Wayside District Vision Plan

PREPARED FOR

Marlborough
ECONOMIC DEVELOPMENT CORPORATION

PREPARED BY

VHB Vanasse Hangen Brustlin, Inc. in association with RKG ASSOCIATES INC

APRIL 2013

Appendices

A Zoning Diagnostic

B Commercial and Residential Market Assessment

C Draft Zoning Considerations

D Preliminary Funding and Cost

Appendix A
Zoning Diagnostic

Transportation
Land Development
Environmental
Services

VHB *Vanasse Hangen Brustlin, Inc.*

101 Walnut Street
P. O. Box 9151
Watertown, MA 02471-9151
617 924 1770
FAX 617 924 2286
www.vhb.com

Memorandum

To: Tim Cummings
Marlborough Economic Development Corporation
Marlborough, MA

Date: August 16, 2012

Project No.: 12088.00

From: Ralph Willmer, FAICP

Re: ***Draft*** Route 20 East Zoning Diagnostic

The Route 20 East corridor in Marlborough is an approximately 1.3 mile stretch of roadway that starts just west of the intersection with Farm and Wilson Roads to the city limits along the border with Sudbury. The corridor comprises a wide range of land uses including residential development with single-family houses on small lots to big box retail. There are several zoning districts within the study area that include Residence A-1, Rural Residence, Business, and Limited Industrial. A review of the Marlborough Zoning Ordinance was conducted to identify the uses allowed in each of these zoning districts by right or with a special permit.

From the easternmost section of the study area on the Sudbury border heading west, the area is generally characterized by smaller commercial and office uses built along Rt. 20. These include small strip malls and some automotive uses. Larger buildings such as Raytheon's headquarters, big box retail buildings including Staples, Home Depot and Target, and public facilities such as the wastewater treatment plant and the transfer station are located in the western half of the study area. Additionally, some retail strip development and multi-family residential buildings can be found on this stretch of the corridor. Single-family homes are set back from Route 20, but within the study area, particularly to the south of the corridor along Dicenzo Blvd.

The purpose of this memorandum is to outline the key provisions of the Marlborough Zoning Ordinance as it relates to the Route 20 East Corridor. Once the economic and market study and other tasks have been completed, an assessment of the land use regulations will build on this work to consider potential zoning and design recommendations necessary to implement the recommendations of the corridor study.

Although the ordinance does not include descriptions of the zoning districts, the following will summarize the type of zoning designation based on a summary of the use regulations and the dimensional standards.

- Residence A-1, which is confined to a small section of the study area north of Route 20 and along Wilson Road, is primarily a single-family residential zoning district with half acre minimum lot sizes.

- Rural Residence, which is located along the border with Sudbury and the northern extent of the study area, is also a single-family residential zoning district with a one acre minimum lot size.
- Business, which is the predominant zoning district directly on the Route 20 corridor, is a typical business district that allows a variety of commercial and office uses, as well as multi-family dwellings.
- Limited Industrial, which is the zoning district located south of Route 20 on the eastern portion of the study area, is essentially where Raytheon is located. A variety of industrial and commercial uses are permitted in this district.

Details regarding specific uses allowed in each district, along with associated dimensional standards, are outlined below.

Use Regulations

The Table of Use Regulations (§650-17) identifies the uses that are allowed as of right, by special permit, or not allowed. The following table outlines the major uses allowed as of right (Y) or by special permit (SP) for the four zoning districts within the study area. This is an abbreviated list of land uses and business types, and represents a compilation of land use types in a summary form. The uses listed are those that are the significant land uses for each district and would likely have some impact on future trip generation. It also does not include land uses that bear little relevance to the purposes of the corridor study (i.e. customary home occupations).

Land Use	Residence A-1	Rural Residence	Business	Limited Industrial
Residential Uses				
• Single-family	Y	Y		
• Comprehensive developments[1]	Y	Y	Y	Y
• Bed & breakfast		Y		
• Open space development	SP	SP		
Business Uses				
• Retail sales <75,000 sq. ft.			Y	SP
• Retail Sales > 75,000 sq. ft.			SP	SP
• Offices, banks			Y	Y
• Schools for business, music, dance, etc.			Y	
• Hotels and motels (including conference facilities)			SP	SP
• Residential conference center				Y
• Recreation center				SP
• Commercial greenhouse				Y
• Places of assembly			SP	

[1] The Table of Use Regulations states that Comprehensive developments, defined as affordable housing projects that meet the requirements of M.G.L. ch. 40B, are allowed by right. §650-27 indicates that such uses are allowed by special permit from the City Council. It should be noted that 40B designates the Zoning Board of Appeals as the permit granting authority for comprehensive permits.

Land Use	Residence A-1	Rural Residence	Business	Limited Industrial
• Gasoline stations and automotive services			SP	
• Shopping malls				SP
• Recreation establishments/ places of amusement			SP	SP
• Restaurants			Y	SP
• Restaurants with drive-thru facilities			SP	
• Drive-in facilities			SP	
Agricultural, Public and Institutional Uses				
• Agriculture > 5 acres	Y	Y	Y	Y
• Livestock >10 acres	Y			
• Farms	Y			
• Public utilities	Y	Y	Y	Y
• Public buildings	Y	Y	Y	Y
Industrial Uses				
• Printing and publishing				Y
• Transportation terminal				SP
• Research labs				Y
• Light non-nuisance manufacturing				Y
• Manufacturing or warehouse[2]				Y
• Indoor or outdoor recreation center[3]				SP

There is no mention of mixed use development in the use regulations although the term is defined in the definition section of the ordinance ("a mix of residential and commercial uses within one structure").

§650.18 specifies conditions for some of the land uses listed in the Table of Use Regulations. §650.18 (19) states:

> Retail stores, shops and service establishment uses….on a retail lot are also permitted upon the issuance of a special permit, provided that such uses are not inconsistent with uses customarily located in shopping malls.

This provision appears to discourage innovative retail uses from the Business (or Limited Industrial) zoning district if they are not similar to what one might find in a shopping mall, which is undefined in the ordinance. Smaller retail in the Business district is allowed as of right, so it is unclear as to why this provision references a special permit.

[2] There are two listings for manufacturing and warehousing with slightly conflicting use designations. The use regulation conditions (§650-18) specify the types of facilities allowed, but could limit other types of facilities.

[3] Recreation centers are not defined and are listed in three separate places with conflicting designations.

Other regulations within this section either provides further definition regarding a particular use or describes some standards relating to site design, setbacks, etc

Business and Light Industrial Districts

Additional regulations pertaining to the Business and Limited Industrial districts can be found in §650.15. For example, permitted uses in the Business district shall be conducted in enclosed buildings except for required off-street parking spaces, outdoor storage, etc. Permitted uses in the Limited Industrial district has similar provisions as well as requirements for "appropriate screening and fencing" to minimize impacts to abutting properties and streets. Moreover, in the Limited Industrial district, "any use similar in character and similar in effect on adjacent property to those uses allowed in the district (either by right or by special permit) may be allowed by special permit from the City Council."

Dimensional Requirements

Article VII contains the Dimensional, Landscaping, and Parking Regulations. §650.41 is the Table of Lot Area, Yards, and Height of Structures. The standards for the relevant zoning districts are shown below:

District	Minimum Lot Area	Minimum Lot Frontage	Minimum Side Yard	Minimum Front Yard	Minimum Rear Yard	Height	Maximum Lot Coverage
Residence A-1	1 acre	150	20	30	40	2½ stories	25%
Rural Residence	22,500 sq. ft.	180	25	40	50	2½ stories	20%
Business	5,000 sq. ft.	50	25	50	None	52 feet	30% residential; 80% all other uses
Limited Industrial	2 acres	200	50	50	50	30 – 52 feet[4]	60%

The City Council, with the issuance of a special permit, may increase maximum lot coverage for a shopping mall or certain business uses (i.e. retail, restaurant, or service establishments) if infrastructure and/or open space improvements are made by the applicant that provide benefit to other properties in the City as well as the specific development project.

Landscape Requirements

Landscaping requirements are found at §650.47. Landscaping plans are required for any project requiring site plan approval. The standards address planting type, size, quantity and spacing. Use of existing vegetation is encouraged whenever possible, although larger trees and hedgerows within the street frontage should not be removed. Landscaping standards vary based upon location, such as street frontage, side yards, and zoning district boundary (the width of the district boundary planting area increase as lot size increases). There are also specific standards for plantings within parking areas. Maintenance and replacement of dead vegetation is required.

[4] Scaled upwards as distance between residential zones and the Limited Industrial zone increases.

Parking Standards

The parking standards (§650.48) are broadly defined since many of the requirements seem to combine a variety of uses under the same standard. They are also out-of-date and do not provide flexibility relating to the specific type of development (i.e. all retail uses and any industrial use has the same standard within those categories). The following are the standards that would apply to land within the study area.

- Retail businesses shall provide "one parking space, 350 square feet, for each 100 square feet of public floor space or area." Note that this language is confusing and unclear.
- "Offices and banks shall provide one parking space for each 250 square feet of office space or area."
- Industrial and manufacturing establishments "shall provide one parking space for each three workers based on peak employment."
- "Multifamily dwellings: one off-street parking space per dwelling unit, plus one off-street parking space per bedroom; apartment buildings shall provide two off-street parking spaces for each dwelling unit over and above access roadways and maneuvering." Note that this requirement is excessive. Apartment buildings have a different requirement although it is unclear as to why they are categorized separately from multi-family dwellings. The apartment standard is also unclear.
- "Clubs, restaurants, taverns and other eating places shall provide one parking space for every three seats, plus one space for every three employees."
- "Shopping mall shall provide a minimum of one parking space for each 225 square feet of gross leasable area. Retail stores, shops, restaurants and service establishment uses, on a retail lot shall provide a minimum of one parking space for each 225 square feet of gross leasable area." Note that it is unclear as to how this retail requirement differs from the retail business requirement cited above.

There are no provisions for shared parking.

Site Plan Review

Site plan review and approval is addressed in the Building and Site Development regulations found at §270.2. Site plan review and approval is required for a broad range of projects including any new construction; addition to an existing structure; increase in on-site parking areas; change in location of any exterior feature; reduction of required landscaping; and an expansion of an existing curb cut that generates a 10% increase in vehicle trips. A variety of criteria are to be applied in the review and evaluation of a site plan. These include:

- Urban and natural landscape and how it is integrated into the project design. This includes preserving natural and historic features.
- Building and service area design and operation, including the visual relationship between the proposed buildings and existing ones.
- Traffic and pedestrian movement to maximize safety and convenience. Adequate circulation and access to the site and along adjacent streets are to be considered. Traffic and pedestrian mitigation measures should be addressed, even if they are off-site. The distance between curb cuts should be maximized, although sharing of curb cuts or common driveways can also be considered. Interconnections between driveways, parking lots and pedestrian pathways on adjacent sites are also encouraged. Pedestrian, bicycle, and vehicular circulation should be separated.
- Other criteria include public safety, storm drainage and erosion control, sewer and water, utilities, and construction impacts.

Special Permit Granting Authority

The Board of Appeals is designated as the special permit granting authority (SPGA) pursuant to §650.58. However, references are made elsewhere in the ordinance that refers to the City Council as the SPGA for certain types of uses. These are not specified in the Table of Use Regulations.

Appendix B
Commercial and Residential Market Assessment

RKG ASSOCIATES INC

COMMERCIAL AND RESIDENTIAL MARKET ASSESSMENT MARLBOROUGH, MA

DECEMBER 13, 2012

Prepared for:

Mr. Tim Cummings
Marlborough Economic Development Corporation
91 Main Street, Suite 204
Marlborough, MA 01752

Prepared by:

RKG Associates, Inc.
Economic, Planning and Real Estate Consultants
634 Central Avenue
Dover, NH 03820
Tel: 603-953-0202
FAX: 603-953-0032
And
300 Montgomery Street, Suite 203
Alexandria, Virginia 22314-1590
Tel: 703-739-0965
FAX: 703-739-0979

www.rkgassociates.com

Economic Planning and Real Estate Consultants

TABLE OF CONTENTS

I. Executive Summary 1

A. Introduction and Purpose 1

B. Key Findings 1

C. Conclusions and Development Considerations 3

1. Residential 3
2. Industrial 4
3. Office 4
4. Retail 4

II. Land Use and Property Tax Characteristics 5

A. Physical and Assessment Characteristics 6

1. Development Trends in the Study Area 7

III. Socioeconomic Characteristics 10

A. Population Trends 10

B. Economic Trends 11

1. Establishments 11
2. Average Wage 12
3. Employment 12
4. Conclusions 13

C. Comparative Quotients 13

IV. Residential Market Conditions 15

A. Housing Supply Trends and Characteristics 15

1. Building Permit Data 16

B. Renter Households Trends and Characteristics 17

C. Apartment Market Conditions and Trends 19

1. Regional Conditions and Recent Trends 19
2. Local Apartment Market Conditions and Regional Comparison 22
3. Five-Year Forecasts 24
4. Conclusions 24

D. Owner Households Trends and Characteristics 24

E. For-Sale Market Conditions 26

1. Trends in Single-Family and Condominium Tax Parcels 26
2. For-Sale Market Activity 28
3. Median Sale Price 29
4. Sales Activity of Condominiums $200,000 or more and Current Listings 30
5. Conclusion 31

V. Non-Residential Market Conditions 33

A. Industrial Market Conditions 33

1. Available Industrial Properties Marlborough 34
2. Proposed Industrial Building Supply 36
3. Conclusions 37

B. Office Market Conditions 37
1. Marlborough Office Market Trends 38
2. Available Office Properties in Marlborough 40
3. Proposed Office Building Supply 42
4. Conclusion 42

C. Retail Market Conditions 42

VI. Development Considerations 47

A. Residential 47
1. Forecasted Annual Owner Demand by Age and Income 47
2. Forecasted Annual Renter Demand 48

B. Non-Residential 48
1. Industrial 48
2. Office 49
3. Retail 50

I. EXECUTIVE SUMMARY

A. Introduction and Purpose

The purpose of this analysis is to provide an assessment of residential and non-residential market conditions to inform a corridor plan for an approximate 1.3 mile section of Route 20 East in Marlborough, Massachusetts. This analysis should be considered as a decision support tool to inform the corridor planning process. The Route 20 Corridor Study Area is located on the eastern edge of the City of Marlborough and extends from the intersection with Farm Road to the municipal boundary with the Town of Sudbury, as shown on Map II-1. Access to the interstate highway system is relatively simple heading west on Route 20 to Exit 24-A. However, it can become congested with the multitude of signalized intersections along Route 20, as well as navigating through downtown Marlborough.

Map I-1 – Aerial View of Route 20 Corridor Study Area

B. Key Findings

The key findings of this analysis are summarized next, and are presented in greater detail throughout the remaining chapters of this report.

- **Land Use(s)** - Residential is the primary use in the Route 20 Corridor Study Area followed by commercial uses. The commercial uses are primarily along the Route 20 frontage, while the residential uses are set back from the highway. Municipal uses such as parks, a cemetery and a sewage treatment plant are also evident in the Study

Area. Development along the corridor is somewhat mixed, with a few retail/service stores/centers exist interspersed with vacant land and automotive uses.

- **Population** - Over the 2011 to 2016 time, Marlborough's population is projected to remain more or less stable, adding fewer than 1,000 persons, suggesting that there may be limited demand for additional new housing and relatively stable consumer spending demand. However, the population is projected to become increasingly more ethnically diversified, indicating potential "targeted" commercial development and consumer opportunities. On average the population of Marlborough is slightly older than the county with a higher percentage aged 55 years and older, those considered to be pre-retirement, with downsizing households and in peak disposable income years.

- **Establishments** - The number of businesses in Marlborough increased between 2008 and 2010 by slightly more than 3%. This is dissimilar to both the county and the state which lost businesses. Marlborough has more businesses in 2010 when compared with 2006, also dissimilar to the county and state. Business growth in Marlborough was most pronounced in professional/technical services and the health care industry.

- **Wages** - The all industry sector average annual wage in Marlborough, in 2010, was nearly $86,500 and well above that for both the county and state. This wage represents a near 22% increase since 2006 and greater than the approximate 8% inflation since that time. However, wages in some industry sectors did not keep pace with inflation including wholesale trade, education, arts/entertainment and accommodations and food services.

- **Employment** - Despite an increase in the number of businesses in Marlborough (2008 to 2010), there was a loss of more than 1,800 jobs representing a near 6.5% decline, which outpaced the percentage decline in either the county or the state. Losses in Marlborough employment were most prominent in manufacturing and information services. Employment growth in Marlborough was most noticed in finance/insurance and the health care industries.

- **Residential (Rental) Market** - The rental market in Marlborough experienced significant expansion over the last decade, noting that over 90% of the increase in households in Marlborough during that time came from renters. The regional market is anticipated to expand by another 1,000 units or so over the next five years (5%). Absorption is forecasted to be sufficient to fill the new units while occupancy rates are forecasted to remain above 95%. Average rents in the region are anticipated to increase by over 4% per year and by 2016 would average nearly $1,770/month.

- **Residential (Owner) Market** - The for-sale market in Marlborough averaged 23 single-family units annually during the 2000's, about one-fourth of the 1990's average. Similarly, new condominium development averaged less than 10 units per year during the 2000's, as compared to an average of 80 units per year in the 1990's. The slow-down in sales and new construction over the last five years was due in part to the national recession and credit crisis, and further exacerbated by the number of foreclosure auctions, where in Marlborough, there was one auction for every three single-family sales and one auction for every 1.5 condominium sales. Sales activity

in the Study Area over the last the 5-year period accounted for more than 30% of citywide sales. Recently, most of the sales were in the $200,000 to $249,999 range, and likely below replacement cost, suggesting a limited market at this time for condominium development.

In addition, the sales in the Study Area are either townhouse-style units or prior apartment building conversions. Evidence of luxury "flats" in low-to-mid-rise buildings is not apparent today, nor is there a market to support such a development, given the higher costs for this type of construction. As conditions in the for-sale market improve in the future, high-density, mid-rise buildings could be planned, depending on the long-term focus/vision of the Corridor, recognizing that this market may not be apparent for 5 to 10 years, in the future.

- **Non-Residential Market(s)** - The limited amount of developed office and industrial space in the Route 20 Corridor suggest that other areas in the city have better access to the interstate highway network and enjoyed a higher amount of business park development. The retail development with the Study Area accounts for basically 25% of the citywide supply, suggesting other areas in the city have better locational attributes for retail development. The advent of Home Depot (2002) and Target (2010) has strengthened the retail dynamics of the Corridor; however, there is lots of competing retail opportunities in the rest of the city and neighboring communities. Attracting other major retailers to the corridor may be problematic unless these retailers need to protect and/or increase their market share from other competing entities entering the market.

C. Conclusions and Development Considerations

Based on the research and findings in this analysis, the following reflects RKG's opinion regarding development potential and considerations for the Route 20 Corridor Study Area in Marlborough, Massachusetts. The inputs and assumptions which are the basis of these development considerations are presented in greater detail throughout this report and represent the consultants' best professional opinions. However, there is no assurance that actual events will correspond with the assumptions on which these findings are based. Consequently, no guarantee can be made that the development potential, either in total or by use type (residential and commercial) estimated in this analysis correspond with the results actually achieved in the future.

1. Residential

Annual demand for new owner housing, in Marlborough over the next five years, is estimated to range from 50 and 60 units per year, and demand for new renter units between 90 and 100 units per year. Given construction activity in Marlborough (in total), and depending on the pricing for new products, RKG estimates that 30% to 50% of the owner units (about 20 to 30), would be condominiums while new single-family homes would range between 30 and 40 units per year. These annual estimates would be for the City of Marlborough as a whole, and perhaps the Route 20 Corridor could capture between 30% and 50% of this demand depending on projects developed in the other parts of the city, pricing and amenities. This would equate to up to 30 owner units and up to 50 rental units per year along the Corridor. Specifically, with respect to renter residential, if a suitable site(s) in the

Route 20 Corridor Study Area was available, an apartment complex of 150 to 250 units could be planned and phased in over time. Similarly, with respect to owner residential, perhaps a project with 75 to 100 units could be phased in over a five-year time frame, but at this time, market indicators for renter residential development in the Route 20 Corridor Study Area appear more favorable.

2. Industrial

The Route 20 Corridor Study Area does not have the locational attributes to capture future industrial/research and development opportunities, despite the presence of the Raytheon campus at its eastern edge. In addition to the 1.5 million SF of available industrial space (one-half represented by the former Hewlett Packard complex), another 0.67 million SF of industrial building area is proposed for Marlborough, which increases available space to 2.2 million SF when including a portion of neighboring Northborough. All of this proposed industrial development is located on the western side of the city, where access to the interstates (I-495 and I-290) is more convenient than from the Study Area. Industrial opportunities in the Route 20 Corridor appear to be limited due primarily to its poor highway accessibility as compared to other parts of the city.

3. Office

The office market in Suburban Boston has shown signs of improvement over the last year or so, but unfortunately, this improvement was not evident in Marlborough as absorption remained negative. Office rents in Marlborough currently remain below their peak, and below the level to support new construction at this time. In looking out at a ten-year period, RKG estimates that employment growth in Marlborough (in total) could result in additional office demand of over 772,000 SF, which is still well below the existing inventory of available space. Nonetheless, based on employment growth projections, RKG estimates that potential may exist for some medical offices (11,800 SF to 35,300 SF) in conjunction with Marlborough Hospital, or service oriented office users (20,600 SF to 61,800 SF) that prefer locations with high traffic counts and retail/service build-up rather than an office campus or business park location where most of the Marlborough office supply exists.

