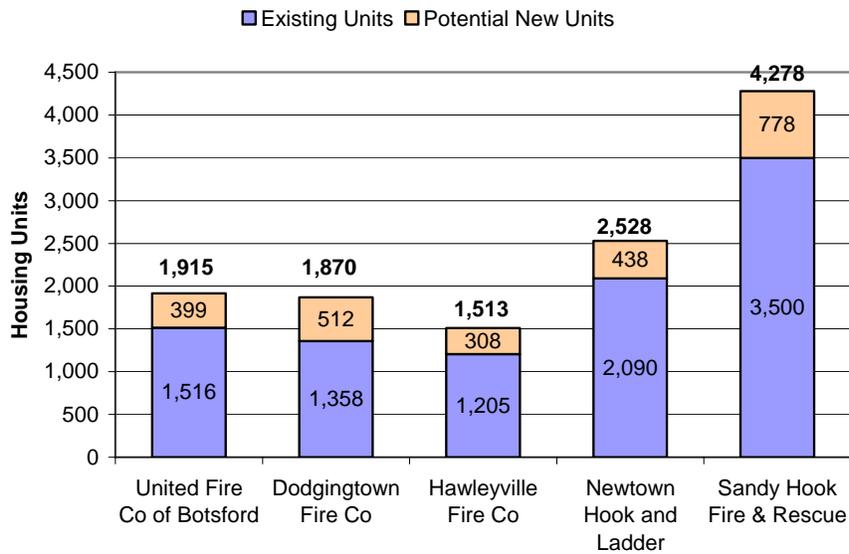
- Comparative Areas
- Potentially Developable Land
- Environmental Constraint

Geography of Future Growth by Fire District

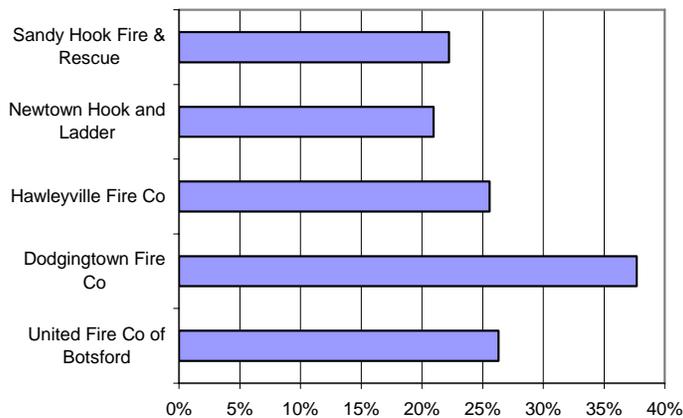
The map on page 10 highlights where growth will take place in each of the 5 fire districts.

- The Sandy Hook District will see the greatest increase, 778 new units. This district will continue to have a substantially greater number of units than other districts.
- Dodgingtown will experience the greatest percentage increase, 37.7 % or 512 units.
- Hawleyville will gain the smallest number of units and will continue to be the smallest district in terms of total units.