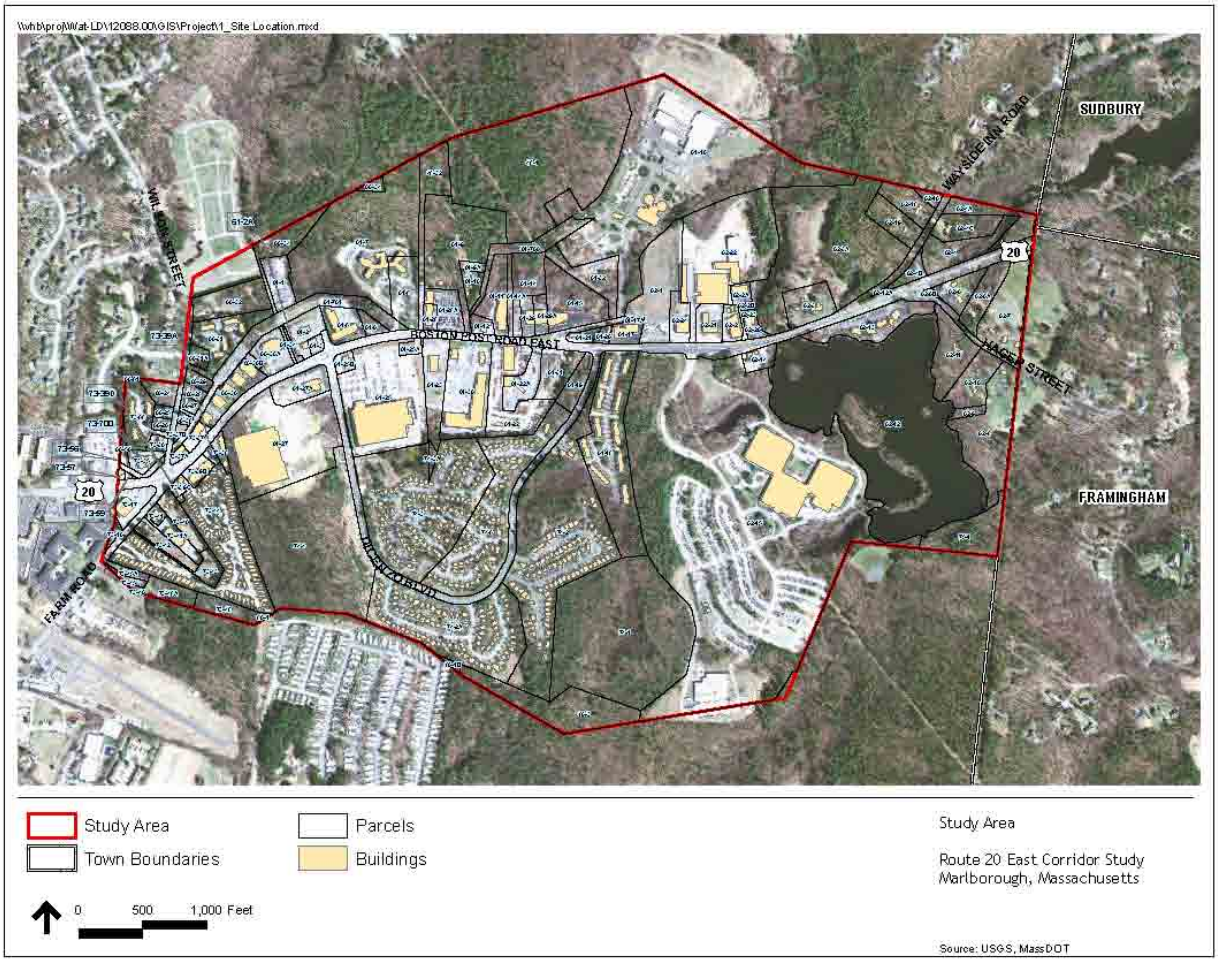
Two important considerations with respect to such potential office development include (1) this analysis is stretched over a ten-year time period and would result in only incremental development annually; and, (2) potential tenants could include small businesses, entrepreneurs, and start-ups, requiring flexible lease rates and terms that may be insufficient to warrant new construction costs.

4. Retail

RKG estimates potential capture rates (at 20% and 35%) of the locally unmet consumer demand could result in the potential development of 14,000 SF to 25,000 SF of additional retail in Marlborough, along the Route 20 Corridor Study Area, realizing that the desire to be near the big box retailers may be strongest. Although it is difficult to speculate specific tenants, the types of stores exhibiting the most potential include a clustering of apparel and accessory shops, with a focus to family clothing. Some potential has been identified for grocery and specialty foods, although not for a full-line supermarket unless the desire would be to protect market share from competitors.

II. LAND USE AND PROPERTY TAX CHARACTERISTICS

The Route 20 Corridor Study Area is located on the eastern edge of the City of Marlborough and extends from the intersection with Farm Road to the municipal boundary with the Town of Sudbury, as shown in Map II-1. Access to the interstate highway system is relatively simple heading west on Route 20 to Exit 24-A. However, it can become congested with the multitude of signalized intersections along Route 20, as well as navigating through downtown Marlborough. According to the Mass DOT, the most recent traffic count on Route 20 (east of Concord Road) was 24,100 vehicles per day in 2006, a 12% reduction from a 2004 reading of 27,300 vehicles per day.



Map II-1 – Route 20 Corridor Study Area

While Marlborough is considered a preferred suburban business park location, since it is at the interchange of the Mass Turnpike (I-90) and I-495, as well as the interchange of I-290 and I-495, nearly all business park development occurred on the western side of the city. The Route 20 Corridor experienced very little if any of that development, except for the Raytheon

complex built in the late 1980's at the eastern edge of the Route 20 Corridor. The purpose of this chapter is to identify key baseline land use and assessment conditions in the Study Area.

A. Physical and Assessment Characteristics

The Route 20 Corridor had over 1,000 tax parcels containing approximately 800 acres and was improved with nearly 2.4 million SF of building area[1]. As shown in Table II-2 (at the end of this chapter), approximately 90% of the tax parcels are residential, accounting for nearly 24% of the acres in the study area, and 64% of the total assessed value. Commercial uses account for 6% of the tax parcels, consume 12% of the acreage in the Study Area and represent about 17% of the total assessed value. Industrial uses account for 1% of the tax parcels, but utilize 22.5% of the acreage in the Study Area, and contribute 12% of the total assessed value. The Raytheon complex on 152 acres accounts for nearly all the industrial properties in the Study Area. Tax-exempt properties, including city and state-owned parcels, account for 40% of the acreage in the Study Area and 6% of the total assessment; however, these properties do not generate real estate taxes, but provided civic services such as open spaces, parks, a cemetery, and a sewage treatment plant.

Comparisons of the Study Area to citywide characteristics are also presented in Table II-2. The following highlights key observations:

- Residential uses in the Study Area account for 8% of the total residential tax parcels in the City of Marlborough, and 3% of the residential acreage. In terms of assessed values, the residential uses account for 6% of the residential assessment citywide.
    - Condominiums in the Study Area account for 43% of the citywide supply of condominium parcels but generate 47% of the citywide condominium assessment. This is also evident by a higher average unit value in the Study Area ($213,110) as compared to the City ($192,810).
    - Single-family use in the Study Area accounts for less than one-half a percentage of the citywide supply of single-family parcels, and approximately 1% of the single-family acreage. In spite of the limited supply of single-family homes in the Study Area, their average assessed value ($343,050) is similar to that citywide ($342,500).
    - In terms of the three assessment categories for mobile homes (MH), the supply in the Study Area represents 100% of the citywide supply in two categories, and 50% of the citywide supply in the other one. Val's Mobile Home Park off Farm Road is included in this group.
    - The acreage of residential land (buildable) in the Study Area accounts for 10% of the citywide supply (acres) for this category.
- Commercial uses in the Study Area account for 9% of the commercial uses citywide, and 6% of commercial assessment.

[1] Information in this section comes from an evaluation of the assessor's data file in the City of Marlborough. However, there are a few limitations namely the building sizes represent only that of Building 1 for each parcel, and does not include any sizes of additional buildings on multiple building properties such as apartments. Also, the data appeared to be for FY-2009, so assessed values may not be reflective of actual current values, and some properties may not be included.

  - Commercial warehouses in the Study Area account for 25% of the tax parcels citywide, 54% of the building area, and 58% of the assessment
  - Select retail uses account for 25% or more of the citywide supply for those uses including Retail >10,000 SF; Retail Condo: Auto Dealer Full Service.
  - Restaurant uses in the Study Area account for 9% of these uses citywide in terms of tax parcels.
  - Other outdoor facilities in the Study Area represent 100% of the citywide supply for this category.
  - Commercial land (buildable) in the Study Area accounts for 17% of the citywide supply (acres) for this category.

- Industrial uses in the Study Area account for only 1% of the citywide supply of industrial tax parcels, but 11% of the industrial acreage. Industrial uses represent 9% of total assessed value.
  - Research and development in the Study Area, accounts for 38% of the citywide acreage for type, and contributes 20% of the citywide assessment.
  - Industrial buildings in the Study Area account for 25% of the supply of industrial building parcels citywide, and 31% of the total assessment for this type.
- The Study Area in total has 8% of the citywide tax parcels, but only 1% of the total acres in the City. The Study Area represents 6% of the total assessment citywide.

In essence the Route 20 Corridor is a very small portion of the City of Marlborough in terms of land area, but represents 6% of its tax base. Each of the major uses (residential, commercial and industrial) in the Corridor contributes comparatively to the city as a whole. The current unused other outdoor facility (5.6 acres), coupled with the undeveloped acres of residential (29 acres) and commercial (17 acres) land in the Study Area represent opportunities for future new development to strengthen the city's tax base.

1. Development Trends in the Study Area

Using the year built field in the assessor database, RKG was able to tabulate the number of parcels and their assessment in the Study Area that were built over the last two decades (since 1990) and compare those statistics to the Study Area as a whole. As shown in Table II-1, approximately 39% of the residential tax parcels in the Study Area were developed over the last two decades, and their assessed value accounts for 52% of the total residential assessment in the Study Area. However, nearly all this development was for condominiums and almost all occurred during the 1990's. Very little residential activity occurred over the last decade. The average value of the post-1990 residential development was over $300,000 per unit, ranging from condominiums at $296,400 to single-family homes at $381,000; however, only two single-family homes were developed in the Study Area over the last two decades as well as a mobile home park (103 sites).

Table II-1 – Development Trends in the Route 20 Corridor Study Area

	Tax Parcels				Assessed Values				
Use/Type	1990-99	2000-09	Total	% of S-A	1990-99	2000-09	Total	% of S-A	AVG Value
Single-Family	1	1	2	7%	$299,900	$462,600	$762,500	7%	$381,250
Condominiums	348	0	348	41%	$103,141,500		$103,141,500	56%	$296,384
Mobile Hm w/C		1	1	100%		$2,892,000	$2,892,000	100%	$2,892,000
Residential	349	2	351	39%	$103,441,400	$3,354,600	$106,796,000	52%	$304,262
Commercial	1	8	9	20%	$922,000	$21,330,300	$22,252,300	44%	$2,472,478
Industrial		1	1	50%		$694,200	$694,200	100%	$694,200
Total	350	11	361	36%	$104,363,400	$25,379,100	$129,742,500	44%	$359,398
Source: City of Marlborough; VHB, Inc. & RKG Associates, Inc.									

Commercial uses expanded by 9 parcels over the last 2 decades exclusively for retail type uses. Contrary to residential, almost all the commercial parcels were developed during the 2000's. This addition of post-1990 commercial development represented 20% of the commercial parcels and generated 44% of the commercial assessment in the Study Area. The average assessed value was nearly $2.5 million per parcel. Approximately 18.3 acres was developed for this retail use, and over 160,000 SF was developed on these 9 parcels for an average of 17,800 SF per parcel. It should be noted that this post-1990 development does not include the new 93,300 SF Target Store built in 2010 on 13 acres. The Target's assessed value of $12.45 million (FY-2012) represents 56% of the assessed value of post-1990 commercial development.

Office-type development is limited in the Corridor, as there are only two office parcels and seven office condominiums having a total building area of 33,560 SF and representing 1.4% of the total building area in the Study Area. This office development, which was all developed prior to 1990, represents less than 1% of the office building development in the City of Marlborough.

One industrial parcel of approximately 2 acres was developed for Waste Management in 2000 containing a 6,400 SF industrial-type building. This represents both all the post-1990 building development and all the industrial-type building development in the Study Area. A 580,000 SF research and development facility owned by Raytheon was developed in 1987 and is sited on a 152.5-acre parcel. These are the only two improved industrial parcels (see Table II-2) in the Study Area and their building area represents 8% of the industrially classified buildings in the City of Marlborough.

Table II-2 – Study Area Physical and Assessment Characteristics and Citywide Comparison

		Route 20 Corridor Study Area										As % of the City				Citywide Ass'd $	
Code	Description	Par-cels	Acres	Bldg 1 SF	Total Ass'd $ (FY-09)	% of Parcels	% of Acres	% of Bldg 1 SF	% of Total Ass'd $	Ass'd $	Per UoM	Par-cels	Acres	Bldg 1 SF	Ass'd $ (09)	Ass'd $	Per UoM
	Total Mixed Use	3	1.8	27,176	$1,636,600	0.3%	0.2%	1.1%	0.5%	$60	BSF	3%	2%	5%	3%	$93	BSF
1010	Single Family	30	53.6	64,267	$10,291,200	3.0%	6.9%	2.7%	3.2%	$343,040	Unit	0%	1%	0%	0%	$342,495	Unit
1020	Condominium	2	0.0	3,383	$520,700	0.2%	0.0%	0.1%	0.2%	$260,350	Unit	1%		1%	1%	$190,836	Unit
1021	Condominium	857	0.0	1,110,780	$182,635,200	84.9%	0.0%	46.5%	56.8%	$213,110	Unit	43%		45%	47%	$192,810	Unit
1032	MHP Land	1	11.1		$2,950,500	0.1%	1.4%	0.0%	0.9%	$266,416	Acre	100%	100%		100%	$266,416	Acre
1035	MHP/ House	1	38.7	2,624	$3,113,400	0.1%	5.0%	0.1%	1.0%	$80,387	Acre	100%	100%	100%	100%	$3,113,400	Acre
1034	Mobile Hm w/C	1	29.2	1,620	$2,892,000	0.1%	3.8%	0.1%	0.9%	$99,041	Acre	50%	64%	56%	49%	$2,936,400	Acre
1120	Apt 9 units and up C	1	1.1	29,641	$2,721,600	0.1%	0.1%	1.2%	0.8%	$91.82	BSF	3%	0%	4%	1%	$329	BSF
	Subtotal (Impr. Residential)	903	144.4	1,220,582	$206,461,300	89.5%	18.6%	51.1%	64.2%	$228,639	Parcel	9%	3%	5%	6%	$339,517	Parcel
1300	Res Land Buildable	2	28.6		$606,900	0.2%	3.7%	0.0%	0.2%	$21,243	Acre	2%	10%		3%	$72,166	Acre
	Total Residential	910	186	1,220,582	$207,111,100	90.2%	23.9%	51.1%	64.4%	$227,595	Parcel	8%	3%	5%	6%	$313,583	Parcel
3160	Warehouse	3	13.8	85,250	$6,580,500	0.3%	1.8%	3.6%	2.0%	$77	BSF	25%	43%	54%	58%	$71	BSF
3220	Retail > 10,000 SF	5	18.2	181,166	$20,585,500	0.5%	2.3%	7.6%	6.4%	$114	BSF	23%	23%	24%	27%	$101	BSF
3221	Retail Condo	5	0.0	5,153	$566,000	0.5%	0.0%	0.2%	0.2%	$110	BSF	36%		25%	26%	$104	BSF
3230	Shopping Center/ Mall	6	15.5	137,220	$10,217,900	0.6%	2.0%	5.7%	3.2%	$74	BSF	30%	21%	13%	9%	$112	BSF
3250	Retail < 10,000 SF	5	3.7	25,287	$4,765,900	0.5%	0.5%	1.1%	1.5%	$188	BSF	11%	19%	14%	17%	$152	BSF
3260	Restaurant/ Club/ Bar	3	3.8	13,134	$2,097,800	0.3%	0.5%	0.6%	0.7%	$160	BSF	9%	10%	8%	8%	$152	BSF
3300	Auto Dealer Full Svc	1	0.5	13,730	$875,900	0.1%	0.1%	0.6%	0.3%	$64	BSF	14%	8%	31%	27%	$73	BSF
3320	Auto Repair	1	4.6	16,464	$593,400	0.1%	0.6%	0.7%	0.2%	$36	BSF	3%	11%	8%	4%	$78	BSF
3370	Parking Lot	5	6.8		$688,200	0.5%	0.9%	0.0%	0.2%	$101,059	Acre	8%	25%		11%	$240,248	Acre
3400	Office	2	2.3	28,994	$2,128,900	0.2%	0.3%	1.2%	0.7%	$73	BSF	3%	1%	1%	1%	$89	BSF
3401	Office Condo	7	0.0	4,565	$425,500	0.7%	0.0%	0.2%	0.1%	$93	BSF	17%		1%	1%	$109	BSF
3410	Bank Bldg	1	0.2	1,178	$410,700	0.1%	0.0%	0.0%	0.1%	$349	BSF	7%	1%	2%	1%	$413	BSF
3880	Other Outdoor Facility	1	5.6		$1,076,000	0.1%	0.7%	0.0%	0.3%	$193,874	Acre	100%	100%		100%	$193,874	Acre
	Subtotal (Impr. Commercial)	45	74.9	512,141	$51,012,200	4.5%	9.6%	21.5%	15.9%	$100	BSF	10%	8%	6%	6%	$100	BSF
3900	Comm Land Buildable	7	16.6		$3,116,100	0.7%	2.1%	0.0%	1.0%	$188,115	Acre	21%	17%		37%	$87,424	Acre
	Total Commercial	60	93.7	512,141	$54,281,500	5.9%	12.1%	21.5%	16.9%	$904,692	Parcel	11%	9%	6%	6%	$1,662,844	Parcel
4022	Industrial Building	1	2.0	6,462	$694,200	0.1%	0.3%	0.3%	0.2%	$107	BSF	25%	33%	21%	31%	$73.51	BSF
4040	Research & Devel	1	152.5	509,202	$38,808,900	0.1%	19.6%	21.3%	12.1%	$76	BSF	5%	38%	21%	20%	$77.24	BSF
	Subtotal (Impr. Industrial)	2	154.5	515,664	$39,503,100	0.2%	19.9%	21.6%	12.3%	$77	BSF	1%	17%	8%	10%	$67	BSF
	Total Industrial	3	175.0	515,664	$39,538,800	0.3%	22.5%	21.6%	12.3%	$77	BSF	1%	11%	8%	9%	$74	BSF
	Total Tax Exempt	33	320.4	111,723	$19,198,700	3.3%	41.3%	4.7%	6.0%	$581,779	Parcel	6%	1%	4%	5%	$718,055	Parcel
	Grand Total	1,009	776.7	2,387,286	$321,766,700	100.0%	100.0%	100.0%	100.0%	$318,897	Parcel	8%	1%	6%	6%	$420,722	Parcel

Source: City of Marlborough, VHB, Inc.. & RKG Associates, Inc.

III. SOCIOECONOMIC CHARACTERISTICS

This chapter presents selected demographic characteristics for Marlborough, Middlesex County and Massachusetts, comparing and contrasting baseline socio-demographic indicators, where applicable. These indicators include changes in population as well as economic indicators for employment, wages and businesses.

A. Population Trends

The population of Marlborough increased by nearly 7% between 2000 and 2011, and is projected to increase another 3% by 2016 (refer to Table III-1). The estimated 2011 population is 38,700 and is projected to be 39,600 in 2016. The population growth in Marlborough from 2000 to 2011 well exceeds that for the county (3.6%) and the projected growth to 2016 is more or less comparable. The population diversification of Marlborough and the county are relatively similar and predominantly white, although there is a greater presence of persons of Hispanic heritage in Marlborough. The median age(s) for each are similar, at 38 to 39 years, and are projected to remain so in 2016. Additionally, the population aged 55 and older, typically considered to be in their peak disposable income years and often represent empty-nester or potential "downsizing" households, is similar for each at around a 25% representation.

Table III-1 – Comparative Population Data

Comparative Population Trends	Marlborough Massachusetts	Middlesex County	Marlborough as % of County
Total Population			
2000	36,277	1,465,191	2.48%
2011	38,688	1,518,171	2.55%
2016	39,585	1,557,643	2.54%
% change 2000 - 2011	6.65%	3.62%	
% change 2011 - 2016	2.82%	2.60%	
Population Diversification			
% white			
2000	87.7%	85.9%	2.53%
2011	82.0%	80.0%	2.95%
2016	82.0%	80.1%	2.96%
% non-white			
2000	12.3%	14.1%	2.2%
2011	19.1%	20.0%	2.6%
2016	18.0%	19.9%	2.6%
% Hispanic			
2000	6.1%	4.6%	3.3%
2011	10.8%	6.5%	4.4%
2016	12.9%	8.6%	4.3%
Median Age			
2000	32.4	33.6	96.43%
2011	39.1	38.4	101.74%
2016	39.0	38.3	101.85%
Population Aged 55+			
2000	7,220	312,909	2.31%
2011	10,686	381,123	2.80%
2016	10,954	389,848	2.81%
as % of Total			
2000	19.9%	21.4%	
2011	27.6%	25.1%	
2016	27.7%	25.0%	

Source : US Census, DemographicsNOW and RKG Associates, Inc.

B. Economic Trends

This section presents findings relative to business, wages and employment in Marlborough, Middlesex County and Massachusetts, where applicable.

1. Establishments

In 2006, there were approximately 175,500 businesses in Massachusetts (refer to Table III-2), which decreased a nominal -0.7% by 2008 and another -2.6% by 2010, resulting in 169,800 businesses, a net decline of -5,700 businesses (-3.2%). The greatest declines between 2006 and 2010 were realized in construction (-2,625) and in retail trade (-1,210). Nonetheless, in terms of business establishments, there were overall growth sectors between 2006 and 2010, including: accommodations and food services up by 940; health care added 730; administration gained 410; and, education realized an increase of 180. The 2006 to 2008 decline in Middlesex County was also nominal, at -0.3% however the 2008 to 2010 drop was an additional -2%, although the representation of businesses in Middlesex County relative to the state has remained fairly constant between 24% and 25%. The overall decline in Middlesex County businesses, from 2006 through 2010, was -945 (-2.1%) and, similar to the state, this was led by the construction and retail sectors. Two sectors experienced a strong increase in Middlesex County including accommodations/food services, up 270, and health care, with a gain of 255 establishments. Marlborough also experienced a nominal decline (-0.9%) in businesses between 2006 and 2008, but in contrast realized a gain of 3.4%, or nearly 50 businesses between 2008 and 2010. Over the 2006 to 2010 period, Marlborough added 40 businesses in professional and technical services.

Table III-2 – Establishments by Industry Sector

Industry Sector and 2-Digit NAICS	Marlborough, MA					Middlesex County, MA					Massachusetts				
Number of Establishments	2006	2008	% Chge	2010	% Chge	2006	2008	% Chge	2010	% Chge	2006	2008	% Chge	2010	% Chge
11 - Forestry, Fish, Agriculture	NA	NA	NA	NA	NA	23	27	17.4%	22	-18.5%	423	384	-9.2%	356	-7.3%
21 - Mining	NA	NA	NA	NA	NA	13	15	15.4%	13	-13.3%	95	96	1.1%	86	-10.4%
22 - Utilities	NA	NA	NA	NA	NA	38	44	15.8%	47	6.8%	252	261	3.6%	281	7.7%
23 - Construction	124	111	-10.5%	110	-0.9%	4,494	4,320	-3.9%	3,924	-9.2%	19,469	18,665	-4.1%	16,844	-9.8%
31 - Manufacturing	87	86	-1.1%	81	-5.8%	1,846	1,819	-1.5%	1,685	-7.4%	7,680	7,560	-1.6%	6,907	-8.6%
42 - Wholesaled Trade	145	140	-3.4%	139	-0.7%	2,444	2,433	-0.5%	2,285	-6.1%	8,655	8,647	-0.1%	8,161	-5.6%
44 - Retail Trade	205	206	0.5%	199	-3.4%	5,339	5,265	-1.4%	5,162	-2.0%	25,625	25,121	-2.0%	24,412	-2.8%
48 - Transportation and Warehousing	23	27	17.4%	23	-14.8%	778	756	-2.8%	730	-3.4%	3,729	3,651	-2.1%	3,565	-2.4%
51 - Information	52	59	13.5%	51	-13.6%	1,271	1,320	3.9%	1,216	-7.9%	3,728	3,831	2.8%	3,492	-8.8%
52 - Finance and Insurance	71	64	-9.9%	61	-4.7%	2,202	2,230	1.3%	2,092	-6.2%	9,836	10,018	1.9%	9,437	-5.8%
53 - Real Estate and Rental and Leasing	56	51	-8.9%	47	-7.8%	1,702	1,589	-6.6%	1,537	-3.3%	7,107	6,740	-5.2%	6,366	-5.5%
54 - Professional and Technical Services	212	225	6.1%	252	12.0%	6,967	6,871	-1.4%	6,842	-0.4%	22,215	21,721	-2.2%	21,334	-1.8%
55 - Management of Companies and Enterprises	10	9	-10.0%	13	44.4%	317	430	35.6%	392	-8.8%	1,001	1,212	21.1%	1,141	-5.9%
56 - Administrative and Waste Services	76	75	-1.3%	78	4.0%	2,366	2,486	5.1%	2,456	-1.2%	9,320	9,845	5.6%	9,730	-1.2%
61 - Educational Services	20	18	-10.0%	14	-22.2%	696	721	3.6%	739	2.5%	2,487	2,581	3.8%	2,669	3.4%
62 - Health Care and Social Assistance	95	93	-2.1%	105	12.9%	4,242	4,380	3.3%	4,497	2.7%	17,371	17,811	2.5%	18,102	1.6%
71 - Arts, Entertainment, and Recreation	20	17	-15.0%	15	-11.8%	683	692	1.3%	694	0.3%	3,063	3,124	2.0%	3,050	-2.4%
72 - Accommodation and Food Services	111	122	9.9%	129	5.7%	3,268	3,415	4.5%	3,536	3.5%	15,500	16,062	3.6%	16,437	2.3%
81 - Other Services, Ex. Public Admin	127	117	-7.9%	150	28.2%	3,959	3,919	-1.0%	4,001	2.1%	16,787	16,550	-1.4%	16,947	2.4%
99 - Unclassified	NA	NA	NA	NA	NA	297	102	-65.7%	131	28.4%	1,120	410	-63.4%	473	15.4%
TOTAL	**1,435**	**1,422**	**-0.9%**	**1,470**	**3.4%**	**42,945**	**42,834**	**-0.3%**	**42,001**	**-1.9%**	**175,463**	**174,290**	**-0.7%**	**169,790**	**-2.6%**
as a % of county / as a % of state	**3.3%**	**3.3%**		**3.5%**		**24.5%**	**24.6%**		**24.7%**						

Source : MA EOLWD, US County Business Patterns (BEA) and RKG Associates, Inc.

2. Average Wage

As indicated in Table III-3, the all industry sector average annual wage in Marlborough, Middlesex County and the state increased since 2006, with Marlborough exhibiting a near 22% growth. As a result, the average 2010 wage in Marlborough was nearly $86,500 or 35% greater than that for the county and 60% greater than that for the state. The consumer price index (CPI) inflation over the 2006 to 2010 period was roughly 8.2%, indicating that many industry sectors did not experience a real increase in wages, in each location, with some sectors actually experiencing a decline in average wage. In Marlborough, these sectors included wholesale trade and arts/entertainment.

Table III-3 – Average Annual Wage by Industry Sector

Industry Sector and 2-Digit NAICS	Marlborough, MA					2006 to	Middlesex County, MA					2006 to	Massachusetts					2006 to
Avg Annual Payroll/Employee	2006	2008	% Chge	2010	% Chge	2010	2006	2008	% Chge	2010	% Chge	2010	2006	2008	% Chge	2010	% Chge	2010
11 - Forestry, Fish, Agriculture	NA	NA	NA	NA	NA		$35,951	$30,660	-14.7%	$36,143	17.9%	0.5%	$26,431	$28,861	9.2%	$30,118	4.4%	13.9%
21 - Mining	NA	NA	NA	NA	NA		$54,035	NA	NA	NA	NA	NA	$62,123	$76,456	23.1%	$79,725	4.3%	28.3%
22 - Utilities	NA	NA	NA	NA	NA		$71,404	$122,740	71.9%	$126,351	2.9%	77.0%	$81,557	$97,976	20.1%	$102,544	4.7%	25.7%
23 - Construction	$56,391	$58,041	2.9%	$67,736	16.7%	20.1%	$58,531	$64,245	9.8%	$63,561	-1.1%	8.6%	$55,609	$60,260	8.4%	$61,060	1.3%	9.8%
31 - Manufacturing	$113,328	$117,815	4.0%	$134,087	13.8%	18.3%	$72,607	$71,842	-1.1%	$73,756	2.7%	1.6%	$57,040	$58,399	2.4%	$61,306	5.0%	7.5%
42 - Wholesaled Trade	$88,811	$89,797	1.1%	$84,906	-5.4%	-4.4%	$78,676	$87,265	10.9%	$94,553	8.4%	20.2%	$68,614	$72,032	5.0%	$77,256	7.3%	12.6%
44 - Retail Trade	$23,378	$24,400	4.4%	$25,856	6.0%	10.6%	$26,709	$26,164	-2.0%	$28,396	8.5%	6.3%	$25,170	$25,426	1.0%	$26,648	4.8%	5.9%
48 - Transportation and Warehousing	$24,357	$35,833	47.1%	$34,287	-4.3%	40.8%	$37,234	$35,964	-3.4%	$36,264	0.8%	-2.6%	$38,300	$38,895	1.6%	$39,285	1.0%	2.6%
51 - Information	$75,991	$93,753	23.4%	$123,946	32.2%	63.1%	$96,573	$100,942	4.5%	$109,601	8.6%	13.5%	$65,607	$83,274	26.9%	$86,716	4.1%	32.2%
52 - Finance and Insurance	$63,852	$71,954	12.7%	$130,028	80.7%	103.6%	$68,388	$79,344	16.0%	$79,588	0.3%	16.4%	$93,216	$102,328	9.8%	$104,810	2.4%	12.4%
53 - Real Estate and Rental and Leasing	$46,464	$47,314	1.8%	$56,662	19.8%	21.9%	$53,856	$48,940	-9.1%	$57,471	17.4%	6.7%	$51,078	$50,791	-0.6%	$56,602	11.4%	10.8%
54 - Professional and Technical Services	$108,971	$111,571	2.4%	$138,472	24.1%	27.1%	$85,362	$96,989	13.6%	$101,976	5.1%	19.5%	$77,538	$88,282	13.9%	$91,938	4.1%	18.6%
55 - Management of Companies and Enterprises	$52,784	$68,105	29.0%	$84,134	23.5%	59.4%	$77,305	$113,959	47.4%	$120,277	5.5%	55.6%	$80,661	$102,083	26.6%	$108,640	6.4%	34.7%
56 - Administrative and Waste Services	$39,347	$46,438	18.0%	$50,035	7.7%	27.2%	$38,447	$43,800	13.9%	$46,353	5.8%	20.6%	$35,957	$37,601	4.6%	$38,853	3.3%	8.1%
61 - Educational Services	$38,363	$39,821	3.8%	$39,694	-0.3%	3.5%	$42,132	$46,146	9.5%	$47,861	3.7%	13.6%	$34,232	$38,374	12.1%	$39,271	2.3%	14.7%
62 - Health Care and Social Assistance	$35,248	$37,571	6.6%	$38,882	3.5%	10.3%	$41,586	$45,872	10.3%	$47,660	3.9%	14.6%	$42,172	$45,713	8.4%	$46,709	2.2%	10.8%
71 - Arts, Entertainment, and Recreation	$14,128	$14,526	2.8%	$13,608	-6.3%	-3.7%	$21,494	$23,303	8.4%	$22,550	-3.2%	4.9%	$30,843	$32,147	4.2%	$33,869	5.4%	9.8%
72 - Accommodation and Food Services	$18,275	$18,456	1.0%	$18,956	2.7%	3.7%	$17,460	$17,839	2.2%	$19,318	8.3%	10.6%	$17,505	$17,663	0.9%	$19,089	8.1%	9.0%
81 - Other Services, Ex. Public Admin	$29,979	$29,348	-2.1%	$29,321	-0.1%	-2.2%	$29,885	$32,226	7.8%	$31,675	-1.7%	6.0%	$27,255	$28,782	5.6%	$29,510	2.5%	8.3%
99 - Unclassified	NA	NA	NA	NA	NA	NA	$31,227	$24,870	-20.4%	$22,989	-7.6%	-26.4%	$30,139	$25,485	-15.4%	$22,063	-13.4%	-26.8%
TOTAL	**$71,042**	**$76,148**	**7.2%**	**$86,480**	**13.6%**	**21.7%**	**$55,254**	**$61,578**	**11.4%**	**$64,270**	**4.4%**	**16.3%**	**$48,647**	**$52,632**	**8.2%**	**$54,090**	**2.8%**	**11.2%**
2006 to 2010 growth less than inflation																		
as a % of county / as a % of state	128.6%	123.7%		134.6%			113.6%	117.0%		118.8%								

Source: MA EOLWD, US County Business Patterns (BEA) and RKG Associates, Inc.

3. Employment

In terms of employment (refer to Table III-4) all three locations realized employment growth from 2006 to 2008, and then experienced a loss of employment between 2008 and 2010. Marlborough exhibited the greatest percent increase in the prior period (4%) and the greatest percent decline (-6.4%) in the latter period. The overall 2006 to 2010 employment decline in Marlborough was -730 jobs (-2.6%), however, the loss in specific industry sectors was much steeper, including construction (-765), manufacturing (-430), information services (-265) and administration (-235). Total employment decline in Middlesex County from 2006 through 2010 was -20,400 (-2.5%) and in Massachusetts -115,500 (-3.8%). All three locations realized an increase in employment in the health sector over this time with Marlborough adding 335 jobs, the county 13,200 and the state 64,100.

Table III-4 – Employment by Industry Sector

Industry Sector and 2-Digit NAICS	Marlborough, MA					Middlesex County, MA					Massachusetts				
Number of Employees	2006	2008	% Chge	2010	% Chge	2006	2008	% Chge	2010	% Chge	2006	2008	% Chge	2010	% Chge
11 - Forestry, Fish, Agriculture	NA	NA	NA	NA	NA	81	94	16.0%	70	-25.5%	1,178	1,121	-4.8%	1,061	-5.4%
21 - Mining	NA	NA	NA	NA	NA	85	NA	NA	NA	NA	1,247	1,253	0.5%	1,039	-17.1%
22 - Utilities	NA	NA	NA	NA	NA	2,255	2,283	1.2%	2,013	-11.8%	12,200	12,744	4.5%	12,861	0.9%
23 - Construction	761	682	-10.4%	784	15.0%	34,954	34,457	-1.4%	27,274	-20.8%	132,559	130,933	-1.2%	102,086	-22.0%
31 - Manufacturing	6,393	7,164	12.1%	5,627	-21.5%	67,503	64,151	-5.0%	56,239	-12.3%	275,180	263,538	-4.2%	226,698	-14.0%
42 - Wholesaled Trade	3,287	3,224	-1.9%	2,858	-11.4%	47,327	48,183	1.8%	42,395	-12.0%	144,638	142,838	-1.2%	129,557	-9.3%
44 - Retail Trade	3,518	3,527	0.3%	3,380	-4.2%	84,145	81,338	-3.3%	79,241	-2.6%	368,028	360,885	-1.9%	343,890	-4.7%
48 - Transportation and Warehousing	192	162	-15.6%	189	16.7%	16,745	17,194	2.7%	16,029	-6.8%	77,550	79,730	2.8%	75,037	-5.9%
51 - Information	1,638	1,564	-4.5%	1,371	-12.3%	40,600	46,767	15.2%	43,498	-7.0%	118,145	104,825	-11.3%	96,450	-8.0%
52 - Finance and Insurance	852	993	16.5%	1,391	40.1%	30,333	31,890	5.1%	29,081	-8.8%	211,046	221,263	4.8%	197,247	-10.9%
53 - Real Estate and Rental and Leasing	238	196	-17.6%	210	7.1%	12,859	12,147	-5.5%	11,280	-7.1%	48,917	46,020	-5.9%	41,659	-9.5%
54 - Professional and Technical Services	3,894	4,151	6.6%	4,210	1.4%	108,421	118,040	8.9%	117,900	-0.1%	260,770	258,607	-0.8%	247,470	-4.3%
55 - Management of Companies and Enterprises	439	518	18.0%	446	-13.9%	54,368	43,017	-20.9%	40,967	-4.8%	103,788	87,452	-15.7%	84,941	-2.9%
56 - Administrative and Waste Services	1,413	1,374	-2.8%	1,180	-14.1%	52,901	53,160	0.5%	51,483	-3.2%	186,355	203,889	9.4%	191,267	-6.2%
61 - Educational Services	179	176	-1.7%	158	-10.2%	70,432	74,335	5.5%	72,824	-2.0%	182,257	185,030	1.5%	192,514	4.0%
62 - Health Care and Social Assistance	1,925	2,096	8.9%	2,258	7.7%	95,007	102,125	7.5%	108,178	5.9%	499,919	536,378	7.3%	564,011	5.2%
71 - Arts, Entertainment, and Recreation	283	279	-1.4%	311	11.5%	10,075	10,126	0.5%	9,388	-7.3%	48,761	52,268	7.2%	51,323	-1.8%
72 - Accommodation and Food Services	2,186	2,189	0.1%	2,072	-5.3%	53,737	57,111	6.3%	54,684	-4.2%	247,654	264,045	6.6%	252,157	-4.5%
81 - Other Services, Ex. Public Admin	633	651	2.8%	655	0.6%	29,637	30,646	3.4%	28,755	-6.2%	122,149	121,059	-0.9%	116,647	-3.6%
99 - Unclassified	NA	NA	NA	NA	NA	480	254	-47.1%	190	-25.2%	1,739	691	-60.3%	630	-8.8%
TOTAL	**27,841**	**28,957**	**4.0%**	**27,111**	**-6.4%**	**811,945**	**827,386**	**1.9%**	**791,554**	**-4.3%**	**3,044,080**	**3,074,569**	**1.0%**	**2,928,545**	**-4.7%**
as a % of county / as a % of state	**3.4%**	**3.5%**		**3.4%**		**26.7%**	**26.9%**		**27.0%**						

Source: MA EOLWD, US County Business Patterns (BEA) and RKG Associates, Inc.

4. Conclusions

The number of businesses in Marlborough increased between 2008 and 2010 by slightly more than 3%. This is dissimilar to both the county and the state which lost businesses over this time period. Marlborough has more businesses in 2010 when compared with 2006, also dissimilar to the county and state. Business growth in Marlborough was most pronounced in the professional and technical services along with the health care industry. The all industry sector average annual wage in Marlborough, in 2010, was nearly $86,500 and well above that for both the county and state. This wage represents a near 22% increase since 2006 and greater than the approximate 8% inflation since that time. However, wages in some industry sectors did not keep pace with inflation including wholesale trade, education, arts/entertainment and accommodations and food services. Despite an increase in the number of businesses in Marlborough (2008 to 2010), there was a loss of more than 1,800 in employment representing a near 6.5% decline, which outpaced the percentage decline in either the county or the state. Losses in Marlborough employment were most prominent in manufacturing and information services. Employment growth in Marlborough was most noticed in finance/insurance and the health care industries.

C. Comparative Quotients

As reasonable reflection of how a local economy is performing can be measured by comparing employment growth, for specific industry sectors, to that of a larger economy. In this instance, the changes in employment in Middlesex County are compared with those for Massachusetts. This measurement, or ratio, is typically referred to as a location quotient (LQ). If the ratio in employment is near 1.0 (often plus or minus 20%), this indicates that

Middlesex County is performing similar (or on par) to the larger area, in terms of employment growth and concentration in that industry sector. If the ratio is less than 1.0, then Middlesex County is under-performing in that industry sector relative to the state. A location quotient greater than 1.0 indicates a better performance in the county when compared to the state. In this analysis the location ratios were developed for 2006, 2008 and 2010, with the change in the ratio also presented (Table III-5).

- In 2010 the sectors of the county economy that were outperforming the state economy included information services (and the case since 2006); professional/technical services (also since 2006); management (which has declined somewhat since 2006); and, education and manufacturing which have steadily outpaced the state.

- Underperforming sectors of the Middlesex County economy include finance, health care and arts/entertainment.

Table III-5 – Location Quotients and Wage Ratios by Industry Sector

Industry Sector and 2-Digit NAICS	Location Quotients					Wage Ratios				
Middlesex County *vs* Massachusetts	2006	2008	% Chge	2010	% Chge	2006	2008	Base Chge	2010	Base Chge
11 - Forestry, Fish, Agriculture	0.26	0.31	20.9%	0.24	-21.7%	136.0%	106.2%	(0.298)	120.0%	0.138
21 - Mining	0.26	NA	NA	NA	NA	87.0%	NA	NA	NA	NA
22 - Utilities	0.69	0.67	-3.9%	0.58	-13.0%	87.6%	125.3%	0.377	123.2%	(0.021)
23 - Construction	0.99	0.98	-1.1%	0.99	1.1%	105.3%	106.6%	0.014	104.1%	(0.025)
31 - Manufacturing	0.92	0.90	-1.6%	0.92	1.5%	127.3%	123.0%	(0.043)	120.3%	(0.027)
42 - Wholesaled Trade	1.23	1.25	2.2%	1.21	-3.4%	114.7%	121.1%	0.065	122.4%	0.012
44 - Retail Trade	0.86	0.84	-2.3%	0.85	1.8%	106.1%	102.9%	(0.032)	106.6%	0.037
48 - Transportation and Warehousing	0.81	0.80	-1.0%	0.79	-1.4%	97.2%	92.5%	(0.048)	92.3%	(0.002)
51 - Information	1.29	1.66	28.7%	1.67	0.6%	147.2%	121.2%	(0.260)	126.4%	0.052
52 - Finance and Insurance	0.54	0.54	-0.6%	0.55	1.8%	73.4%	77.5%	0.042	75.9%	(0.016)
53 - Real Estate and Rental and Leasing	0.99	0.98	-0.5%	1.00	2.1%	105.4%	96.4%	(0.091)	101.5%	0.052
54 - Professional and Technical Services	1.56	1.70	8.8%	1.76	3.9%	110.1%	109.9%	(0.002)	110.9%	0.011
55 - Management of Companies and Enterprises	1.96	1.83	-6.9%	1.78	-2.4%	95.8%	111.6%	0.158	110.7%	(0.009)
56 - Administrative and Waste Services	1.06	0.97	-9.0%	1.00	2.8%	106.9%	116.5%	0.096	119.3%	0.028
61 - Educational Services	1.45	1.49	3.0%	1.40	-6.3%	123.1%	120.3%	(0.028)	121.9%	0.016
62 - Health Care and Social Assistance	0.71	0.71	-0.7%	0.71	0.3%	98.6%	100.3%	0.017	102.0%	0.017
71 - Arts, Entertainment, and Recreation	0.77	0.72	-7.1%	0.68	-6.0%	69.7%	72.5%	0.028	66.6%	(0.059)
72 - Accommodation and Food Services	0.81	0.80	-1.2%	0.80	-0.2%	99.7%	101.0%	0.013	101.2%	0.002
81 - Other Services, Ex. Public Admin	0.91	0.94	3.4%	0.91	-3.0%	109.6%	112.0%	0.023	107.3%	(0.046)
99 - Unclassified	1.03	1.37	32.0%	1.12	-18.3%	103.6%	97.6%	(0.060)	104.2%	0.066
TOTAL	**1.00**	**1.00**	**0.0%**	**1.00**	**0.0%**	**113.6%**	**117.0%**	**0.034**	**118.8%**	**0.018**

Source : US County Business Patterns (BEA) and RKG Associates, Inc.

20 basis points or 20% above Massachusetts

Another comparative measure of economies is the contrast between average wage rates, indicating a potential strength or cluster effect to a local economy relative to the state, noting:

- The all industry sector average annual wage in Middlesex County has exceeded that for Massachusetts in all years in the analysis, and as more or less been 20%+ above that for the state in several industry sectors.

- The average wage in Middlesex County is less than that for the state in the finance sector and in arts/entertainment. However (as noted in Table III-3) the average finance sector wage in Marlborough in 2010 was $130,000, more than 60% greater than the county and nearly 25% greater than the state, likely reflecting some level of employment at Fidelity.

IV. RESIDENTIAL MARKET CONDITIONS

This chapter presents the supply and demand indicators that would influence any potential residential opportunities for the Route 20 Corridor Study Area in the City of Marlborough, Massachusetts. First, supply conditions are reviewed, followed by an analysis of renter households and the rental market, and then owner households and the for-sale market. The chapter concludes with a forecast of annual housing demand in the City of Marlborough.