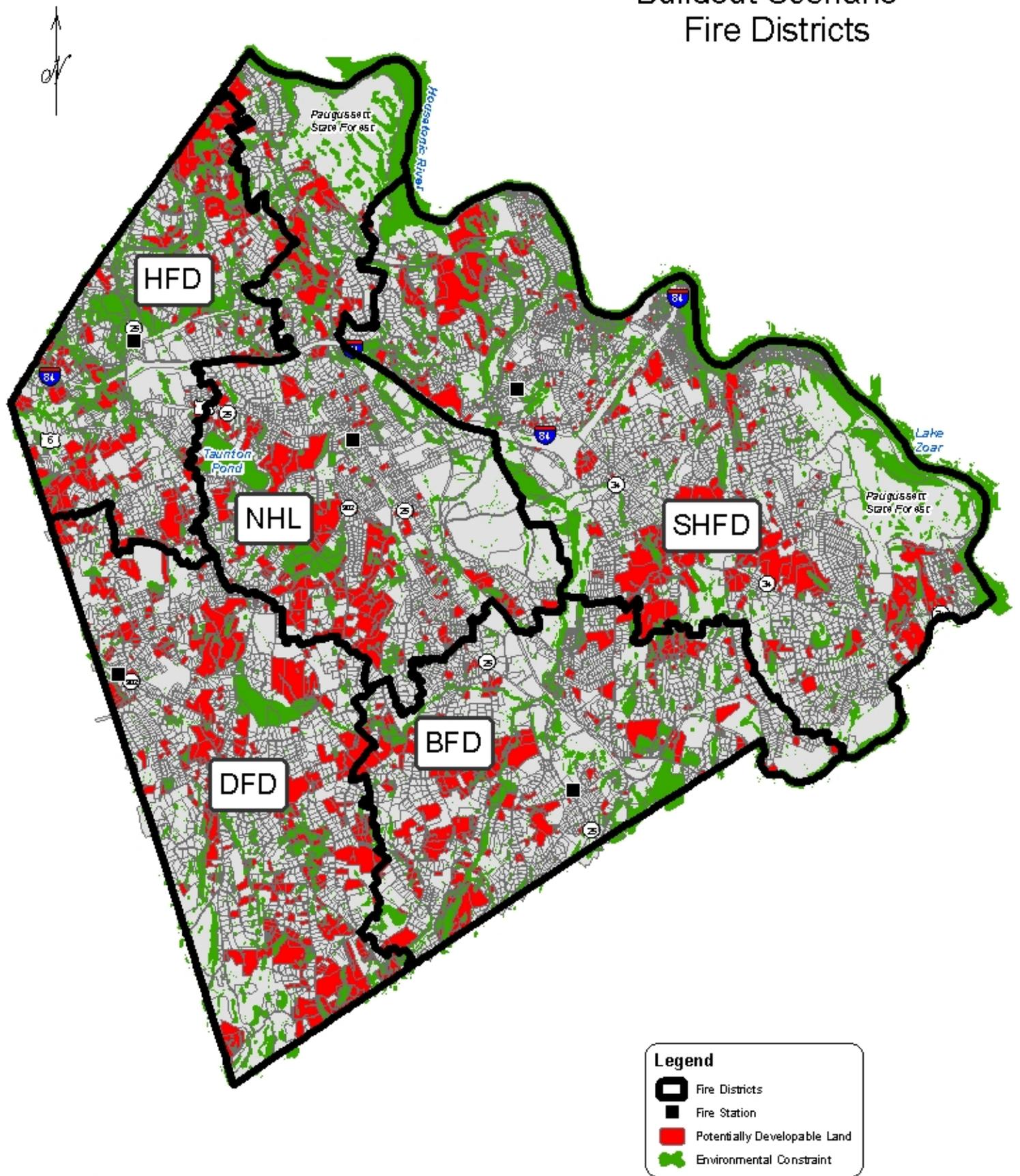
Potential Growth by Fire District



Percentage Growth by Fire District



Newtown Potential Buildout Scenario - Fire Districts



Legend

- Fire Districts
- Fire Station
- Potentially Developable Land
- Environmental Constraint

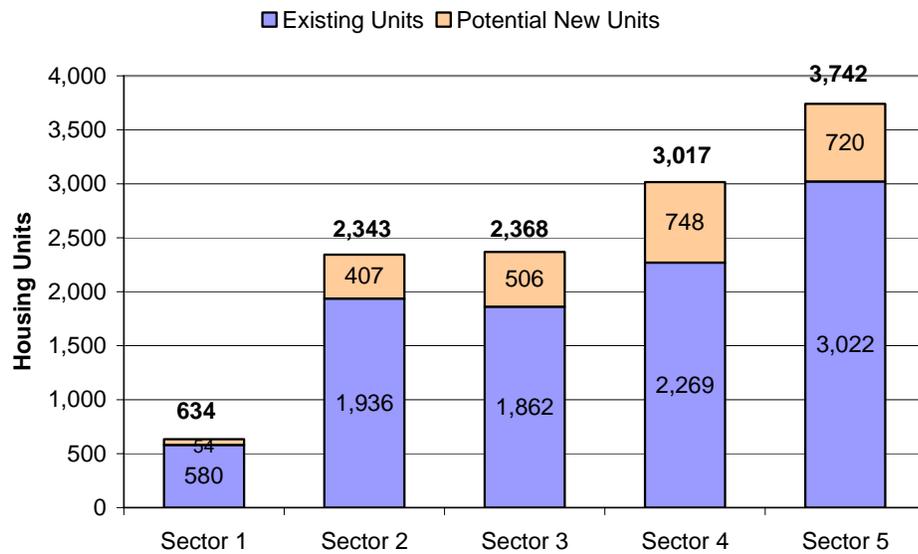
5,000 Feet

Geography of Future Growth by Police Patrol Sector

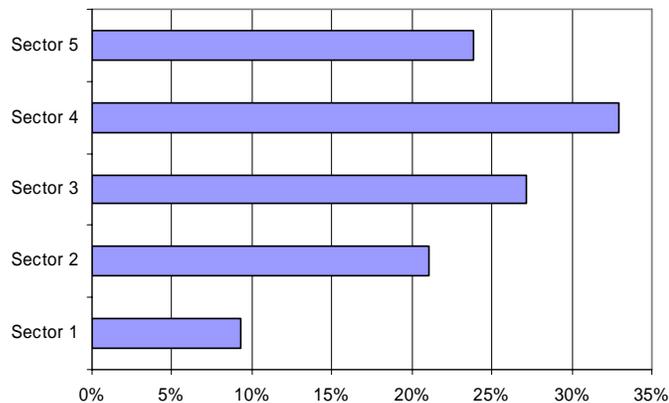
The map on page 10 highlights where growth will take place in each of the 5 police patrol sectors.

- Patrol Sectors vary greatly in terms of the number of units at buildout. Patrol Sector 5 will have almost 6 times as many units as Sector 1.
- The southeast corner of Sector 4 contains developable land that is furthest from the Police Department.
- Sector 5 has a significant number of larger properties with the potential for 20+ lots.