A. Housing Supply Trends and Characteristics

According to US Census statistics, as shown in Table IV-1, Marlborough had nearly 16,420 housing units in 2010, and experienced a net increase of 1,510 units (10%) since 2000. This indicated an average of 150 units per year over the decade. Despite the gain in housing, household growth did not keep pace as occupied units increased by only 895 over the decade, resulting in an increase of 620 vacant units by 2010. As shown in Table IV-1, the ownership rate declined from 61% in 2000 to 58% in 2010, while the rental rate increased from 39% to 42%. As the growth in supply of residential units outpaced total household growth, the overall vacancy rate increased from below 3% in 2000 to more than 6% in 2010.

Table IV-1 - Marlborough: Housing Supply Statistics

			Change		% of Total [1, 2]	
	2000	2010	#	%	2000	2010
Total Housing Units	14,903	16,416	1,513	10.2%	100%	100%
Occupied Units	14,501	15,395	894	6.2%	97.3%	93.8%
Owner Households	8,842	8,921	79	0.9%	61.0%	57.9%
Renter Households	5,659	6,474	815	14.4%	39.0%	42.1%
Vacant Units	402	1,021	619	154.0%	2.7%	6.2%
For rent	165	500	335	203.0%	1.1%	3.0%
For sale only	58	157	99	170.7%	0.4%	1.0%
Rented, not occupied	45	15	(30)	-66.8%	0.3%	0.1%
Sold, not occupied	16	27	11	70.2%	0.1%	0.2%
For seasonal, recreational, or occasional use	59	69	10	16.9%	0.4%	0.4%
All other vacants	59	253	194	328.8%	0.4%	1.5%
Homeowner vacancy rate	0.7%	1.7%	1.0%	--	--	--
Rental vacancy rate	2.8%	7.2%	4.4%	--	--	--
Year-Round Housing	14,844	16,347	1,503	10.1%	99.6%	99.6%
Chapter 40-B SHI [3]	786	1,668	882	112.2%	5.3%	10.2%
[1] Except Owner & Renter Households are represented as % of Occupied Units						
[2] For Chapter 40-B housing it is the % of year-round housing in 2000 and 2010						
[3] SHI-Subsidized Housing Inventory as of Oct 2001 & May 2012						
Source: US Census and RKG Associates. Inc.						

Other comments from a review of the data in Table IV-1 are highlighted below:

- In 2010, almost 50% of the vacant units were for rent while 15% were available for sale. The increase in vacant units caused the homeowner vacancy rate to increase to 1.7% in 2010, and the rental vacancy rate to increase to 7.2%.

- The year-round housing supply, after deducting for seasonal use units, was 16,347 units in 2010, and the current supply of affordable units (1,668) under the Chapter 40B program indicates that the City of Marlborough surpassed the 10% benchmark outlined in the legislation.

- The supply of Chapter 40B housing more than doubled over the last decade rising from nearly 790 units in 2001 to almost 1,670 units in 2012. Effectively, the Chapter 40B housing represents nearly 25% of the rental stock in Marlborough in 2012.

1. Building Permit Data

According to US Census, over 1,300 units were permitted during the 2000's, as shown in Table IV-2. This figure was lower than the net change (1,500) in housing units over the last decade, suggesting that additional units were permitted prior to 2000, and built afterwards.

Table IV-2 – City of Marlborough: Building Permits- Units by Type

	Units in Structure			
Year/ Period	Single-Family	2 to 4 units	5 or More Units	Total Units
2000	93	9	473	575
2001	59	0	90	149
2002	38	0	0	38
2003	54	6	0	60
2004	51	2	0	53
2005	24	0	341	365
2006	15	2	0	17
2007	7	2	17	26
2008	10	0	7	17
2009	3	0	0	3
Total	354	21	928	1,303
2010	22	0	0	22
2011	19	0	0	19
2000-04 Ann AVG	59	3	113	175
2005-09 Ann AVG	12	1	73	86
2010-11 Ann AVG	21	0	0	21
Source: US Census & RKG Associates, Inc				

Referring to Table IV-2, permit activity was much higher during the early part of the decade, as annual housing production averaged 175 units per year and 65% were in multi-unit structures. However, the average annual pace declined to 86 units per year over the last half of the decade, and over 88% of units were in multi-unit structures as shown in the table. In total, nearly 950 units in multi-unit structures were permitted, while only 354 single-family permits were issued over the last decade. The pace of single-family development averaged 59 units/year between 2000 and 2004 and declined to 12 units/year between 2005 and 2009.

B. Renter Households Trends and Characteristics

This section identifies trends and characteristics of renter households in the City of Marlborough from decennial census data (2000 to 2010). In 2010, the City of Marlborough had 15,395 households and 42% were renters, as shown in Table IV-3. Renter households increased by 815 over the last decade, and accounted for 91% of the growth in households since 2000 in the City of Marlborough. Most of the growth in renter households over the last decade occurred in the 45 to 54 years cohort (434) followed by those in the 55 to 64 years cohort (306) and in the 65 years and older cohort (221). In 2010, renter households in two cohorts 25 to 44 years, combined, represented almost 50% of renter households or 18% of total households. However, small declines were indicated in these two cohorts, which were offset by increases in the three older cohorts, including many of the "baby-boom" generation, age (45 to 64 years in 2010).

Over the last decade, nearly all the growth in renter households in Marlborough occurred among those households earning $75,000 or more, as they increased by 727 households, or 89.1% of the total, combined. Most growth occurred in those renter households earning $100,000 to $149,999 (495), as shown in Table IV-3. In addition, Marlborough experienced an increase of nearly 250 households earning less than $25,000, while those earning $25,000 to $49,999 declined over the last decade. This increase in households at the lower income cohort was primarily attributed to an increase in Chapter 40-B housing as the city reached the statewide goal of 10% over the last decade, unlike many of its neighboring towns.

Other observations from a review of the data in Table IV-3 include:

- The median income level for renter households was nearly $42,490 in 2010, and reflected a 7% increase since 2000, well below the 27% increase in median gross rent over the same time period. Using the standard of 30% of income for the cost of housing, a renter household at the median income level could afford a rent of $1,060 per month, which is less than 3% greater than the median rent ($1,030/month). This finding indicates an "affordable" rental market from a statistical perspective.
- Marlborough experienced an increase of over 313 renter households over the last decade residing in single-unit structures. This was likely a result of the housing crisis, as more single-family residences became rental units due to the downturn in the for-sale housing market and increased numbers of foreclosures.
- Marlborough experienced an increase of 627 renter households over the last decade residing in 10 unit-or-more structures as a result of new apartment complex construction. Since 2000, three major projects containing over 760 units were built in Marlborough, namely Avalon Orchards (156 units); Stone Gate (332 units); and Bell Wheeler Hill (274 units).

Table IV-3 – City of Marlborough Renter Household Characteristics & Trends (2000 - 2010)

			Change		% of Total H'holds	
City of Marlborough	2000	2010	#	%	2000	2010
Total Households	14,501	15,395	894	6.2%	100.0%	100.0%
Renter Households	5,659	6,474	815	14.4%	39.0%	42.1%
Renter H'holds by Age						
less than 25 years	461	463	2	0.4%	3.2%	3.0%
25 to 34 years	1,872	1,783	(89)	-4.8%	12.9%	11.6%
35 to 44 years	1,485	1,426	(59)	-4.0%	10.2%	9.3%
45 to 54 years	731	1,165	434	59.4%	5.0%	7.6%
55 to 64 years	389	695	306	78.7%	2.7%	4.5%
65 years & older	721	942	221	30.7%	5.0%	6.1%
Renter H'holds by Income						
Less than $25,000	1,725	1,974	249	14.4%	11.9%	12.8%
$25,000 to $49,999	1,846	1,684	(162)	-8.8%	12.7%	10.9%
$50,000 to $74,999	1,147	1,148	1	0.1%	7.9%	7.5%
$75,000 to $99,999	529	580	51	9.7%	3.6%	3.8%
$100,000 to $149,999	317	812	495	156.3%	2.2%	5.3%
$150,000 or more	95	275	180	189.5%	0.7%	1.8%
Median Renter H'hold $	$39,755	$42,487	$2,732	6.9%	--	--
Renter Units in Structure						
Single unit	461	774	313	68.0%	3.2%	5.0%
Mobile Home	34	26	(8)	-23.3%	0.2%	0.2%
2 to 4 units	1,681	1,689	8	0.5%	11.6%	11.0%
5 to 9 units	610	484	(126)	-20.6%	4.2%	3.1%
10 to 19 units	1,374	1,761	387	28.2%	9.5%	11.4%
20 or more units	1,499	1,739	240	16.0%	10.3%	11.3%
Renters by Gross Rent [1]					% Renters	
No Rent to $750	2,389	1,453	(936)	-39.2%	42.2%	22.4%
$750 to $999	1,915	1,786	(129)	-6.8%	33.8%	27.6%
$1,000 to $1,249	611	1,139	527	86.2%	10.8%	17.6%
$1,250 to $1,499	408	1,077	669	164.2%	7.2%	16.6%
$1,500 to $1,999	188	752	563	298.8%	3.3%	11.6%
$2,000 or more	144	268	123	85.4%	2.6%	4.1%
Median Gross Rent	$811	$1,030	$219	27.0%	--	--
Renters by period moved in					% Rntr	% Total
Moved in 2005 or later	--	4,000	--	--	61.8%	26.0%
Moved in 2000 or 2004	--	1,484	--	--	22.9%	9.6%
Moved in 1990 to 1999	--	763	--	--	11.8%	5.0%
Moved in 1980 to 1989	--	131	--	--	2.0%	0.8%
Moved in prior to 1980	--	96	--	--	1.5%	0.6%
[1] % of Total H'holds is % Renter H'holds only in this group						
Source: US Census; American Community Survey & RKG Associates, Inc.						

- Referring to Table IV-3, the median rent in Marlborough increased to $1,030 in 2010 indicating a 27% change since 2000. As shown in Table IV-3, apartments with rents of $1,000 or more increased (collectively) by 1,880 units, from 1,350 in 2000 to 3,235 in 2010, when they accounted for 50% of the citywide rental stock. The largest increase occurred in apartments renting for $1,250 to $1,499 (669), while the increase in units with rents of $1,500 to $1,999 was almost four-fold over the last decade. In 2010, renters paying $1,500 or more in Marlborough accounted for 6.6% of total households, or 15.7% of renter households.

- Approximately 62% of renter households in 2010 moved into their units between 2005 and 2009. In absolute terms, this represented 3,185 households after accounting for growth (815). The resulting turnover averaged about 640 households per year during this period, and equated to an average annual renter turnover rate of 9.8%.

C. Apartment Market Conditions and Trends

RKG obtained a 2012 first quarter apartment market, *SubTrend Futures Report*, for the West/Northwest Suburban (Boston) from REIS, Inc. The REIS report provides historic trends over the past five years; quarterly data for the last eight quarters, and five-year forecasts. Comparison statistics with Greater Boston were also prepared, and in some cases, the Northeast and the nation as a whole. This section presents the statistics and key findings drawn from a review of the REIS report. Map IV-1 exhibits the boundaries of the submarket, including the City of Marlborough and many communities in Middlesex County along the northwestern and western portion of Greater Boston between I-495 and I-95 (Route 128).

Map IV-1 – West/Northwest Suburban Boston Submarket

1. Regional Conditions and Recent Trends

In the 1st quarter (1Q) of 2012, REIS identified a supply of 19,045 apartment units[2] in the West/Northwest Suburban submarket having a vacancy rate of 3.9% and an average effective rental rate of $1,427 per month, as shown Table IV-4 (this is for all apartment types and bedroom counts, combined). The effective rent was approximately 6% lower than the average asking rate of $1,521 per month.

No new apartments came online in 2011 or the first quarter of 2012, as the last project completed (262 units) occurred in the 2nd quarter of 2010. Over the last five years, new apartment construction ranged from no units (2011) to 902 units (2008) and averaged nearly

[2] This represents approximately 9% of the 219,600 renter occupied households in Middlesex County, or 26% of the renters living in structures with 20 units or more (73,500) in Middlesex County.

290 units per year. However, over the last eight quarters, new construction averaged 33 units per quarter, which if annualized would equal approximately 130 units per year. The growth rate in new supply averaged 1.5% annually since 2007, but at less than 1% per year over the last eight quarters.

Table IV-4 – West/Northwest Suburban: Apartment Market Statistics (2007 – 2012, 1Q)

Year	Supply in Units	Comp-letions	Supply Growth	Vacant Units	Vacancy Rate	Net Ab-sorption	Asking Rent	Ask $ % Chg	Effective Rent	Eff $ % Chg	Discount (Eff-Ask)
2007	17,741	423	2.4%	727	4.1%	354	$1,413	2.8%	$1,311	1.0%	-7.2%
2008	18,643	902	5.1%	1,025	5.5%	604	$1,490	5.4%	$1,387	5.8%	-6.9%
2009	18,783	140	0.8%	1,071	5.7%	94	$1,444	-3.1%	$1,335	-3.7%	-7.5%
2010	19,045	262	1.4%	1,124	5.9%	209	$1,505	4.2%	$1,401	4.9%	-6.9%
2011	19,045	0	0.0%	857	4.5%	267	$1,504	-0.1%	$1,405	0.3%	-6.6%
1Q-12	19,045	0	0.0%	743	3.9%	114	$1,521	1.1%	$1,427	1.6%	-6.2%
2007-12 (AVG)	18,717	288	1.5%	925	4.9%	274	$1,480	1.7%	$1,378	1.9%	-6.9%
Qtr -Year	Supply in Units	Comp-letions	Supply Growth	Vacant Units	Vacancy Rate	Net Ab-sorption	Asking Rent	Ask $ % Chg	Effective Rent	Eff $ % Chg	Discount (Eff-Ask)
2Q-10	19,045	262	1.4%	1,295	6.8%	94	$1,465	1.0%	$1,358	1.9%	-7.3%
3Q-10	19,045	0	0.0%	1,181	6.2%	114	$1,481	1.1%	$1,376	1.3%	-7.1%
4Q-10	19,045	0	0.0%	1,124	5.9%	57	$1,505	1.6%	$1,401	1.8%	-6.9%
1Q-11	19,045	0	0.0%	1,067	5.6%	57	$1,504	-0.1%	$1,402	0.1%	-6.8%
2Q-11	19,045	0	0.0%	1,000	5.3%	67	$1,508	0.3%	$1,406	0.3%	-6.8%
3Q-11	19,045	0	0.0%	971	5.1%	29	$1,516	0.5%	$1,413	0.5%	-6.8%
4Q-11	19,045	0	0.0%	857	4.5%	114	$1,504	-0.8%	$1,405	-0.6%	-6.6%
1Q-12	19,045	0	0.0%	743	3.9%	114	$1,521	1.1%	$1,427	1.6%	-6.2%
2010-12 (Q-AVG)	19,045	33	0.2%	1,030	5.4%	81	$1,501	0.5%	$1,399	0.7%	-6.8%

Source: REIS, Inc. & RKG Associates, Inc.

Since 2007, the vacancy rate reached a peak of 5.9% in 2010 and declined to 3.9% in 2012 (1Q). This decline was due primarily to the absorption of 270 units in 2011, followed by a net gain of 115 units through the first quarter of 2012. Very little new stock came on-line during this period, and increased demand drove the vacancy rate down. Since 2007, absorption averaged approximately 275 units per year in the submarket, and 80 units per quarter since April 2010, as shown in Table IV-4. The average asking rent ranged from $1,465 (2007) to $1,521 (1Q, 2012) indicating a 1.7% annual rate of increase (compounded) since 2007. The increase in effective rent was slightly greater (1.9%) since the discount between the two decreased from over 7% in 2007 to just over 6% in 2012 (2Q). REIS reported that concessions in 2012 (1Q) or the length of time of free rent was 0.75 months in the West/Northwest Suburban submarket, or about 23 days.

a) Regional Apartment Mix and Price Characteristics

Table IV-5 presents a breakdown of the unit mix, as well as the average rental pricing by unit sizes (the Greater Boston region is included for comparison purposes). Two-bedroom units represented more than 52% of the sample, and 40.4% are one-bedroom units, with studios (5.4%) and three-bedroom units (1.9%) making up the remainder.

Table IV-5 - Apartment Mix and Price Characteristics (1Q, 2012)

West/Northwest Suburban	Studios	1-bdrm	2-bdrm	3-bdrm
Unit Mix	5.4%	40.4%	52.3%	1.9%
AVG Rent	$974	$1,368	$1,675	$2,132
AVG SF	552	770	1,064	1,338
AVG $/SF	$1.76	$1.78	$1.57	$1.59
Greater Boston				
AVG Rent	$1,261	$1,603	$1,911	$2,537
AVG SF	493	767	1,080	1,328
AVG $/SF	$2.56	$2.09	$1.77	$1.91
West/Northwest Suburban	**Asking Rent Growth Rates**			
Quarterly	Studios	1-bdrm	2-bdrm	3-bdrm
4q-11	-2.1%	-1.8%	-0.1%	0.0%
1q-12	2.1%	2.8%	0.4%	-0.6%
Annualized (average over period ending 12/31/2011)				
1-yr	5.6%	0.3%	-0.8%	2.7%
3-yr	0.7%	0.5%	0.1%	-0.1%
5-yr	-0.5%	1.6%	2.0%	2.0%
Source: REIS, Inc. & RKG Associates, Inc.				

As shown in Table IV-5, average rents ranged from $974 (studio) to $2,132 (three-bedroom), and equated to between $1.57/SF (two-bedroom) to $1.78/SF (one-bedroom), based on the average unit sizes of each apartment type. Asking rents in the West/Northwest Suburban submarket were lower across all unit types than in Greater Boston ranging from 14% lower (two-bedroom) to 30% lower (studio), indicating a competitive advantage on price for the submarket. The asking rents for studio and one-bedroom units increased by more than 2% during the 1st quarter of 2012, while rents for three-bedroom units declined as shown in Table IV-5. Over the past five years, rents for one- and two-bedroom units increased by 1.6% to 2% per year, while rents for studio units actually declined, and rents for three-bedroom units increase at 2% per year.

Table IV-6 exhibits the average rental price and vacancy rate by the period in which a complex was developed. Average rents were the highest for the newest units built (post-2009) and the vacancy rate was among the lowest. For apartments in projects built over the last decade, which accounted for 20% of the sample, the average asking rent ($1,797) was nearly 18% higher than the overall average and 48% lower than the more recently built units. The vacancy rate (4.0%) at the complexes built between 2000 and 2009 was however slightly higher than average (3.9%). The average asking rent at all projects developed prior to 1980 were lower than the overall average, as shown Table IV-6. The average asking rents at projects developed during the 1990's were almost 29% higher than the overall average; however, the vacancy rate was higher than for other properties. Referring to Table IV-6, nearly 50% of the sample was build during the 1970's, and as a result the average age of the sample was 1981. The average number of units in each development was 195 units.

Table IV-6 - Rent, Vacancy Rate & Mix by Age of Development

Period Built	Asking Rent	Vacancy Rate	Supply by Age
Post-2009	$3,172	3.4%	3%
2000-09	$1,797	4.0%	20%
1990-99	$1,955	5.7%	4%
1980-89	$1,732	3.8%	5%
1970-79	$1,301	3.9%	50%
Pre-1970	$1,381	3.4%	18%
AVERAGE	$1,521	3.9%	
AVG Yr Blt	AVG # of Units		Exp . %
1981	195		42.9%
Source: REIS, Inc. & RKG Associates, Inc.			

2. Local Apartment Market Conditions and Regional Comparison

RKG tabulated asking rents at nine apartment complexes in Marlborough which contained almost 2,430 units, (or nearly 13% of the REIS submarket sample). These properties indicated the following average unit sizes, average monthly rents and resulting average rent per SF (Table IV-7). It should be noted that one property (Princeton Green Apartments) containing 195 units or 8% of the Marlborough sample was located in the Route 20 Study Area. Fair market rents (FMR) for FY-2012 are also shown for comparison purposes in Table IV-8 with those in Marlborough and the REIS report[3], summary findings include:

Table IV-7 – Sample of Apartments Complexes in Marlborough, MA

	Princeton Green Apartments	Brook Village East	Avalon Orchards	Applebriar Apartments	Stone Gate	Bell Wheeler Hill	The Meadows at Marlborough	The Heights at Marlborough	Royal Crest Estates
	740 Farm Road	319 East Main St #A8	3 Avalon Dr; Route 20	20 Applebriar Lane	65 Silver Leaf Way	21 Austen Way	141 Broadmeadow St	39-5 Briarwood Lane	19 Royal Crest Drive
# of Unit	195	222	156	164	332	274	264	348	473
Year Built	1970	1968	2002	1989/2006	2007	2002		1973/2000	1970/2000
Apt Sizes (AVG)									
Studio	379	500							
1-bdrm	658	800	1,093	859	823	799	510	480	700
2-bdrm	868	1,000	1,333	1,271	1,160	1,140	905	888	1,050
3-bdrm					1,340			1,170	
Monthly Rent (AVG)									
Studio	$969	$750							
1-bdrm	$1,189	$900	$1,600	$1,440	$1,385	$1,221	$1,045	$1,045	$1,094
2-bdrm	$1,349	$1,100	$2,105	$1,983	$1,725	$1,630	$1,285	$1,383	$1,266
3-bdrm					$2,089			$1,835	
Mo. Rent/SF									
Studio	$2.56	$1.50							
1-bdrm	$1.81	$1.13	$1.46	$1.68	$1.68	$1.53	$2.05	$2.18	$1.56
2-bdrm	$1.55	$1.10	$1.58	$1.56	$1.49	$1.43	$1.42	$1.56	$1.21
3-bdrm					$1.56			$1.57	
Source: Rent.net; Apartments.com & RKG Associates, Inc.									