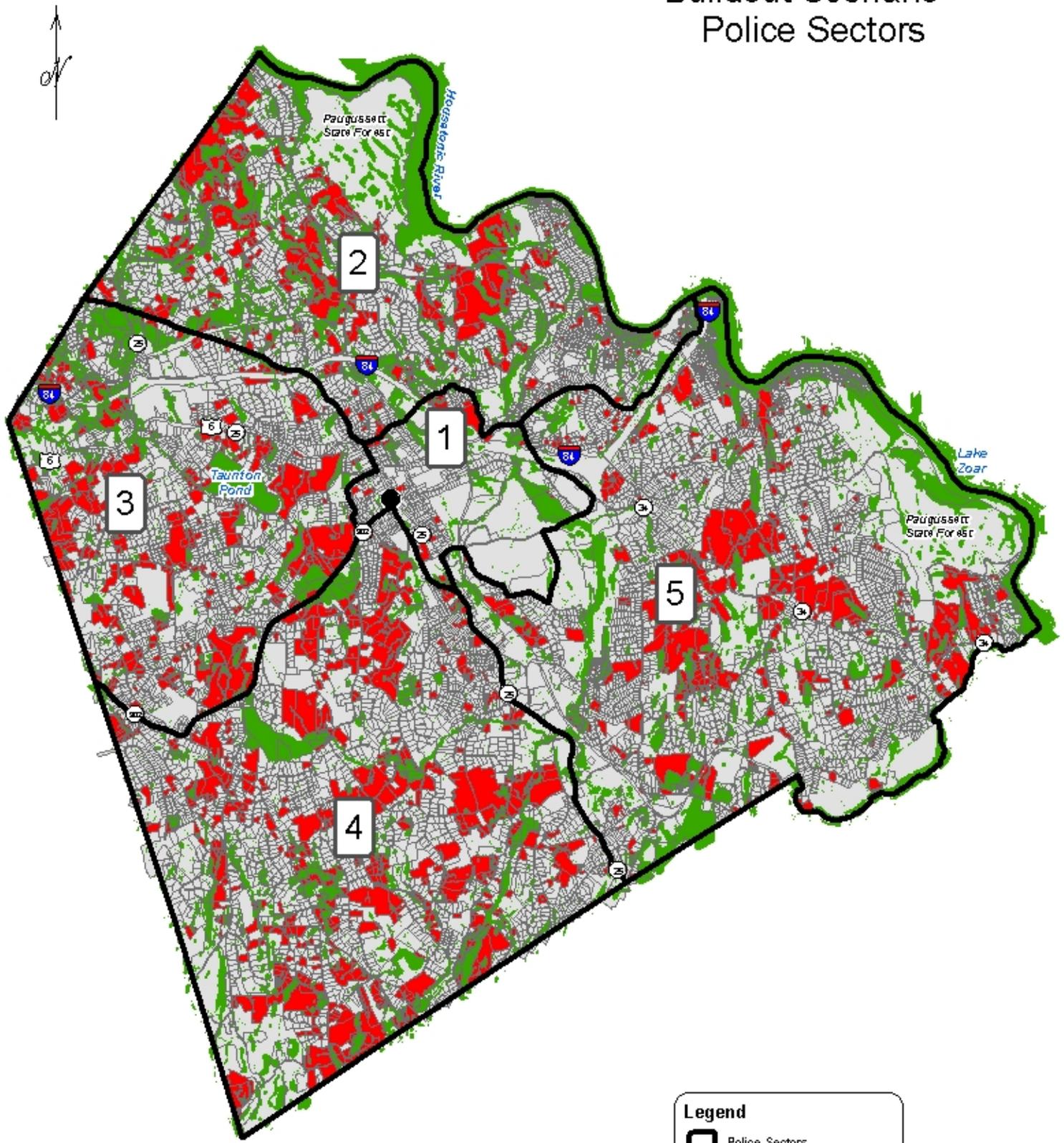
Potential Growth by Police Sector



Percentage Growth by Police District



Newtown Potential Buildout Scenario - Police Sectors



5,000 Feet

Legend

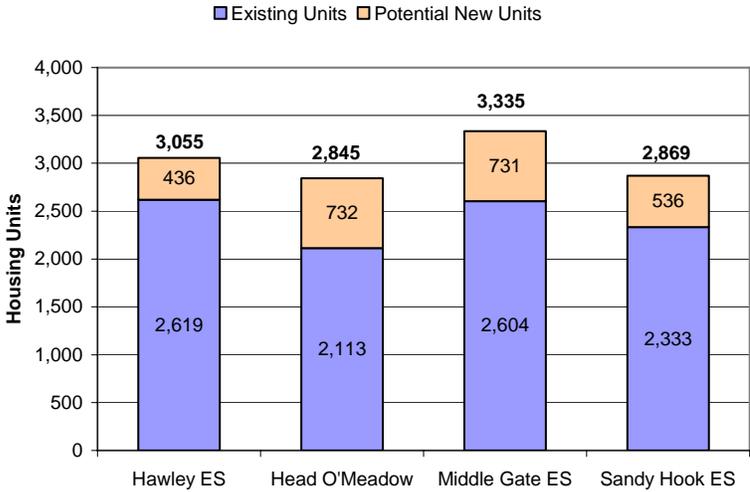
- Police Sectors
- Police Station
- Potentially Developable Land
- Environmental Constraint

Geography of Future Growth by School District

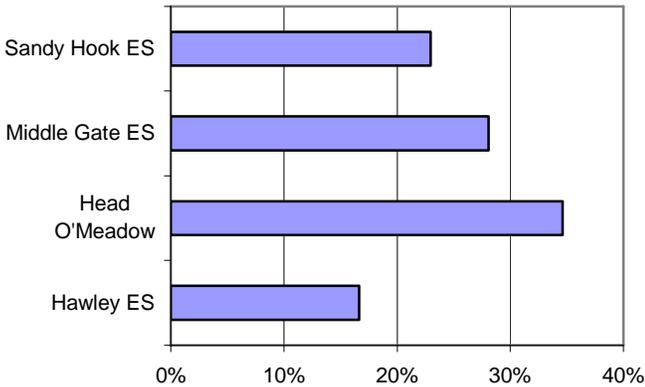
The map on page 12 highlights where growth will take place in each of the 4 school districts.

- Middle Gate will experience the greatest increase in housing units.
- Hawley will experience the smallest increase but overall will be the 2nd largest in terms of total units.
- The spread between the smallest and largest districts will be approximately 500 units at buildout, about the same as exists today.

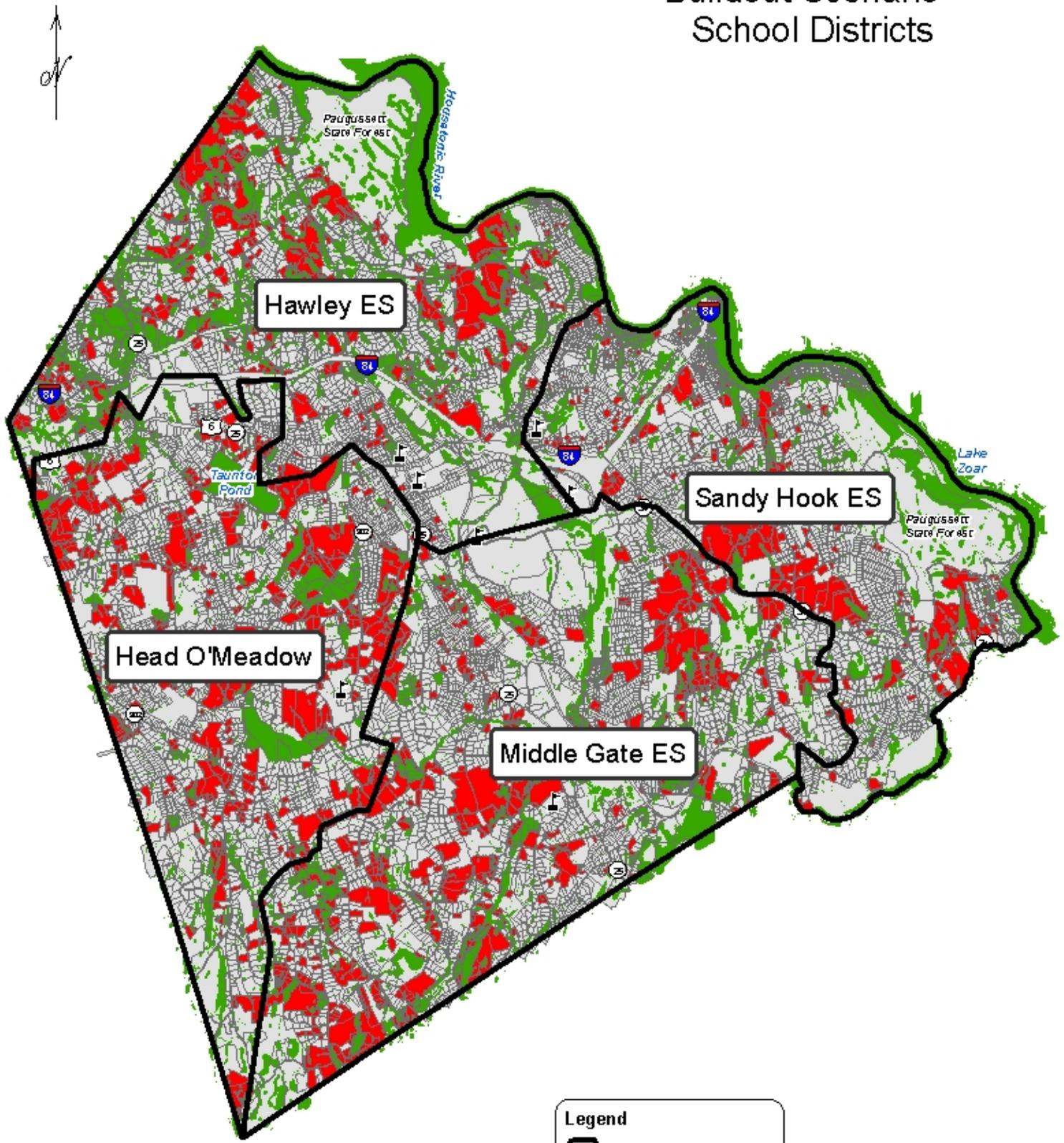
Potential Growth by School District



Percentage Growth by School District



Newtown Potential Buildout Scenario - School Districts



5,000 Feet

Legend

- School Districts
- School
- Potentially Developable Land
- Environmental Constraint

IV. BENCHMARK STUDY

Purpose and Approach

The Benchmark Study seeks to give insights into the dynamics of growth by comparing various characteristics of Newtown with those of another municipality that has grown to the point where its population is comparable to Newtown at buildout. Trumbull was chosen on the basis of the following similar characteristics:

- Trumbull's current population (35,678) is comparable to what Newtown's will be at buildout (33,773).
- They are both located relatively close to a central city.
- They both have direct access to an interstate highway.

Additionally, the two towns are similar in the following respects:

Characteristic	Newtown	Trumbull
Persons/Household	2.79	2.78
% Single Family	94.50%	92.40%
School Enrollment as % of Population	19.40%	19.40%
Per Capita Tax	\$2,929	\$2,880
Equalized Mill Rate	13.99	13.85

- Per Capita Tax varies by only \$49.
- The equalized mill rate is almost identical for Trumbull and Newtown.