- A couple of the Marlborough developments offered studio units, with an average size of 468 SF and asking monthly rent of $890, equating to about $1.90 per SF. The studio units in the study area had a smaller average size, while asking rents averaged $970 per month, or 9% higher than in Marlborough. This studio rate in the Study Area was similar to that in the West/Northwest Suburban market ($974), but well

[3] This is determined by the Department of Housing and Urban Development (HUD) and is a measure used to set rents for Section 8 vouchers in the region

below the average in the Greater Boston region ($1,260) for studio units. By way of comparison, FMR[4] for studios ($1,099) was about 13% higher than indicated in the Study Area, or 23% higher for the City of Marlborough.

Table IV-8 – Regional Comparison of Sampled Apartment Inventory - Unit Mix, Size, Pricing

	Average Unit Size by Type (in SF)			
Comparative Area	Studio	1-bdrm	2-bdrm	3-bdrm
Route 20 - Study Area	379	658	868	--
City of Marlborough	468	747	1,061	1,255
West/Northwest Suburban	552	770	1,064	1,338
Greater Boston	493	767	1,080	1,328
	Average Asking Rent by Type			
Comparative Area	Studio	1-bdrm	2-bdrm	3-bdrm
Route 20 - Study Area	$969	$1,189	$1,349	--
Marlborough	$890	$1,191	$1,490	$1,962
West/Northwest Suburban	$974	$1,368	$1,675	$2,132
Greater Boston	$1,261	$1,603	$1,911	$2,537
Fair Market Rent [1]	$1,099	$1,166	$1,369	$1,637
	Average Asking Rent by Type per SF			
Comparative Area	Studio	1-bdrm	2-bdrm	3-bdrm
Study Area	$2.56	$1.81	$1.55	--
Marlborough	$1.90	$1.59	$1.40	$1.56
West/Northwest Suburban	$1.76	$1.78	$1.57	$1.59
Greater Boston	$2.56	$2.09	$1.77	$1.91
[1] Boston-Cambridge-Quincy MA-NH HUD Metro FMR Area (FY-2012)				
Source: US HUD; REIS, Inc.; Rent.net et al; & RKG Associates, Inc.				

- Referring to Table IV-8, the average one-bedroom unit was approximately 660 SF in size in the Study Area, as compared to nearly 750 SF in the City of Marlborough. The average asking monthly rent was $1,189 in the Study Area, relatively the same as in the City of Marlborough ($1,191). However, the rate per SF was higher in the Study Area ($1.81/SF) than citywide ($1.59/SF), and comparable with the West/Northwest Suburban submarket ($1.78/SF) for one-bedroom unit. The FMR for a one-bedroom unit ($1,166) was slightly lower than indicated in the Study Area and citywide.

- Two-bedroom units in the Study Area (868 SF) were 18% smaller than in the City of Marlborough (1,061 SF) as shown in Table IV-8, which was fairly similar to that in the West/Northwest Suburban submarket (1,064 SF). The average asking rent for two-bedroom units in the Study Area ($1,349) was about 10% lower than citywide ($1,490), which in turn was 11% lower than the West/Northwest Suburban submarket ($1,675). The FMR for 2-bedroom units ($1,369) was most similar to that in the Study Area, and 28% lower that indicated for Greater Boston ($1,911).

- Some apartment complexes also offered three-bedroom units at an average of $1,962 in the City of Marlborough for a 1,255 SF unit or $1.56/SF. These local rates and sizes were lower (smaller) than in the West/Northwest Suburban market or Greater Boston, as shown in Table IV-8.

[4] Boston-Cambridge-Quince MA-NH HUD Metro FMR Area (FY2012)

3. Five-Year Forecasts

REIS, Inc. indicates that new apartment completions will come on line in 2012 in the West/Northwest Suburban market, and continue over the next five years (Table IV-9). A total of nearly 1,000 units are projected to be built over the next five years in the West/Northwest Suburban submarket, indicating an average of nearly 200 units per year. Net absorption is forecasted to total just over 992 households over the next five years, for an average of 198 units per year. Absorption is projected to be the strongest in 2013, at 590 households in the submarket, which would drive the vacancy rate (3%) to its lowest point over the forecast period. Subsequently, the forecasted pace of new completions would outpace absorption, and by 2016, the vacancy rate would rise to 4.3%. Referring to Table IV-9, monthly asking rents are projected to increase from $1,584 in 2012 to $1,833 in 2016, indicating an average annual increase of 4.2%. The effective rate is projected to increase by 4.9% per year, as the discount between asking and effective rents is forecasted to decline from -5.4% to -3.5% in 2016.

Table IV-9 – West/Northwest Suburban: Apartment Market Forecast (2012 – 2016)

Year	Supply in Units	Comp-letions	Supply Growth	Vacant Units	Vacancy Rate	Net Ab-sorption	Asking Rent	Ask $ % Chg	Effective Rent	Eff $ % Chg	Discount (Eff-Ask)
2012	19,155	110	0.6%	745	3.9%	222	$1,584	5.3%	$1,499	6.7%	-5.4%
2013	19,591	436	2.3%	588	3.0%	593	$1,653	8.7%	$1,569	4.7%	-5.1%
2014	19,841	250	1.3%	754	3.8%	84	$1,723	4.2%	$1,645	4.8%	-4.5%
2015	19,901	60	0.3%	896	4.5%	(82)	$1,774	3.0%	$1,717	4.4%	-3.2%
2016	20,042	141	0.7%	862	4.3%	175	$1,833	3.3%	$1,768	3.0%	-3.5%
2012-16 (AVG)	19,706	199	1.0%	769	3.9%	198	$1,713	4.2%	$1,640	4.9%	-4.3%

Source: REIS, Inc. & RKG Associates, Inc.

4. Conclusions

The rental market in Marlborough experienced significant expansion over the last decade as three major projects containing 760 units were developed representing a 12% gain in the rental housing supply. This increase in new apartments explained why over 90% of the increase in households in Marlborough over the last decade came from renters. The regional market is anticipated to expand by another 1,000 units or so over the next five years, or by 5%. Absorption is forecasted to be sufficient to fill the new units while occupancy rates are forecasted to remain above 95%. Average rents in the region are anticipated to increase by over 4% per year and by 2016 would average nearly $1,770 per month. If a suitable site(s) in the Route 20 Corridor was available, an apartment complex of 150 to 250 units could be planned and phased in over time. This would equate to between 30% and 50% of demand for new rental housing in Marlborough over the next five-years, as discussed later.

D. Owner Households Trends and Characteristics

The following sections identify conditions in the residential for-sale market in the City of Marlborough. This section identifies trends and characteristics of owner households in the City of Marlborough from decennial census data (2000 to 2010), and the subsequent section identifies for-sale market conditions and trends.

In 2010, the City of Marlborough had 15,395 households and 58% were owners, as shown in Table IV-10. Owner households increased by about 80 over the last decade, and represented for 9% of the growth in households since 2000 in the City of Marlborough. Most of the growth in owner households over the last decade occurred in the 55 to 64 years cohort (442) followed by those in the 45 to 54 years cohort (358) and in the 65 years and older cohort (212). Declines were most evident in the 35 to 44 years group (-616) followed by the 25 to 34 years group (-324).

Table IV-10 – City of Marlborough: Owner Household Characteristics & Trends (2000 - 2010)

			Change		% of Total H'holds	
City of Marlborough	2000	2010	#	%	2000	2010
Total Households	14,501	15,395	894	6.2%	100%	100%
Owner Households	8,842	8,921	79	0.9%	61.0%	57.9%
Owner H'holds by Age						
less than 25 years	57	64	7	12.3%	0.4%	0.4%
25 to 34 years	1,168	844	(324)	-27.7%	8.1%	5.5%
35 to 44 years	2,365	1,749	(616)	-26.0%	16.3%	11.4%
45 to 54 years	2,025	2,383	358	17.7%	14.0%	15.5%
55 to 64 years	1,429	1,871	442	30.9%	9.9%	12.2%
65 years & older	1,798	2,010	212	11.8%	12.4%	13.1%
Owner H'holds by Income						
Less than $25,000	1149	605	(544)	-47.3%	7.9%	3.9%
$25,000 to $49,999	1,716	1,534	(182)	-10.6%	11.8%	10.0%
$50,000 to $74,999	1,934	1,332	(602)	-31.1%	13.3%	8.6%
$75,000 to $99,999	1,562	1,104	(458)	-29.3%	10.8%	7.2%
$100,000 to $149,999	1,639	2,410	771	47.0%	11.3%	15.7%
$150,000 or more	842	1,937	1,095	130.0%	5.8%	12.6%
Median Renter H'hold $	$70,017	$96,840	$26,823	38.3%	--	--
Owner Unit in Structure						
Single unit	7,293	7,582	289	4.0%	50.3%	49.2%
Mobile Home	479	324	(155)	-32.3%	3.3%	2.1%
2 to 4 units	698	431	(267)	-38.3%	4.8%	2.8%
5 to 9 units	103	36	(67)	-65.3%	0.7%	0.2%
10 to 19 units	150	342	192	128.1%	1.0%	2.2%
20 or more units	124	206	82	66.4%	0.9%	1.3%
Owners by Values [1]					% Owners	
Less than $100,000	230	317	87	37.7%	2.6%	3.6%
$100,000 to $199,999	4,724	714	(4,009)	-84.9%	53.4%	8.0%
$200,000 to $299,999	2,602	2,030	(572)	-22.0%	29.4%	22.8%
$300,000 to $399,999	891	3,191	2,300	258.1%	10.1%	35.8%
$400,000 to $499,999	292	1,237	945	323.8%	3.3%	13.9%
$500,000 & up	103	1,432	1,328	1288%	1.2%	16.0%
Median Owner Value	$190,600	$343,800	$153,200	80.4%	--	--
Owners by period moved in					% Ownr	% Total
Moved in 2005 or later	--	1,329	--	--	14.9%	8.6%
Moved in 2000 or 2004	--	2,364	--	--	26.5%	15.4%
Moved in 1990 to 1999	--	2,621	--	--	29.4%	17.0%
Moved in 1980 to 1989	--	994	--	--	11.1%	6.5%
Moved in prior to 1980	--	1,613	--	--	18.1%	10.5%

[1] % of Total H'holds is % Onwer H'holds only in this group

Source: US Census; American Community Survey & RKG Associates, Inc.

In 2010, owner households in the two "baby-boom" generation cohorts (age 45 to 64), combined, and accounted for almost 48% of owner households or 28% of total households. The elderly cohort (age 65+) accounted for another 23% of owner households, or 13% of total households. Households in the age 35-to-44 cohort declined from 16% representation of total households in 2000 to 11% in 2010, and the age 25-to-34 group fell from 8% representation in 2000 to almost 6% in 2010. Over the last decade, all the growth in owner households in the city occurred among those households earning $100,000 or more, as they increased by 1,870 households, combined. Most growth occurred in those owner households earning $150,000 or more (1,095), as shown in Table IV-10. Other observations from a review of the data in Table IV-10 include:

- The median income level for owner households was $96,840 in 2010, and reflected a 38% increase since 2000. However, this increase was well below the 80% increase in median income value over the decade.
- In terms of affordability, a home valued at the median ($343,800) in Marlborough, according to the data in Table IV-10, would require income within $72,000 to $95,000 range, depending on down-payment and interest rate[5]. The high-end of the required income ($95,000) is almost 2% below the median owner household income level, suggesting a relatively "affordable" and balanced owners' market, at least statistically.
- Almost 85% of the owner households in 2010 resided in single-family homes, and these households increased by 290 over the last decade. Owner households residing in 10-unit-or-more structures also increased, collectively, by 275 households. Combined these gains only partially offset the loss of households residing in mobile homes, and 2-to-9 unit structures, such that the net gain in households was 80 over the last decade.
- The median value of owner units increased to nearly $344,000, a gain of 80% since 2000. As shown in Table IV-10, units valued at $500,000 or more increased by nearly 14-fold over the last decade, and represented an estimated 16% of total owner housing in 2010. This estimate by US Census/American Community Survey of 2010 housing value in the City of Marlborough may be overstated since the median value of single-family sales peaked at nearly $360,000 in 2005 and by 2011 declined to $256,000 (as shown later in Figure IV-3) representing an nearly 30% loss in value since the peak in the mid-2000's.
- Approximately 15% of the owner households moved into their housing unit in 2005 or later. In absolute terms, this represented 1,250 households after discounting for growth (79). The resulting turnover averaged about 250 households per year during this period, and equated to an average annual owner turnover rate of 2.8%.

E. For-Sale Market Conditions

This section reviews trends in the number of single-family and condominium tax parcels between 1989 and 2011 in order to understand the current supply of for-sale housing in the City, and how it has changed over the last two decades or so, based on data obtained from the Massachusetts Division of Local Services (DLS) of the Department of Revenue[6]. Next, sales data from the Warren Group of single-family and condominiums are evaluated including sales volume and median sale prices. The sales activity of upper-priced condominiums ($200,000 and up) over the last five years are analyzed in order to understand the strength of that market sector. This section concludes with a discussion of major projects underdevelopment within Marlborough that would compete with any major for-sale project proposed for the Route 20 Corridor Study Area.

1. Trends in Single-Family and Condominium Tax Parcels

Figure IV-1 shows the trends in the number of single-family tax parcels in the City of Marlborough between 1989 and 2011, based on data obtained from the DLS. Table IV-11

[5] The low end is factored on a 20% down-payment and 3.75% interest rate (fixed) for a 30-year mortgage, while the high end is factored on a 5% down-payment and 5% interest rate.

[6] The tax parcel data is from LA-4 forms for FY-2000 to FY-2012 inclusive, and represent conditions as of January 1 of the prior year. In other words, FY-2000 data is as of January 1, 1999 and so on.

exhibits the statistics for select periods over the time-frame, and the average annual change during the different periods for reference purposes. Single-family tax parcels in Marlborough increased from 5,772 parcels in 1989 to 6,962 parcels in 2011, for a net gain of 1,190 parcels over the 22-year period. However, the development of new single-family parcels in the 1990's outpaced development in the 2000's by a factor of nearly 4 to 1. Approximately, 880 single-family parcels, as shown in Table IV-11 were development during the 1990's as compared to 228 parcels during the 2000's.

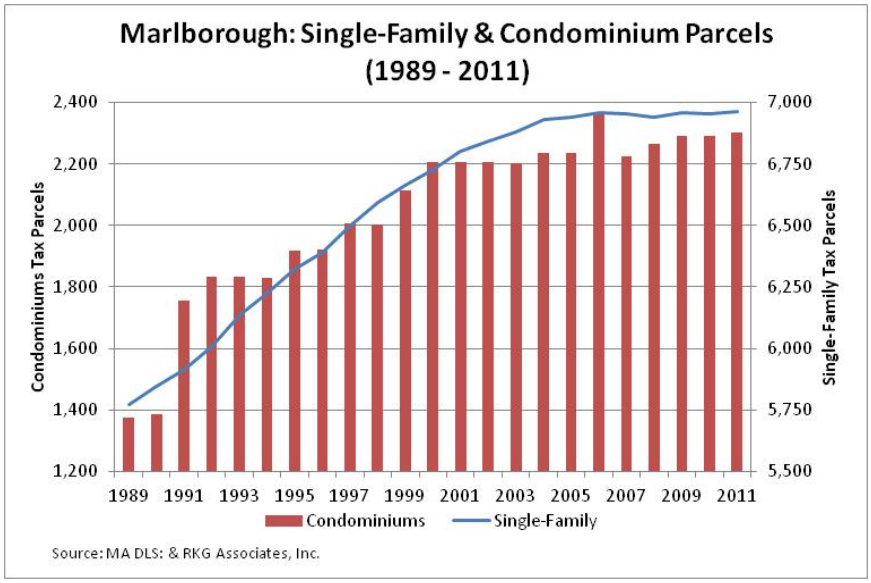


Figure IV-1 – Trends in Single-Family & Condominium Parcels (1999-2011)

With regard to condominium development, the pace in the 1990's outperformed that of the 2000's by a factor of nearly 10 to 1. As shown in Table IV-11, the increase in condominium parcels during the 1990's totaled nearly 820 units as compared to 86 units over the last decade. Therefore, the average annual pace of new single-family parcels was 23 units per year during the 2000's, while condominiums averaged 9 units per year. This slowdown in production of for-sale housing over the last decade was likely the main reason that renter households outpaced the growth in owner households by 10 to 1 between 2000 and 2010.

Table IV-11 – Marlborough: Single-Family & Condominium Tax Parcels

Year & Periods	Single-Family	Condo-minium	Total
1989	5,772	1,375	7,147
2000	6,726	2,206	8,932
2011	6,962	2,303	9,265
# Change by Period			
1989-1990	73	12	85
1990-2000	881	819	1,700
2000-2010	228	86	314
2010-2011	8	11	19
Total	1,190	928	2,118
Annual Average by Period			
1989-2011	54	42	96
1990-2000	88	82	170
2000-2010	23	9	31
Source: MA DLS & RKG Associates, Inc.			

2. For-Sale Market Activity

Sales activity of single-family homes and condominium units from 1987 to 2011 are illustrated in Figure IV-2. The peak of sales of single-family homes in Marlborough occurred in 1998, when over 426 homes sold, and sales of single-family homes were the highest between 1996 and 1999 when they averaged 420 sales per year. Since then, sales exceeded the 400 sales per year benchmark only once in 2003. Activity between 2000 and 2006 for single-family homes was also strong averaging 350 sales per year, ranging from 306 sales in 2006, to 407 in 2003.

As shown in Figure IV-2, sales of single-family homes started to slow in 2006 (306) which was 20% below 2005 (384). Sales in 2007 (237) reflected another 23% decline from 2006. In the last five years (2007-2011) single-family sales averaged 235 sales per year; however, 2011 (191) was the slowest year during that period. The 92 sales through June-2012 suggest another slow year for single-family sales in Marlborough unless activity in the second half of the year increases. Condominium sales also fluctuated severely over the past 22 years in Marlborough as shown in Figure IV-2. Between 1998 and 2006, condominium sales ranged from 298 in 2000 to 227 in 1998, and averaged nearly 260 sales per year. However, condominium sales on average dropped by 51% over the next five years as they averaged 127 sales per year between 2007 and 2011, and activity in the last two years (118 and 117, respectively) was below the 5-year average. The 57 condominium sales through June 2012 suggest another soft year in Marlborough, unless activity in the second half increases.

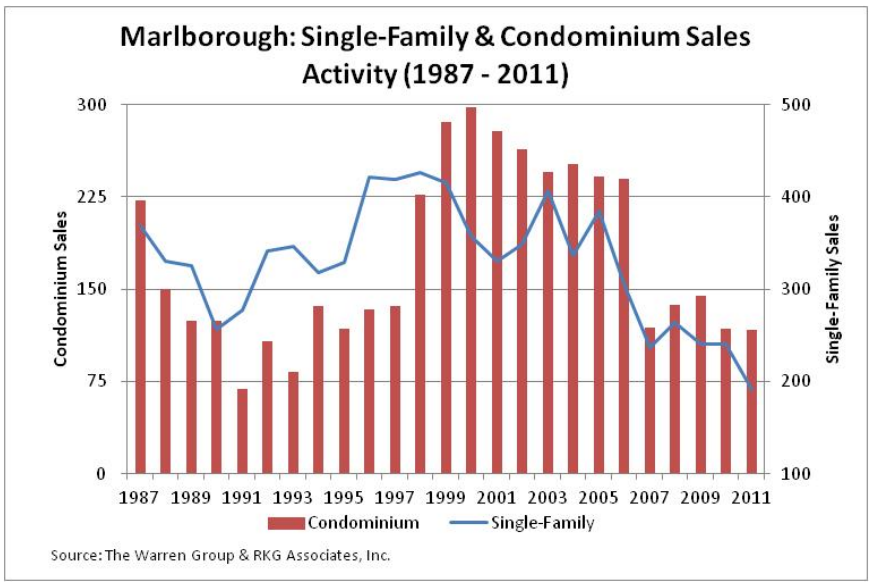


Figure IV-2 – Sales Activity in Marlborough

This slowdown in sales in both single-family and condominiums is due in part to the national recession/credit crisis; however, the limited new supply of for-sale housing is partly to blame, but more than likely, the amount of foreclosure auctions that occurred in Marlborough over the last five plus years is a major reason. As show in Table IV-12, auctions of single-family homes ranged from 53 (2007) to 103 (2009) and averaged nearly 80 auctions of single-family homes over this period. Auctions of condominiums have averaged 75 units per year, and when comparing the number of auctions to average sales activity over the last 5+ years suggest that for every 2.7 sales of single family homes there is a foreclosure auction for

a single family home, and for every 1.5 condominium sales there would be a condominium foreclosure auction. These ratios suggest a weak owner market since existing and new homes would be competing with foreclosures and/or bank-owned properties if not sold at auction. The statistics indicate that the number of auctions lessened over the last year and a half, since 2011 activity was 45% lower than in 2010, the height of the activity. Annualizing year-to-date auctions in 2012 (152) suggest a 10% lower amount than in 2011, and the lowest amount since 2007. As discussed next, the median prices of single-family homes and condominiums were impacted severely since 2007, and more than likely this was due in part to this foreclosure activity.

Table IV-12 – Marlborough: Foreclosure Auctions

Year	Period	Single-Family	Condo-minium	All
2012	Jan - Jun	27	27	76
2011	Jan - Dec	61	68	169
2010	Jan - Dec	88	113	309
2009	Jan - Dec	103	76	273
2008	Jan - Dec	93	92	260
2007	Jan - Dec	53	37	124
	5.5 yr Average	77	75	220
	AVG # of Sales	211	116	394
Sales/Foreclosures		2.7	1.5	1.8
Source: The Warren Group & RKG Associates, Inc.				

3. Median Sale Price

The median sale price in 2011 was $256,000 for single-family homes and $130,000 for condominiums, a 53% and 49% increase from 1987, respectively. However, the 2011 median pricing (Figure IV-3) for both single-family and condominiums was 29% to 46% lower than their peak price over the last decade respectively. The median value for single-family homes peaked at nearly $360,000 in 2005 and for condominiums at $240,000 in 2007.

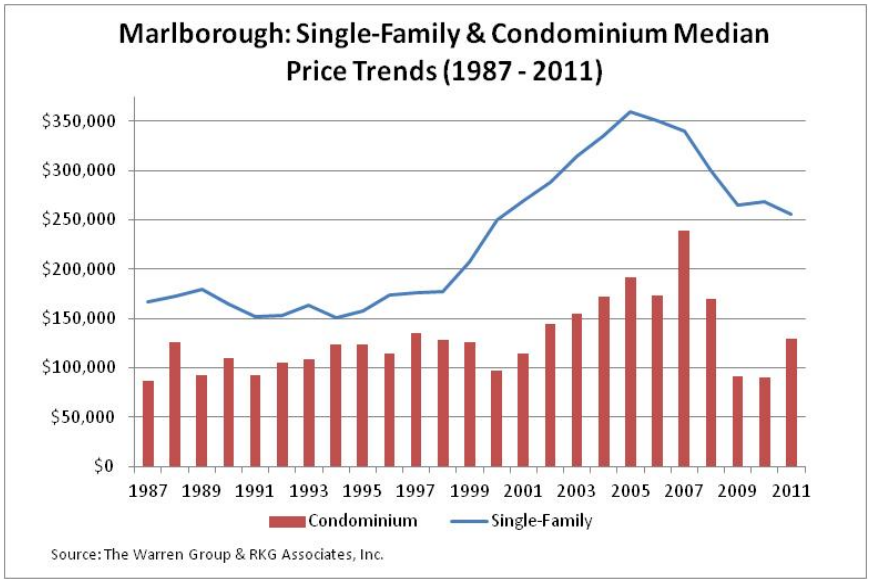


Figure IV-3 – Median Sale Price Trends in Marlborough

As shown in Figure IV-3, median prices for single-family homes ranged in the mid-to-upper $100,000 range during the 1990's, averaging $163,300 between 1990 and 1998. In 1999, the median value exceeded the $200,000 level, and by 2003 exceeded the $300,000 level rising to its peak of $359,950 in 2005. In 2009, the median value dropped to $265,000, and had ranged between $256,000 (2011) and $268,000 since then. The median value was $263,500 in June 2012 or 2.9% higher than in 2011. Median prices for condominiums were equally erratic. In 2000, the median was less than $97,000 and then over the next seven years increased to $239,500 for a 2.5-fold increase. In 2009 median value for condominiums declined to $91,000 in 2009 and stayed there for another year. In 2011, the median price rebounded to $130,000 for condominiums; however, median pricing through June 2012 declined to $106,000, suggesting the bottom for condominium pricing may not have been reached. This may be due in part to the high percentage of condominium foreclosures.

4. Sales Activity of Condominiums $200,000 or more and Current Listings

RKG used the Warren Group sales data base to identify sales activity of condominiums over the last five years priced at the upper end ($200,000 and up) in Marlborough, as well as the Study Area. The results are exhibited in Table IV-13, which shows that condominiums valued at $200,000 or more averaged 55 sales per year, citywide, ranging from 70 sales in 2009/2010 to 32 sales in 2010/2011. Sales in the $200,000 to $249,999 range accounted for 45% of the total, while those in the $250,000 to $299,999 range accounted for another 33% of the upper-end activity. Sales of units valued at $350,000 or more average 2 sales per year, although activity in 2007/2008 was 7 as shown in Table IV-13. This was the same year that 8 new condominiums sold for the highest amount in any year during this period.

Sales activity in the Study Area averaged 17 sales per year at $200,000 or more. Activity was highest in 2007/2008 at 22 per year, including 10 sales in the $300,000 to $399,999 range, accounting for nearly 40% of the citywide sales in that price range. Sales activity in the last year totaled 19 sales and was more than twice that in 2010/2011 as shown below. However, more than half the sales were in the $200,000 to $249,999 range, and only 2 above the $300,000 price point. The number of current listings from Realtor.com with prices of $200,000 or more is also shown in Table IV-13. A total of 29 listings were indicated in Marlborough including 8 listings for new construction. These 29 listings equate to 53% of the average number of sales indicating a 5-to-6 month supply. However, 48% were valued at $300,000 or more, while historic sales at this price equated to less than 20% of total sales. Six listings of condominiums were in the Study Area, and nearly all were priced in the $250,000 to $299,999 range, including two new units at Farm Commons.

Some of the new condominiums projects priced at the upper end in Marlborough include the following age restricted (55-and-over):

- The Toll Brothers are developing Regency at Assabet Ridge, a 69-unit, senior, townhouse project with homes start at $340,000. Five different designs are offered ranging in size from 1,600 SF to over 2,100 SF. Two-car garages are typically included, as well as 1st floor master bedrooms. The units are attached in 2-to-4 unit buildings. The Toll Brothers also have two other projects under-development in neighboring Westborough:
    - The Meadows, townhouses starting in the mid-$300,000 range and

  - The Terraces, garden-style units starting in the mid-$200,000s

- Farm Commons is a 55-and-over community of 10 detached single-family homes starting at $274,900. This project is in the southwest portion of the Study Area off Farm Road.
- Renaissance Lofts, a 30-unit mill conversion, where remaining units (11) can be rented ranging from $1,800 to $2,500 per month, or purchased from $272,900 to $439,000. Leasing with an option to buy is also available.
- A duplex building with 2 townhouse units at 27 Harvard Street priced from $299,999.
- A number of single-family development in Marlborough are also being marketed including:
  - Cider Mill Farm – a subdivision of 28 homes with priced starting from the high-$300's with eight different designs being offered.
  - The Village at Black Horse Farm has home sites (mini-farms) of one-acre or more, and horses are allowed. The project is located near the Wayside Inn in Sudbury, and ten home designs are available with finished homes priced from the mid-$600's.

Table IV-13 – Marlborough: Sales Activity of Upper-Priced Condominiums

Jun 1 to May 31	2007 2008	2008 2009	2009 2010	2010 2011	2011 2012	5-yr AVG	Current Listings
City of Marlborough							
$200-$249K	20	33	41	12	20	25	4
$250-$299K	19	20	25	11	16	18	11
$300-$349K	22	8	4	8	5	9	7
$350-$399K	4	0	0	1	1	1	6
$400k & up	3	0	0	0	1	1	1
Total	68	61	70	32	43	55	29
New Condos	8	4	2	2	6	4	8
Study Area							
$200-$249K	4	4	11	3	11	7	1
$250-$299K	8	6	6	4	6	6	5
$300-$349K	9	3	3	2	2	4	0
$350-$399K	1	0	0	0	0	0	0
$400k & up	0	0	0	0	0	0	0
Total	22	13	20	9	19	17	6
Source: The Warren Group; Realtor.com & RKG Associates, Inc.							

5. Conclusion

The for-sale market was stalled in Marlborough over the last decade as the amount of new single-family homes added per year (23) represented only one-quarter of that developed in the 1990's. Similarly, new condominium development averaged less than 10 units per year, as compared to an average of 80 units per year in the 1990's. In addition, most of the new for-sale developments were age-restricted further limiting their appeal. The slow-down in sales and new construction over the last five years was due in part by the national recession and credit crisis, and further exacerbated by the number of foreclosure auctions in

Marlborough. Statistics indicate that there was one auction for every three single-family sales and one auction for every 1.5 condominium sales. Permit activity slowed as a result.

Over the last five years, sales of upper end condominiums ($200,000 or more) averaged about 55 units per year, and those at the high-end ($300,000 or more) represented only 20% of this demand. In addition, the number of newly constructed units that sold over the last five years averaged 4 units per year, suggesting a fairly weak market at this time. Sales activity in the Study Area over the last the 5-year period accounted for more than 30% of citywide sales. Recently, most of the sales were in the $200,000 to $249,999 range, and likely below replacement cost, suggesting a limited market at this time for condominium type development. In addition, the sales in the study area are either townhouse-style units or prior apartment building conversions. Evidence of luxury "flats" in low-to-mid-rise buildings is not apparent today, nor is there a market to support such a development, given the higher costs for this type of construction.

As conditions in the for-sale market improve in the future, high-density, mid-rise buildings with for-sale units could be planned, depending on the long-term focus/vision of the Corridor, recognizing that this market may not be apparent for 5, if not 10 years, in the future.

V. NON-RESIDENTIAL MARKET CONDITIONS

This chapter identifies current conditions in the industrial and office market in the region and the City of Marlborough. RKG relied on quarterly market statistics from regional brokerage firms, such as Richards, Barry, Joyce and Partners, LLC and Jones Lang LaSalle. A sample of current availabilities of industrial and office properties was also tabulated from internet websites such as loopnet.com and showcase.com. A number of major planned developments in Marlborough were also identified, since any projects/redevelopment proposed for the Route 20 Corridor would compete with these other proposed projects.

A. Industrial Market Conditions

RKG obtained a 2nd quarter (summer) 2012 "indSTATus" report prepared by Richards, Barry, Joyce & Partners LLC that provided recent statists about the overall conditions in Greater Boston and its submarkets. The City of Marlborough is part of the "495-West" submarket, which is one of three submarkets of a geographically broad, suburban area referred to as the "495-Submarkets". Statistics for the "128-Submarkets" and a subcomponent, the "128-West" submarket, were tabulated and review for comparison purposes. Table V-1 exhibits key industrial market statistics for the different geographic areas, and the industrial building supply is divided into three different building types: warehouse (WHS); flexible space (FLEX); and manufacturing (MFG).

As shown, the 495-West submarket had 13.5 million square feet (SF) of industrial space, and almost 50% is warehouse space; 36% flexible space, and the remaining 15% manufacturing space. The 495-West submarket had 25% of the total industrial space in the 495-Submarkets, and 13% of that in the Greater Boston region.

Referring to Table V-1, the overall industrial vacancy rate was 17.6% in the 495-West submarket ranging from 14.8% for flex space to 19.6% for warehouse space. In absolute terms, the 495-West submarket had approximately 2.36 million SF of vacant industrial space, and 1.3 million SF was warehouse space (55%), 2.2 million SF flex space (30%) and 0.36 million SF of manufacturing space (15%). The overall vacancy rate for 495-West was lower than indicted in the Greater Boston region (18.7%), while the industrial vacancy rate in 128-West submarket (11%) was the lowest. This submarket had only 2% of the Greater Boston industrial supply as compared to 13% for the 495-West submarket.

Absorption of industrial space between the 2nd quarter of 2011 and 2012 in the Greater Boston region was positive as nearly 0.7 million SF became occupied, including 0.5 million SF in the 495-Submarkets, and 0.35 million SF in the 495-West submarket. Approximately 57% of the net absorption in the 495-West submarket was for warehouse space, while 35% for flexible space and the remaining 9% was manufacturing space. This positive absorption of industrial space in the 495-West submarket represented 51% of the demand in the Greater Boston industrial market over the last year.

The average asking price per SF for industrial space in the 495-West submarket was nearly $6.10/SF, ranging from $5.40/SF for warehouse space to nearly $7.20/SF for flexible space.

This overall rate was 5.2% higher than for the 495-Submarket ($5.78/SF) but 1.8% less than for Greater Boston ($6.19). The average rate in the Route 128-West submarket ($9.60/SF) for industrial space was among the highest in the region, and nearly 60% more than in the 495-West submarket.

Table V-1 – Greater Boston: Industrial Market Conditions (Summer 2012)

Building Supply (000s)	WHS	FLEX	MFG	Total
Greater Boston	57,290	27,345	16,456	101,091
128 Submarkets	21,421	12,549	7,080	41,050
128 West	154	1,066	1,002	2,222
495 Submarkets	31,928	14,053	6,819	52,800
495 West	6,611	4,768	1,973	13,352
Vacancy Rate	WHS	FLEX	MFG	Total
Greater Boston	19.8%	17.3%	17.2%	18.7%
128 Submarkets	19.9%	18.8%	14.6%	18.6%
128 West	0.0%	19.0%	4.2%	11.0%
495 Submarkets	19.8%	15.8%	18.1%	18.5%
495 West	19.6%	14.8%	18.0%	17.6%
Annual Absorption (000s)	WHS	FLEX	MFG	Total
Greater Boston	195	178	320	693
128 Submarkets	205	(101)	(101)	3
128 West	0	(31)	(34)	(65)
495 Submarkets	(75)	264	291	480
495 West	201	122	31	354
Annual Asking Price/SF	WHS	FLEX	MFG	Total
Greater Boston	$5.40	$7.94	$6.42	$6.19
128 Submarkets	$5.73	$8.61	$5.92	$6.64
128 West	N/A	$9.69	$9.21	$9.61
495 Submarkets	$5.10	$7.51	$6.13	$5.78
495 West	$5.40	$7.18	$6.38	$6.08

Source: Richard Barry Joyce & Partners; and RKG Associates, Inc.

1. Available Industrial Properties Marlborough

RKG identified 33 properties in the City of Marlborough that contained 2.74 million SF and had 1.5 million SF of available industrial space, as exhibited in Table V-2. The indicated availability rate from this sample of industrial buildings in Marlborough was nearly 55%.

The largest vacancy was the former Hewlett Packard/Digital complex of 740,000 SF on 110 acres that was dormant for some time. It was recently purchased (July 2011) for $8.7 million indicating a price of $12/SF of building area, or $79,100 per acre. This one property represents half the available industrial building area identified in the sample exhibited in Table V-2.

Table V-2 – Sample of Available and/or Vacant Industrial Space in Marlborough, MA (August 2012)

			# of	Year	Total Bldg	Available Bldg SF			Asking Rent/SF		For Sale	
Park/Bldg Name	Address	Bldg Type	Space	Built	SF	Min	Max	Total	Low	High	Price	$/SF
Fmr HP/Digital Complex [1]	200 Forest St	Ind/R & D	1	1970	740,000		740,000	740,000			$8,700,000	$12
PRIORITY SITE [1]	413 - 417 South St	Ind/Flex	1	2009	145,000		109,200	109,200		Neg		
Marlboro Ind Park	111 Locke Drive	Ind/Flex	2	1982	130,700	4,892	71,145	76,037		Neg		
Cedar Hill Business Park	259 Cedar Hill St	Flex	1	1985	56,250	1,000	56,250	56,250		Neg		
Available Industrial	289 Elm St.	Ind/Flex	1		80,000	25,000	50,000	50,000	$3.95		$3,200,000	$40
PRIORITY SITE [1]	362 Elm Street	Ind/Flex	1	2009	47,000		47,000	47,000				
Available Industrial	401 Elm St.	Ind/Flex	1	1960/88	133,000	15,000	37,000	37,000	$4.95		$11,250,000	$85
Solomon Pond Park	500 Donald Lynch Blvd	Ind/R & D	1	1987	58,408		35,249	35,249	$13.50			
495 Tech Center West	34 St. Martin Drive	Ind/WHS	4	1988	203,840	5,550	18,323	34,983	$5.75			
Available Industrial	445 Simarano Dr	Ind/WHS	1	1969	176,020		31,000	31,000		Neg		
Available Industrial	165-181 Cedar Hill St	Ind/Flex	3	1983	58,000	9,607	20,120	29,772	$5.95	$6.95		
Cedar Hill Ind. Ctr.	360 Cedar Hill St	Ind/WHS	1		119,819		27,533	27,533	$6.50			
Available Industrial	420 Northboro Rd	Ind/MFG	1	1970	22,500	12,500	22,500	22,500	$5.95			
Available Industrial	419 Lincoln St	Ind/Flex	1		22,000		22,000	22,000			$750,000	
Shoe Box Bldg	72 Jefferson St	Ind/Flex	5	1930	37,500		21,765	21,765	$7.00	$10.00		
Marlboro Ind Park	150-170 Locke Drive	Flex/R & D	1	1980	120,000		19,115	19,115		Neg		
Cedar Hill Business Park	257 Cedar Hill Rd	Flex	1	1986	56,577		16,125	16,125		Neg		
Marlboro Ind Park	140 Locke Dr	Flex	1	1977	45,000		15,000	15,000	$8.00			
Available Industrial	214 Cedar Hill Rd	Ind/Flex	1		28,500	4,000	15,000	15,000	$6.25			
Available Industrial	24 St. Martin Drive	Ind/Flex	1		70,625	14,700		14,700	$6.00			
Cedar Hill Business Park	237 Cedar Hill St	Ind/Flex	2	1986	28,162	2,800	9,800	9,800	$8.00		$4,211,750	$150
Available Industrial	135 Maple St	Ind/Flex	1		9,600	9,600		9,600			$900,000	$94
Solomon Pond Park	500 Donald Lynch Blvd	Ind/R & D	1		9,500	9,500		9,500	$13.50			
Available Industrial	208-214 Cedar Hill St	Ind/Flex	1	1986	28,172	8,000		8,000	$6.25			
Cedar Hill Business Park	753 Forest St	Ind/Flex	1	1986	75,000	7,956		7,956	Neg			
Available Industrial	249 Cedar Hill St	Ind/WHS	2		25,400	6,500		6,500	$8.00		$1,750,000	$69
Marlboro Tech - Annex 2	257 Simarano Dr	Ind/R & D	1		5,200	5,200		5,200	$8.50			
Cedar Hill Business Park	261 Cedar Hill St	Ind/Flex	1	1987	59,404	5,000		5,000	Neg			
Available Industrial	85 Ames St	Ind/MFG	1	1969	64,551	4,886		4,886	$9.95			
Available Ind. Condo	28 Lord Rd	Ind/Flex	1		4,770	4,770		4,770	$8.00		$548,000	$115
Available Ind. Condo	246 Maple St #2	Ind-Condo	1		2,541	2,541		2,541			$330,000	$130
Available Ind. Condo	28 Lord Rd	Ind/Flex	1		72,000	2,453		2,453		$13.95	$400,000	$163
Available Ind. Condo	246 Maple St #1	Ind-Condo	1		2,368	2,368		2,368			$169,000	$71
Total		N=33	45		2,737,407	163,823	1,384,125	1,498,803	$3.95	$13.95	$23,508,750	$53

[1] on 110 acres; sold in Aug 2011 for $8.7 million or $12/SF to Atlantic Management

Source: LoopNet.com; Showcase.com & RKG Associates, Inc.

Referring to Table V-2, one industrial property had over 100,000 SF of available (excluding Hewlett Packard) and 3 properties had available space of between 50,000 and 99,999 SF, and collectively these buildings accounted for another 19% of available space. Another 10 building had space available in the 20,000 SF to 49,999 SF range, and accounted for another 21% of the industrial building supply in Marlborough. The eighteen remaining industrial buildings had nearly 160,000 SF of available space ranging in size from 2,300 SF to 19,999 SF. These accounted for the remaining 11% of available industrial space in Marlborough.

The total amount of available space in Marlborough equates to 63% of all the vacant industrial space in the 495-West submarket. While demand in the 495-West submarket increased to over 350,000 SF in 2011, it would likely take 7 to 10 years for this available supply in Marlborough to be absorbed, if not longer. The high amount of available space limits demand for new construction, except for specific end-users with their own requirements, and this group is difficult to quantify.

Pricing for industrial space in Marlborough varies widely due to a number of reasons, including but not limited to size of space, age of building, utilities included in the rent, location, percentage of finished office space to name of few. Most industrial leases are quoted on a "net" basis, meaning that the tenant pays for utilities, building maintenance, insurance and other costs. The overall range is from a low of $3.95/SF to a high of $13.95/SF. The high-end is represented by a smaller industrial condominium with a high amount of finished area, while the low end is representative of a 50,000 SF offering that is also for sale for $40/SF suggesting a 10% cap rate.

2. Proposed Industrial Building Supply

In addition to the 1.5 million SF of available space, another 2.2 million SF is proposed for Marlborough and a portion of Northborough as shown in Table V-3. Eight of the 14 proposed industrial buildings are in Marlborough and contain over 670,000 SF, or 30% of the sample, while the remainder is in Northborough, and would be accessed via Marlborough. As shown below nearly all the pricing is negotiable since it would for the most part build-to-suit. Land prices for two parcels range between $50,000 and $60,000 per acre, or $6/SF to $7/SF of potential industrial building area.

Table V-3 – Proposed Industrial Building in Marlborough (August 2012)

Park/Bldg Name	Address	Type	Bldg SF	Price
Land (12 acres)	289A Elm St	Land - 12 Acres	100,000	$600,000
Land (24 acres)	401A Elm St.	Land - 24 Acres	200,000	$1,400,000
Crossroads Ind Park	Site H - Marlborough	Ind-Planned	194,200	Neg
Crossroads Ind Park	Site I - Marlborough	Ind-Planned	60,100	Neg
Crossroads Ind Park	Site J - Marlborough	Ind-Planned	43,500	Neg
Crossroads Ind Park	Site K - Malborough	Ind-Planned	28,800	Neg
Crossroads Ind Park	Site L - Marlborough	Ind-Planned	28,000	Neg
Crossroads Ind Park	Site M - Marlborough	Ind-Planned	17,500	Neg
Subtotal		N= 8	672,100	
Crossroads Ind Park	Site A-Northborough	Ind-Planned	350,000	Neg
Crossroads Ind Park	Site B-Northborough	Ind-Planned	350,000	Neg
Crossroads Ind Park	Site C-Northborough	Ind-Planned	330,900	Neg
Crossroads Ind Park	Site D-Northborough	Ind-Planned	300,000	Neg
Crossroads Ind Park	Site F - Northborough	Ind-Permitted	220,100	Neg
Crossroads Ind Park	Site G - Northborough	Ind-Planned	80,800	Neg
Total		N= 14	2,203,900	
Source: LoopNet.com; Showcase.com & RKG Associates, Inc.				

3. Conclusions

The regional industrial market is showing signs of improvement, since absorption was positive over the last year, unlike prior years. However, vacancy rates remain in the high teens, and rental pricing appears below the level to support new construction. Marlborough had an available industrial supply of nearly 1.5 million SF, which represented about 64% of the vacant supply in the 495/West submarket. Nearly 50% of the vacant/available industrial space was confined to the former Hewlett Packard complex which was recently sold for redevelopment purposes, and would compete with any industrial proposal within the Route 20 Corridor. Development trends in the Route 20 Corridor suggest that the Study Area does not have the locational attributes to capture future industrial/research and development opportunities, despite the presence of the Raytheon campus at its eastern edge. In addition to the 1.5 million SF of available industrial space, another 0.67 million SF of industrial building area is proposed for Marlborough, which increases to 2.2 million SF when including a portion of neighboring Northborough. All this proposed industrial development is located on the western side of the city, where access to the interstates (I-495 and I-290) is more convenient than from the Study Area. Industrial opportunities in the Route 20 Corridor appear to be limited due primarily to its poor highway accessibility as compared to other parts of the city.