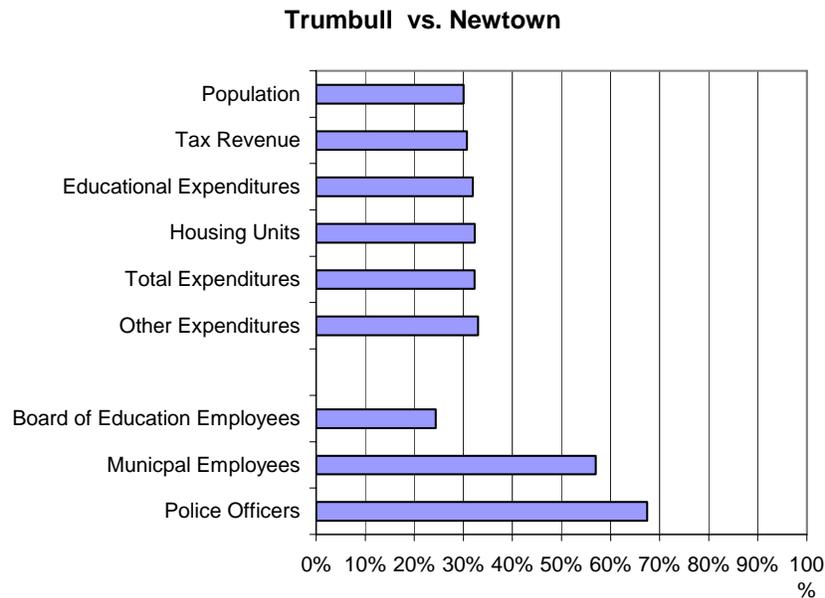
Assumptions

Increases in population will cause increases in governmental services, revenues, etc. Some such increases will be proportionally equal to population increases, i.e., a 10% increase in population will cause a 10% increase in housing units. Some increases may be proportionately lower or higher than population growth.

Trumbull's current population is 30% greater than Newtown's current population. Thus, among other observations, we will point out instances where the comparable data varies significantly from the "norm" of 30%. (Numerical values for various characteristics are contained in the Appendix.)

Comparisons

The following chart plots percentages by which Trumbull exceeds Newtown for specified characteristics.



Observations

- The relative percentage increases in Tax Revenue, Total Expenditures, Educational Expenditures, and Other Expenditures for Trumbull are consistent with a 30% population increase.
- The relative increase in Municipal Employees for Trumbull is significantly higher than population increases.
- The relative increase in Police Employees for Trumbull is significantly higher than population increases.
- The relative change in the number of Board of Education Employees is less than population increases.

V. POPULATION PROJECTIONS

Part 2 of this report contains Population Projections as prepared by H.C. Planning Consultants, Inc. Significant findings of the report are as follows:

- It is projected that Newtown's total population will increase by 35.6% over the 30 years between 2000 and 2030, adding approximately 8,900 persons.
- The buildout population of 33,770 could be realized by 2030.
- The most significant demographic change will be the increase in the 65+ population. This age segment will almost double by 2030, increasing from 2822 in 2010 to 5,558 in 2030.
- Between 2000 and 2030, there will be a 22% growth in preschool age children (0-5) and moderate growth in elementary, middle, and high school age children.
- College age population will remain more or less at the level of 1,000 persons during the 2010 to 2030 period.
- The young labor force (20-44 years old) is projected to increase by 19% during the 2010 – 2030 period, going from 8,756 to 10,479.
- The mature labor force (45 to 64 years old) is projected to increase very slightly, from 8,431 in 2,010 to 8,462 in 2030.

The report prepared by HC Planning Consultants, Inc. also includes an appendix reporting on future K-12 Newtown Public School enrollments. The tentative enrollment approximations indicate that there will be a moderate decline or no substantial enrollment change until 2015-2020; however, enrollments will begin to increase after 2015-2020.