B. Office Market Conditions

RKG obtained a 2nd quarter (summer) 2012 "officeSTATus" prepared by Richards, Barry, Joyce & Partners LLC (RBJ) that provided recent statists about the overall conditions in Greater Boston and its submarkets. RKG also obtained a 2nd quarter 2012 "Office Outlook" for the 495/Mass Pike submarket, prepared by Jones Lang LaSalle (JLL), who also provided historic trend data of the office market in Marlborough and its submarket. The data from these firms vary due to geography, inventories of buildings, information provided, and timing of absorption, to name a few. Each survey reports conditions on investor-owned, multi-tenant buildings, and exclude the owner-occupied supply. Recognizing these differences these two surveys provide a fairly clear understanding of office market conditions in the Greater Boston region, and its submarkets for this time period.

Table V-4 compares the statistics from each survey by different regions or submarkets. The City of Marlborough is part of the "495-West" submarket according to RBJ, or the 495 MA Pike submarket per JLL. Statistics for Greater and Suburban Boston are also exhibited as well as those for the City of Marlborough. The City of Marlborough, according to these surveys, has between 3.8 million and 4.2 million SF of office space. The former represents 30% of the 495/MA Pike submarket, while the latter represents 26% of the 495-West submarket. The submarket accounts for 14.5% to 16.3% of the Suburban Boston region, respectively, and in each case, the Suburban Boston region accounts for 55% of the Greater Boston supply.

As shown in Table V-4, the office vacancy rate in Marlborough ranged from 26% to 29% depending on the survey, and this range was higher than indicated in the other areas and Greater Boston where the vacancy was 15% (rounded). More importantly, the availability rate in Marlborough which includes sublease space was greater than 36% indicating an available office supply of 1.4 million SF, according to the JLL survey. This availability rate in Marlborough was much higher than in the other market areas, as shown in Table V-4 and due to losses of some major companies in Marlborough over the last year, including Fidelity Investments.

Table V-4 - Greater Boston: Office Market Conditions (Summer 2012)

	Greater Boston	Suburban Boston	495-W/ MA Pike	The Boroughs	Marl-borough
Richard Barry Joyce Survey					
Supply (000s)	176,727	97,859	15,918	8,737	4,186
% Vacant	15.5%	18.7%	18.3%	20.4%	25.9%
Absorption (000s) [1]	(313)	(316)	(193)	(153)	(151)
Absorption (000s) [2]	2,292	1,324	(36)	(29)	(80)
Class A - AVG Rent $	$38.75	$24.25	$20.79	$18.43	$17.47
% change [2]	5.8%	3.2%	2.0%	N/A	N/A
Jones Lang LaSalle Survey					
Supply (000s)	158,542	87,650	12,704	N/A	3,787
% Vacant	14.7%	17.7%	19.9%	N/A	29.1%
% Available	20.1%	23.0%	25.4%	N/A	36.5%
Absorption (000s) [3]	(271)	535	(90)	N/A	(90)
Class A - AVG Rent $	$34.30	$22.95	$18.81	N/A	$18.14
[1] In last quarter; [2] Over last 12 months; [3] Year to date (2 quarters)					
Source: Richard Barry Joyce & Partners; Jones Lang LaSalle; & RKG Associates, Inc.					

As in Table V-4, office absorption in Marlborough was negative over the last quarter (-0.08 million SF), two quarters (-0.09 million SF) and last year (-0.15 million SF), depending on the survey. This loss of occupied space in Marlborough accounted for as much as 100% of the net absorption in the 495 MA Pike submarket, suggesting that the local market was severely impacted by the losses, and did not benefit from any economic recovery experienced in other areas, where absorption was positive. In fact, Marlborough's negative absorption in the last quarter (RBJ) accounted for 48% of the total loss in office space in the Suburban Boston region.

Rental pricing in Marlborough ranged from $17.50 to $18.10/SF depending on the survey and was lower than the other regions or submarkets. This lower pricing is likely attributed to the high amount of available supply, and rents below the cost to build new. Brokers reported that rents to support new office construction would need to be in the mid-$20 range if not higher. In essence, the office market in Marlborough remains weak at this point, and lots of opportunities are available. Recovery, as evident by positive absorption, occurred in the Suburban Boston region over the last two quarters (JLL) and over the last year (RBJ), but even those indicators suggest a 15-year supply, at best, of available office space in the suburban region.

1. Marlborough Office Market Trends

Jones Lang LaSalle provided RKG with quarterly historic data over the last 20 years in Marlborough and the 495 MA Pike submarket for comparison purposes. Three figures on the following pages exhibit trends in three areas: availability rates; occupied office space and average asking rents for available office space. The following highlights key findings of the data displayed in each figure.

- Figure V-1 exhibits the office availability rate over the last 20 years. In Marlborough, the highest rate (47.4%) occurred in the 4th quarter of 2011 while the lowest rate (4.3%) occurred in the 1st quarter of 2000. During the 1990's, the availability rate ranged from 4.6% (1Q-98) to 33.5% (2Q-93), and for the most part was higher than indicated for the 495 MA Pike submarket. The exception was between 1998 and 2000, when Marlborough rate was lower than the region for eight of the twelve quarters. Since 2002,

Marlborough availability rate was always higher, and the widest disparity occurred in 2002 to 2004, and in 2010.

- Figure V-2 exhibits the trends in occupied office space. As indicated, occupied office space in Marlborough increased by nearly 1.0 million SF between 1992 (1Q) and 2000 (4Q), while in the 495 MA Pike submarket, an increase of 3.7 million SF was realized. Between 2000 and 2008 (3Q) occupied office space increased by another 0.5 million SF in Marlborough and since then occupied space declined to a low of 2.4 million in 2011 (4Q), suggesting a loss of 0.3 million SF in occupied office space in the last 3 years. The change in occupied office space in the 495 MA Pike was less severe during these periods and it peaked at 9.65 million SF in 2011, marginally higher than in 2007, and about 0.13 million SF higher than the prior peak in 2000. In other words, Marlborough and the 495 MA Pike submarket experienced a greater increase in occupied office space during the 1990's than over the last decade.

- Figure V-3 exhibits the trends in office rents over the last twenty years. As illustrated, rents peaked in both areas in 2001 (1Q) at $27.40 in Marlborough and $28.70 in the 495 MA Pike submarket. This was also the period of highest occupancy and lowest availability. Since then, rents in Marlborough declined to $17.35 in 2003 (4Q) and to $17.69 in 2005 (2Q) in the 495 MA Pike submarket. Rental rates rebounded somewhat by 2008 to $20/SF in Marlborough and $21/SF in the submarket but subsequently slipped below $19/SF beginning in 2010 in both geographies.

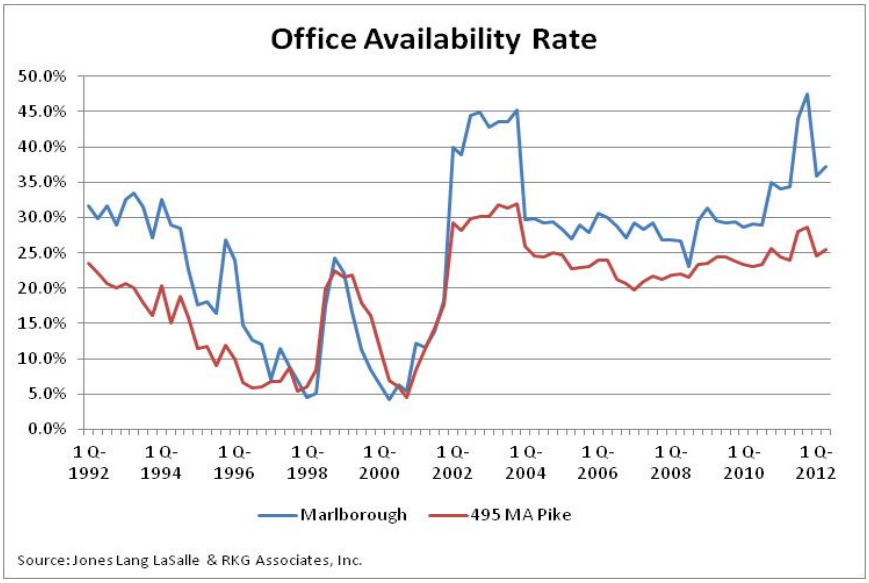


Figure V-1 – Trends in Office Availability Rate

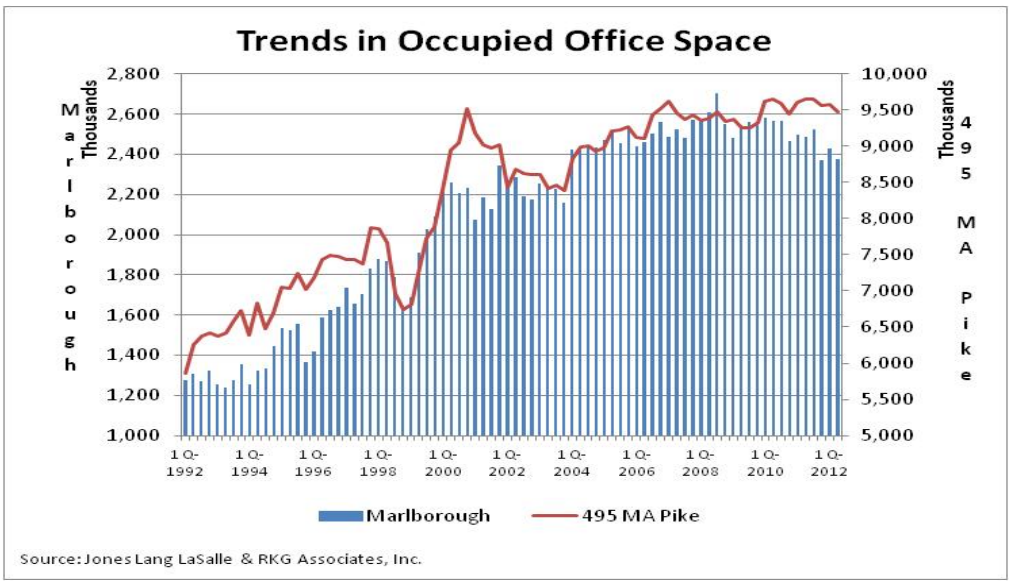


Figure V-2 – Trends in Occupied Office Space

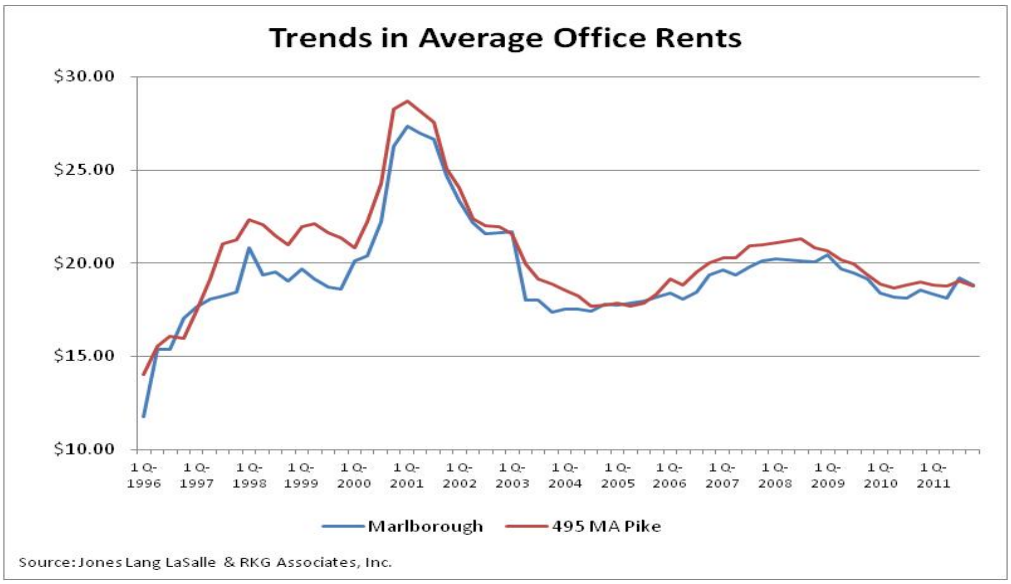


Figure V-3 – Trends in Average Office Rents

2. Available Office Properties in Marlborough

RKG identified 49 properties in the City of Marlborough that contained 3.9 million SF and had 2.0 million SF of available and/or vacant office space, as exhibited in Table V-5. The indicated vacancy or availability rate from this sample was nearly 52%. The largest vacant space (684,000 SF) was the result of Fidelity Investment closing some of its local offices and relocating its workforce to New Hampshire or Rhode Island[7]. This property accounts for approximately 34% of the vacant/available office space in Marlborough. However, TJX purchased the property in April 2012 for $91/SF, and plans to re-occupy the buildings in the fall of 2013 after renovations. Fidelity Investments also vacated 397 Williams Street leaving another 130,000 SF available, as part of their restructuring. There are 4 office availabilities with 100,000 SF or more and

[7] Eliminating this property would reduce the available supply to 1.32 million SF similar to JLL's figure of 1.4 million SF.

combined account for another 23% of the available office space in Marlborough. This group includes the Campus of Marlborough, which was also recently purchased for $183/SF which based on an asking rent of $20/SF suggests a cap rate of over 10%. This property also has additional acreage to support another 650,000 SF of pre-approved development. Referring to Table V-5, another 30% of the available office space is contained in 15 properties having between 20,000 SF and 99,999 SF. The remaining 13% of available office space is contained in 29 properties having less than 20,000 SF available.

Table V-5 – Sample of Available and/or Vacant Office Space (August 2012)

		Type -	# of	Year		Total Available			Asking Rent			
Park/Bldg Name	Address	Class	Space	Built	Bldg SF	Min	Max	Total	Low	High	For Sale Price	$/SF
TJX Buildings [1]	300-400 Puritan Way	Office-A	2	1987	683,900		683,900	683,900			$62,500,000	$91
Frm Fidelity Inv.	397 Williams St.	Office-A	1	1986	130,000		130,000	130,000		Neg		
Campus at Marlborough [2]	100-350 Campus Dr	Office-A	3	1999	532,246	42,000	126,000	126,000		$20.00	$97,500,000	$183
Marlborough Tech Park	600 Nickerson Rd	Office	3	1986	104,761		104,761	104,761		Neg		
	100 Locke Drive	Office			100,581		100,581	100,581			$8,500,000	$85
Chestnut Ridge	100 Crowley Dr	Office-A	4	2009	100,726	5,000	87,000	87,000		$18.00		
Solomon Pond Park	200 D. Lynch Blvd	Office	2	2002	120,000	15,000	39,852	75,387		$18.00		
Solomon Pond Park	400 D. Lynch Blvd	Office	2	1999	116,800		52,132	52,132		$17.00		
Marlborough Tech Park	200 Nickerson Rd	Office-B	2	1986	67,070		49,337	49,337		Neg		
Marlborough Tech Park	700 Nickerson Rd	Office	2	1988	77,531	8,286	40,368	48,654		Neg		
Lake Williams Corp Ctr-Bldg 2	46 Lizotte Dr	Office-B	2	2001	61,500	20,174	39,980	39,980		$18.00		
Bronx Park I	313 Boston Post Rd West	Office-A	5	1986	76,322	2,129	15,000	37,137		$18.00		
RK Executive Center	201 Boston Post Rd West	Office-A	9		81,000	600	9,500	32,202		Neg		
	450 D. Lynch Blvd	Office	2	1987	59,675	15,003	17,012	32,015		$5.00		
Lake Williams Corp Ctr-ATI	62 Forest St	Office	1	2001	90,000			26,731		Neg		
	165 Forest St	Office-A	2		53,000	4,000	12,650	25,300		$16.50		
Marlborough Tech Park	300 Nickerson Rd	Office	1	1984	80,724			23,770		Neg		
	291-293 Boston Post Rd	Office	3		178,697	2,090	14,630	21,392		Neg		
	33 Locke Drive	Office	2		28,000	3,000	18,000	21,000		$14.50		
Sublease	46 Lizotte Dr	Office	1	2001			20,578	20,578		$14.00		
Mt. Royal Office Park	4 Mount Royal Ave	Office-A	3		43,000	1,300	11,060	19,354	$17.00	$17.50		
Mt. Royal Office Park	5 Mount Royal Ave	Office-A	3		49,300	1,950	7,653	18,893	$16.00	$17.00		
Cedar Hill Place	225 Cedar Hill St	Office-A	3	2001	107,520	3,147	10,471	18,618	$17.00	$17.00		
	67 Forest St	Office	1		61,974		16,713	16,713		Neg		
	325 Donald J Lynch Blve	Office-A	3		76,600	2,500	7,300	16,100		$14.00		
Cedar Hill Place	225 Cedar Hill St	Office-A	2	2001	107,520		13,618	13,618	$17.00	$18.00		
Millenium Place-Cyphermint	241 Boston Post Rd West	Office	3	2002	24,710	4,500	12,000	12,000		Neg		
Marlborough Tech Park	400 Nickerson Rd	Office	1	1958	86,331		11,988	11,988		Neg		
Marlborough Tech Park	500 Nickerson Rd	Office	1	1986	82,423		10,515	10,515		Neg		
	65 Boston Post Rd West	Office-A	3		53,000	1,639	5,536	10,005		$16.50		
	85 Ames St	Office-B	1		64,000		10,000	10,000		$9.95		
	33 Boston Post Rd	Office-A	1		12,000		10,000	10,000		$17.50		
	320 Elm St	Off/ R & D	1		10,000		10,000	10,000		$9.50	$995,000	$100
Marlborough Tech Park	200 Nickerson Rd	Office-B	1		55,000	9,563		9,563		Neg		
Brigham Business Park	19 Brigham St	Off/Flex	2		12,000	3,000	6,000	9,000	$6.50	$8.50		
	734 Forest St	Off/ R & D	1	1988	54,884	8,700		8,700		$9.50		
	260 Cedar Hill	Off-A/ R &	1	1999	51,068	7,800		7,800		$8.95		
	237 Cedar Hill St.	Office B			28,162	7,500		7,500	$10.00		$2,300,000	$82
	26 Forest St	Office	1		7,422	7,422		7,422		$14.00		
Office-Bld To Suit	177 Maple St	Office	1	BTS	7,000	7,000		7,000		$25.00		
	40 Mechanic St	Office-A	4		14,500	1,000	2,284	6,950	$14.50	$15.00		
	65 Boston Post Rd	Office	3		52,500	1,439	2,830	6,587		$17.00		
	246 Maple St	Office-A	1		19,261	5,927		5,927		$14.00		
	186 Main St	Office-C	1	1900	44,119	5,000		5,000		$10.00		
	72 Hosmer St	Office	2		6,000	800	3,000	3,800		$12.00		
	41 Brighton St - Unit 13	Off/Flex	1		2,300	2,300		2,300	$6.50			
STUDY AREA	929 Boston Post Rd	Office	1		6,374	1,600		1,600		$20.00	$1,200,000	$188
Marlborough Tech Center	257 Simarano Dr	Off/Lab	1			600		600		$19.50		
	186 Main St - Unit 10	Office	1		10,000	250		250		$18.00		
Total		N=49	97		3,891,501	202,219	1,712,249	2,005,660	$6.50	$25.00	$172,995,000	$127

[1] TJX purchased two buildings on 76 acres from Fidelity Investments after they shifted operations to NH & RI; TJX plans to renovate and move into space in Fall 2013

[2] The Campus of Marlborough was purchased by Hines Global REIT for $97.5 million in Oct 2011; includes land for 650,000 SF of approved development

Source: LoopNet.com; Showcase.com; Jones Lang LaSalle; & RKG Associates, Inc.

Rental pricing for available office space in Marlborough ranges from $6.50/SF to $25/SF. Rents vary widely due to a variety of reasons, including utilities included, age and location of a property, its conditions, to name a few. The low end is reflective of flex space and quoted on a triple net basis, while the high end is for Class A office and quoted in many cases on a gross or modified gross basis meaning costs for maintenance, taxes and insurance are included in the rent, and typically tenants pay for electricity.

3. Proposed Office Building Supply

In addition to the 1.9 million SF of available or vacant office space another 2.8 million SF is proposed for Marlborough as shown in Table V-6. Approximately 23% is located on the excess land at the Campus of Marlborough, and another 43% is part of two projects off Cedar Hill Road and Forest Street accessible from Exit 23C or Exit 24A off of I-495. The remaining 34% of the proposed office supply in Marlborough is contained in five developments easily accessible to I-495 or I-290.

Table V-6 – Proposed Office Supply in Marlborough

Name	Address	Type	Bldg SF
Campus at Marlborough	100 Campus Dr	Office-Proposed	650,000
Proposed Office-Hotel	Cedar Hill/Simarano Dr	Office/Hotel-Prop	600,000
Devonshire@ 495 Center	Forest St/Hayes Mem	Office/Flex-Prop.	600,000
Proposed Office-3 Bldgs	150,152&154 Crane Med.	Office-Proposed	400,000
Solomon Pond Park	255 D. Lynch Blvd	Office-Proposed	150,000
Lake Williams Corp Ctr	50 Forest St	Office-Proposed	120,000
Marl. Tech Park - 3 Bldgs	800-1000 Nickerson Rd	Office-Proposed	240,000
Solomon Pond Park	100 D. Lynch Blvd	Office-Proposed	40,000
Total		N=8	2,800,000
Source: LoopNet.com; Showcase.com & RKG Associates, Inc.			

4. Conclusion

The office market in Suburban Boston has shown signs of improvement over the last year or so, according to the two brokers' surveys. Unfortunately, this improvement in the office market was not evident in Marlborough as absorption remained negative during this period, and was associated with the loss of key companies including Fidelity Investment. In spite of this weakness, two major office complexes in Marlborough were recently sold, and in turn should reduce some of the office availabilities by 40%. Office rents in Marlborough currently remain below their peak, and below the level to support new construction at this time. There are quite a number of proposed office sites in Marlborough to expand the supply by another 2.8 million SF and all this potential supply has better locational advantage including better access to the interstate highways than any development proposed for the Route 20 Corridor. A potential may exist for some medical offices in conjunction with Marlborough Hospital, or service oriented office users that prefer locations with high traffic counts and retail/service build-up rather than an office campus or business park location where most of Marlborough office supply exists.