Appendix

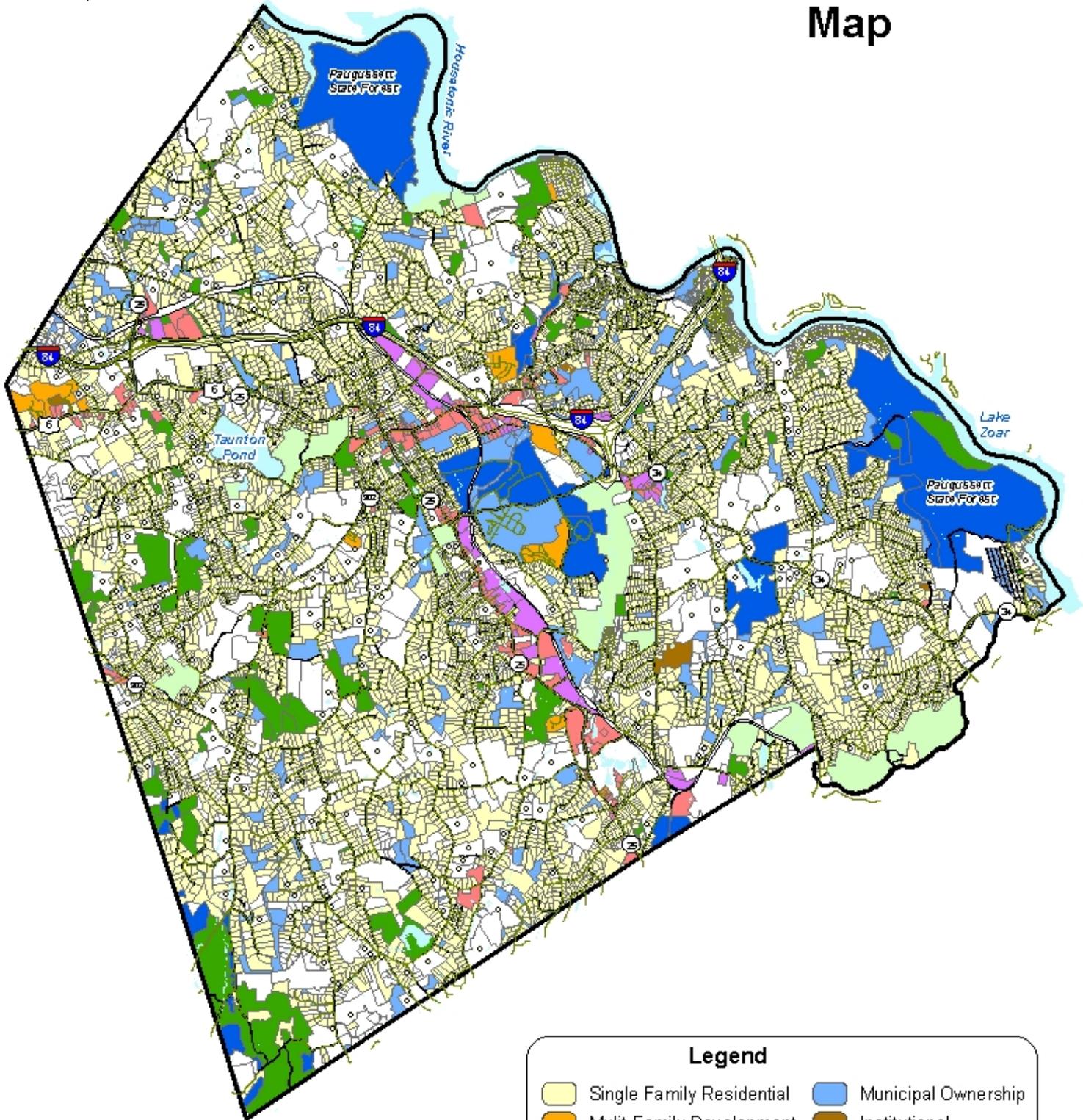
Land Use Map

Land Use Map with Environmental Constraints

Benchmark Data



Land Use Map

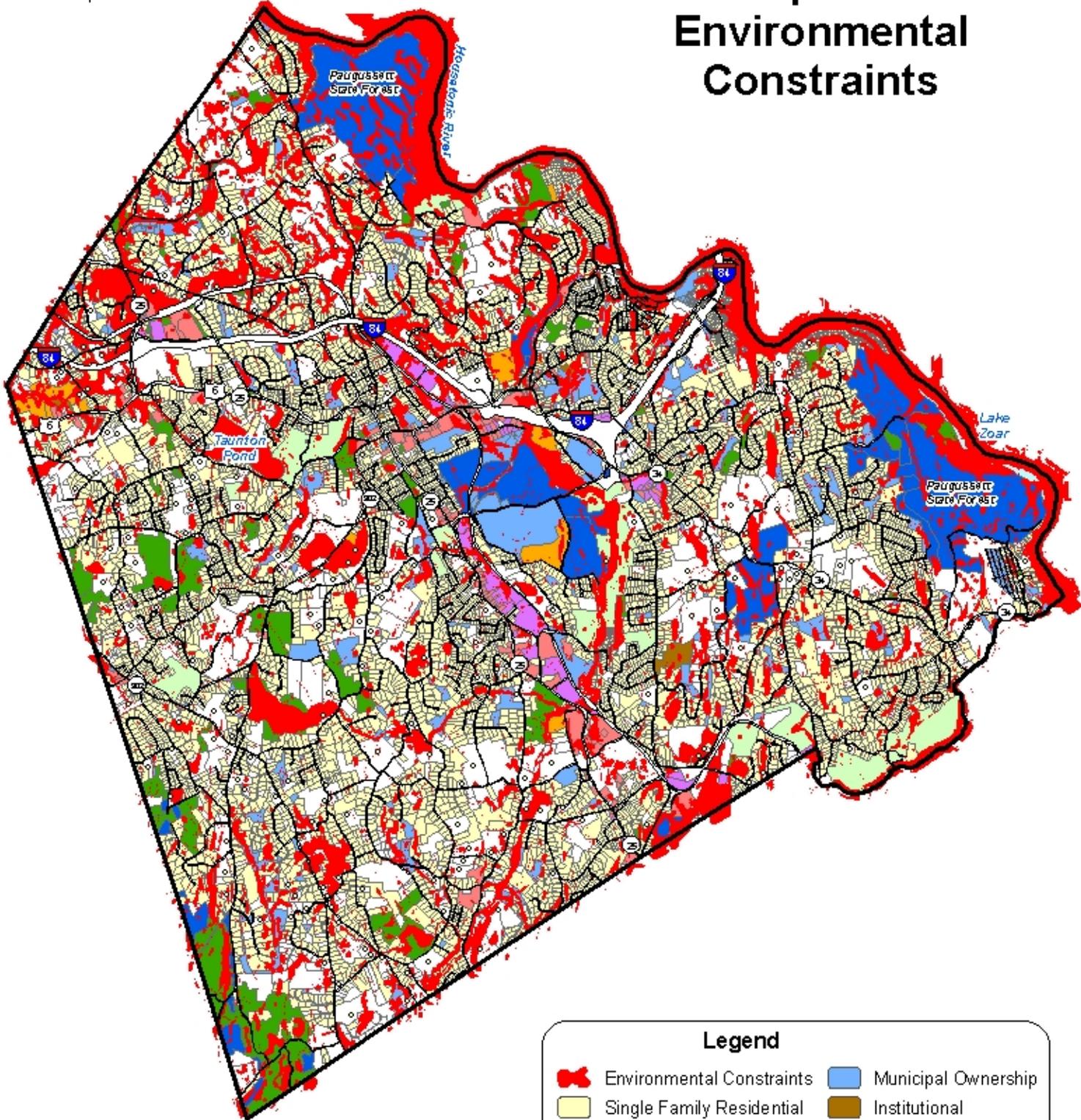


5,000 Feet

Legend

Single Family Residential	Municipal Ownership
Multi-Family Development	Institutional
Commercial	State Ownership
Industrial	Utility
Dedicated Open Space	Vacant
Managed Open Space	Water

Land Use Map with Environmental Constraints



Legend

Environmental Constraints	Municipal Ownership
Single Family Residential	Institutional
Multi-Family Development	State Ownership
Commercial	Utility
Industrial	Vacant
Dedicated Open Space	Water
Managed Open Space	

5,000 Feet

BENCHMARK DATA – NEWTOWN, TRUMBULL, GLASTONBURY

Characteristic	Newtown 2008	Newtown 2030	Trumbull 2008	Glastonbury 2008
Land Area square miles	60.2	60.2	23	51
Population	27,430	33,770	35,680	33,100
Existing Housing Units	9,670	12,000	12,800	13,460
% Single Family	94.50%	94.50%	92.40%	82.80%
Enrollment as % of population	19.40%		19.40%	20.44%
Total School Enrollment	5,668		6,921	6,766
Educational Expenditures	\$58,894,570		\$77,699,931	\$68,918,220
Bd. of Education Employees - Teachers	372		460	469
Bd. of Education Employees - Administrators	18		25	34
Tax Revenue	\$91,438,830		\$119,523,299	\$117,694,221
Per Capita Tax	\$2,929		\$2,880	2,921
Total Expenditures	\$91,146,093		\$120,594,190	\$113,714,690
Other Expenditures	\$32,251,523		\$42,894,259	\$44,795,691
Equalized Mill Rate	13.99		13.85	16.95
% Grand List Commercial	8.40%		12.80%	12.40%
Municipal Employees	172		270	245
Full Time Fire Dept. Employees	0		0	2
Police Officers	43		72	59
Police Other	15		10	15
Fire Dept, Full Time	0		0	2