C. Retail Market Conditions

RKG identified 21 listings of retail properties in the City of Marlborough that contained 872,600 SF and had 196,700 SF of available and/or vacant retail space, as exhibited in Table V-7. The

indicated vacancy or availability rate from this sample is 23%. Five listings with 21 available spaces were located in the Study Area, with 69,900 SF available or 38% of the available retail space in the sample. Two of the properties in the Study Area had over 25,000 SF available, which combined accounted for 80% of the available space in the Study Area. Some available space (9,000 SF) was also being marketed at a proposed power center (Wayside Crossing) of 130,000 SF in the Study Area. The status of this project is unknown.

Another 112,460 SF of available retail space at 15 listings were located outside the Study Area. Two properties had listings in excess of 20,000 SF, which combined represented 59% of the available space in the rest of Marlborough. One of these listings was for the former Borders Bookstore at Solomon Pond Mall. A few of the retail listings were also located in downtown Marlborough.

Table V-7 – Sample of Available Retail Space in Marlborough (August 2012)

			# of	Year	Total Bldg	Available Bldg SF			Asking Rent/SF		For Sale	
Park/Bldg Name	Address	Bldg Type	Space	Built	SF	Min	Max	Total	Low	High	Price	$/SF
Study Area												
Marlborough Commons	771 Boston Post Rd East	Retail	4		99,818	1,328	10,000	31,200	$16.00	Neg		
Marlborough Commons	701 Boston Post Rd	Retail	6		218,000	1,328	10,000	28,707		Neg		
Village Plaza	488 Boston Post Rd	Ret/Off	7	1984	20,600	250	2,668	10,553	$10.67	$17.09		
Marlborough Commons	771 Boston Post Rd East	Retail	2		3,568	1,325	1,825	3,150		Neg		
Rt 20 Retail	581 Boston Post Rd	Retail	2		3,584	800	850	1,650	$15.53	$20.25		
	Subtotal	N=5	21		345,570	5,031	25,343	75,260	$10.67	$20.25		
Wayside Crossing-(14.5 ac)	661 Boston Post Rd	Pow Ctr	1	UC/PR	130,000	3,000	9,000	9,000	--	$25.00		
Rest of Marlborough												
RK Centre	191-201 Boston Post Rd	Retail	2		150,000	1,500	3,000	45,000	$20.00	$23.00		
Shops at the Pond	D. Lynch & Solomon Pond	Retail	1		104,125		21,063	21,063	Neg			
Frm Church for sale/lease	86 Pleasant St	Off/Ret	1	1920	14,737	4,849	14,737	14,737	$8.00	$10.00	$950,000	$64
Retail-Bld to Suit	177 Maple St	Retail	1	BTS	7,000		7,000	7,000		$25.00		
Available Space	91 Main St	Ret/Off	1		4,200	1,000	42,000	4,200	$12.00	$14.00		
Mixed Use Property	245 East Main St	Retail	1		3,812		3,812	3,812			$579,900	$152
Cap Plaza	31-35 Main St	Retail	1	1920	19,994		3,600	3,600	$13.00			
Retail Space	225-235 Boston Post Rd	Retail	1		50,000		3,326	3,326	Neg			
Available Space	729 Farm Road	Retail	1	1968	11,110		3,200	3,200	$9.50			
Available Space	195-205 Main St	Retail	2	1955	5,232	402	1,500	1,902	$8.80	$18.66	$599,000	$114
Available Space	130 Main St	Off/Ret	1		7,200		1,218	1,218		$10.84		
Retail Space	9 East Main St	Retail	1		4,000		1,200	1,200	--			
Retail Space	469 Lincoln St	Retail	1	1900	1,200		1,200	1,200	--		$179,000	$149
Retail in busy plaza	25 Boston Post Rd East	Retail	1		800		800	800		$18.00		
Available Space	1015-1029 Boston Post Rd E	Ret/Off	1	1900	13,640		200	200		$24.00		
	Subtotal	N=15	17		397,050	7,751	107,856	112,458	$8.00	$25.00	$2,307,900	$92
	Total	N=21	39		872,620	15,782	142,199	196,718	$8.00	$25.00		

[1] Proposed 130k SF Power Center on 14.5 acres with 9,000 SF of available space

Source: LoopNet.com; Showcase.com & RKG Associates, Inc.

Rental prices in the Study Area range from less than $11/SF to $25/SF, and some rents are negotiable, as shown in Table V-7. The high end of the range ($25/SF) is for space at Wayside Crossing, a proposed power center, and the low-end ($11/SF) is for space at an older center. Prices in the rest of Marlborough range from $8/SF to $25/SF, with the high-end quoted for a build-to-suit project and the low-end at a converted church that is also for sale at $64/SF, the low-end of the range of for-sale prices, as shown in Table V-7.

The Study Area has quite a number of retail spaces available totaling 75,000 SF plus another 9,000 SF available at a proposed power center. Another 112,500 SF is available at retail offerings in the rest of the City, including some in the downtown, and at Solomon Pond Mall.

According to City of Marlborough assessment records, there are approximately 27 parcels in the Route 20 Corridor Study Area that are retail (including auto and mixed-use) use, comprising nearly 47 acres of land and with 436,700 SF of building improvement (refer to Table V-8). A previous study[8] found that there was a total of 225 retail parcels in the City of Marlborough, accounting for 306 acres of land and 2.8 million SF of built improvement. As a result, the study corridor represents about 15% of that land inventory and 16% of the built SF. Predominant retail in the Study Area includes neighborhood convenience and service uses, independently owned, with some noteworthy exceptions such as Target and Home Depot.

Table V-8 – City of Marlborough – Corridor Retail Properties

City of Marlborough		Route 20 Corridor			
Code	Land Use Descriptinn	Parcels	Acres	Bldg 1 SF	Total Ass'd $ (09)
0322	Mixed-Ret >10k SF/Apt	1	0.5	7,328	$484,600
3220	Retail > 10,000 SF	5	18.2	197,784	$20,585,500
3221	Retail Condo	5	0.0	5,153	$566,000
3230	Shopping Center/ Mall	6	15.5	154,555	$10,217,900
3250	Retail < 10,000 SF	5	3.7	26,133	$4,765,900
3260	Restaurant/ Club/ Bar	3	3.8	16,366	$2,097,800
3300	Auto Dealer Full Svc	1	0.5	14,010	$875,900
3320	Auto Repair	1	4.6	15,380	$593,400
	Total	**27**	**46.7**	**436,709**	**$40,187,000**

Source : Marlboro Assessor and RKG Associates, Inc.

Typically retail sales decay with distance and density, as consumers prefer to shop close to home whenever possible (the distance factor) and the further they must travel the more likely there are alternative and competitive shopping venues (the density factor). RKG opted for a conservative one-mile radius (refer to Map V-1), about the Boston Post Road East (Route 20) and Dicenzo Boulevard, to estimate a likely day-in/day-out customer market area for additional retail development. As presented in Table V-9, the estimated resident retail spending demand (2012) is nearly $46 million and estimated retail sales are slightly more than $60.5 million, indicating that overall that the retail businesses within the one-mile radii are net importers of more than $14.5 million in retail sales, notably including:

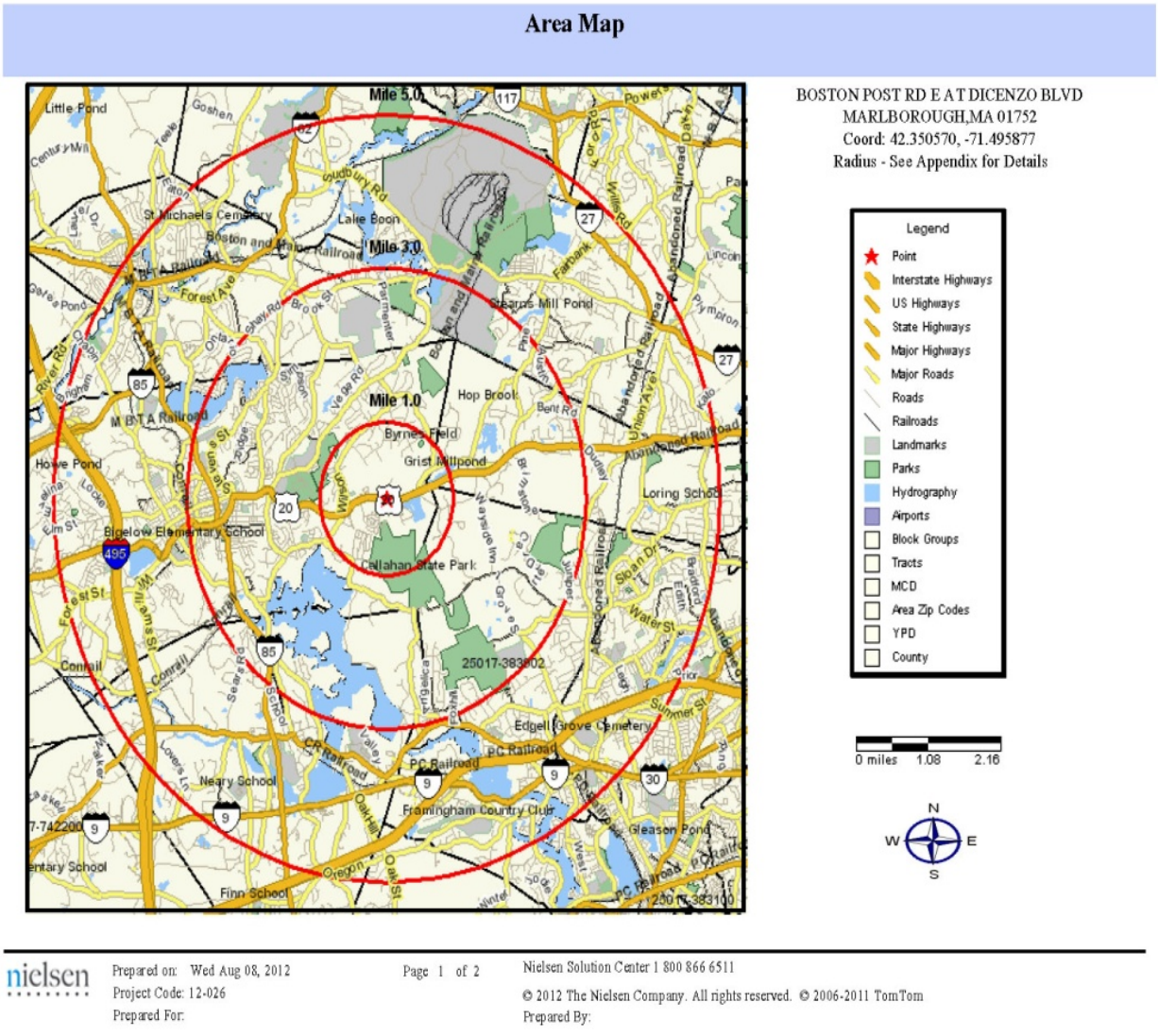
- $11.6 million at building material stores and at home centers in particular (note the Home Depot in the Study Area).
- Nearly $14 million at general merchandise stores (reflecting Target's presence).
- More than $1.3 million at restaurants and drinking places (capitalizing in part on the drawing power of the aforementioned big box retailers).

Nonetheless there are also several store types where the local spending demand is largely un-captured, or "leaking" indicating a statistical opportunity for additional retail development, including:

[8] *Marlborough Economic Development Master Plan : Building the New Marlborough Economy*, prepared by FXM Associates with The Cecil Group, AECOM and EDR Group, September 2011.

- Collectively $7.2 million in unmet demand for grocery and specialty food.
- Slightly more than $2.5 million in unmet demand for apparel and accessories, notably for family clothing stores.
- Almost $1.4 million in electronics and appliances.

Map V-1 – 1 and 5 Mile Radii about Route 20 Corridor in Marlborough, MA



© 2012 The Nielsen Company. All rights reserved. © 2006-2011 TomTom

Table V-9 – Retail Demand/Sales - 1 Mile Radius about the Route 20 Corridor in Marlborough, MA

Residential Retail Analysis - 2012	Route 20 Corridor - Marlboro 1 Mile			Retail @ Leakage Capture	
Comparative HH Demand & Sales	Demand	Sales	Under/Over	20.0%	35.0%
Major Merchandise Line	**$45,985,391**	**$60,519,482**	**($14,534,091)**	**14,211**	**24,869**
Motor Vehicle and Parts Dealers-441	**$918,481**	**$360,009**	**$558,472**	**421**	**738**
Automotive Parts/Accsrs, Tire Stores-4413	$918,481	$360,009	$558,472	421	738
Furniture and Home Furnishings Stores-442	**$1,542,502**	**$2,354,273**	**($811,771)**	**403**	**705**
Furniture Stores-4421	$862,250	$257,638	$604,612	403	705
Home Furnishing Stores-4422	$680,252	$2,096,635	($1,416,383)		
Electronics and Appliance Stores-443	**$1,570,271**	**$183,387**	**$1,386,884**	**912**	**1,596**
Household Appliances Stores-443111	$268,140	$110,721	$157,419	203	355
Radio, Television, Electronics Stores-443112	$881,263	$72,666	$808,597	462	809
Computer and Software Stores-44312	$345,216	$0	$345,216	200	350
Camera and Photographic Equipment Stores-44313	$75,652	$0	$75,652	47	81
Building Material, Garden Equip Stores -444	**$6,488,577**	**$18,054,166**	**($11,565,589)**	**2,623**	**4,590**
Home Centers-44411	$2,404,395	$18,008,145	($15,603,750)		
Paint and Wallpaper Stores-44412	$146,123	$0	$146,123	158	276
Hardware Stores-44413	$576,767	$0	$576,767	624	1,091
Other Building Materials Dealers-44419	$1,699,038	$14,180	$1,684,858	793	1,388
Building Materials, Lumberyards-444191	$1,123,816	$9,104	$1,114,712	557	975
Outdoor Power Equipment Stores-44421	$32,242	$0	$32,242	31	54
Nursery and Garden Centers-44422	$506,196	$22,737	$483,459	460	806
Food and Beverage Stores-445	**$8,683,506**	**$1,530,111**	**$7,153,395**	**3,294**	**5,765**
Supermarkets, Grocery (Ex Conv) Stores-44511	$7,476,524	$807,237	$6,669,287	3,138	5,492
Convenience Stores-44512	$396,459	$465,746	($69,287)		
Specialty Food Stores-4452	$248,906	$2,328	$246,578	98	171
Beer, Wine and Liquor Stores-4453	$561,617	$254,800	$306,817	58	101
Health and Personal Care Stores-446	**$3,446,777**	**$2,762,783**	**$683,994**	**394**	**689**
Pharmacies and Drug Stores-44611	$2,954,090	$2,761,027	$193,063	74	130
Cosmetics, Beauty Supplies, Perfume Stores-44612	$120,775	$0	$120,775	55	96
Optical Goods Stores-44613	$152,209	$1,756	$150,453	99	173
Other Health and Personal Care Stores-44619	$219,703	$0	$219,703	166	290
Clothing and Clothing Accessories Stores-448	**$3,452,673**	**$931,408**	**$2,521,265**	**1,906**	**3,336**
Men's Clothing Stores-44811	$161,597	$467,539	($305,942)		
Women's Clothing Stores-44812	$611,769	$1,366	$610,403	407	712
Children's, Infants Clothing Stores-44813	$127,964	$0	$127,964	76	134
Family Clothing Stores-44814	$1,296,511	$165,557	$1,130,954	963	1,684
Clothing Accessories Stores-44815	$60,452	$74,935	($14,483)		
Other Clothing Stores-44819	$160,302	$4,670	$155,632	117	206
Shoe Stores-4482	$439,232	$0	$439,232	266	466
Jewelry Stores-44831	$555,397	$153,108	$402,289	77	134
Luggage and Leather Goods Stores-44832	$39,449	$64,233	($24,784)		
Sporting Goods, Hobby, Book, Music Stores-451	**$1,370,059**	**$1,106,088**	**$263,971**	**694**	**1,215**
Sporting Goods Stores-45111	$488,930	$4,829	$484,101	403	706
Hobby, Toys and Games Stores-45112	$298,529	$430,550	($132,021)		
Sew/Needlework/Piece Goods Stores-45113	$65,906	$0	$65,906	98	171
Musical Instrument and Supplies Stores-45114	$91,626	$535,084	($443,458)		
Book Stores-451211	$275,253	$135,625	$139,628	92	160
News Dealers and Newsstands-451212	$14,869	$0	$14,869	5	10
Prerecorded Tapes, CDs, Record Stores-45122	$134,946	$0	$134,946	96	169
General Merchandise Stores-452	**$8,943,685**	**$22,854,320**	**($13,910,635)**	**2,440**	**4,269**
Department Stores Excl Leased Depts-4521	$4,430,427	$22,854,320	($18,423,893)		
All Other General Merchandise Stores-45299	$4,513,258	$0	$4,513,258	2,440	4,269
Miscellaneous Store Retailers-453	**$1,847,304**	**$1,322,855**	**$524,449**	**748**	**1,309**
Florists-4531	$139,999	$112,093	$27,906	19	33
Office Supplies and Stationery Stores-45321	$443,886	$802,350	($358,464)		
Gift, Novelty and Souvenir Stores-45322	$322,455	$354,281	($31,826)		
Used Merchandise Stores-4533	$161,972	$41,760	$120,212	91	159
Other Miscellaneous Store Retailers-4539	$778,992	$12,371	$766,621	639	1,118
Foodservice and Drinking Places-722	**$7,721,556**	**$9,060,082**	**($1,338,526)**	**376**	**657**
Full-Service Restaurants-7221	$3,502,242	$5,096,687	($1,594,445)		
Limited-Service Eating Places-7222	$3,244,600	$3,613,020	($368,420)		
Special Foodservices-7223	$636,239	$129,545	$506,694	317	554
Drinking Places -Alcoholic Beverages-7224	$338,475	$220,830	$117,645	59	103

Source : Claritas and RKG Associates, Inc.

VI. DEVELOPMENT CONSIDERATIONS

This chapter presents RKG's estimates of supportable demand for development in the Corridor.

A. Residential

In estimating future annual demand for housing in Marlborough, RKG utilized the DemographicsNOW 5-year household forecasts coupled with turnover trends, to formulate an annual forecast over the next 5 years, and balanced these with new housing production over the last decade. RKG estimates that new housing demand over the next five years would average between 150 and 160 units per year, and about 35% to 40% would be for owner units and 60% to 65% for renter units (Table VI-1). These annual estimates would be for the City of Marlborough as a whole, and perhaps the Route 20 Corridor could capture between 30% and 50% of this demand depending on projects developed in the other parts of the City, pricing and amenities. This would equate to up to 30 owner units and up to 50 rental units per year along the Corridor.

Table VI-1: Marlborough – Estimated Annual Demand for New Housing (2011-2016)

	Owner	Renter	Total
5-year Growth in H'Holds	727	266	993
Annual Average	145	54	199
Annual Turnover	430	601	1,031
Total H'hold/Year	575	655	1,230
New Construction/Year [1]	58	98	156
[1] New construction for owner housing is estimated to average at 10% of annual owner demand over next 5 years; renter at 15%			
Source: US Census; DemographicsNOW & RKG Associates, Inc.			

1. Forecasted Annual Owner Demand by Age and Income

When parsing these forecasts down to specific tenure, age and income groups most (64.1%) of the new owner housing demand would come from those with incomes of $100,000 or more, and could afford homes valued at more than $400,000, with the highest concentration in the age 65 and older group (200), followed by the 55 to 64 group (176); and then the 45 to 55 group (117). These gains are reflective of the baby-boom generation aging and seeking housing alternatives.

Table VI-2 – Marlborough: Forecasted Annual Owner Household Demand (2011 – 2016)

Owner H'hold by Income & Age	< age 35	35 to 44	45 to 54	55 to 64	65 & up	Total	% of Total	House Value
Less than $25,000 [1]	0	0	(2)	2	25	25	4.4%	$100,000
$25,000 to $39,999 [2]	1	0	(2)	7	18	25	4.3%	$165,000
$40,000 to $59,999 [3]	2	1	8	20	23	55	9.5%	$250,000
$60,000 to $74,999	3	2	7	13	15	40	7.0%	$300,000
$75,000 to $99,999	7	6	7	21	20	61	10.7%	$400,000
$100,000 & up	24	35	98	113	98	369	64.2%	$400,000+
Total	37	45	117	176	200	575	100%	
% of Total	6.5%	7.8%	20.4%	30.6%	34.7%	100%		
[1] 30% of AMI for 3-person family; [2] 50% of AMI; [3] 80% of AMI								
Source: US Census; DemographicsNOW & RKG Associates, Inc.								

It should also be added that households earning over $100,000 may not wish to spend in excess of $400,000 for housing because of a 20% down-payment ($80,000) and reluctance to take on a 30-year mortgage. Typically, downsizing households like to trade sidewise, namely, buy a new home at about the same price they sold their last one. Referring to Table VI-2, annual demand for homes in the $100,000 to $165,000 is fairly evenly distributed between the income ranges (8.7%, collectively), with the highest demand concentration in the age 65 and older group. Demand in the two income groups that could afford homes in the $170,000 to $300,000 range represents 16.5% of total annual demand and most of these households are in the two older age cohorts (55 to 64 and 65+).

2. Forecasted Annual Renter Demand

The distribution of forecasted annual renter demand by age and income and corresponding rental rates is exhibited in Table VI-3. Almost 31% of the demand would come from younger households (less than 35), while the rest would be fairly evenly distributed between the older age groups including a highest concentration at the 65 and older age group. Approximately 34% of the demand would be from households earning $75,000 or more and could afford a rent of $2,500, and almost 40% of this demand is in younger age households (less than 35).

Approximately, 30% of the annual renter demand would be from households earning less than $25,000, or 30% of area median income (AMI), and another 27.5% in the very-low (50%) and low (80%) income cohorts, collectively. The households in these three income groups would be spread over all the age groups, although a high concentration would be in the age 65 and older group, as well as the younger than age 35 cohort, and combined these two age groups represent more than 52% of forecasted annual demand for low-income households.

Table VI-3 - Marlborough: Forecasted Annual Renter Household Demand (2011 – 2016)

Renter H'hold by Income & Age	< age 35	35 to 44	45 to 54	55 to 64	65 & up	Total	% of Total	Monthly Rent
Less than $25,000 [1]	38	22	30	40	68	197	30.0%	$625
$25,000 to $39,999 [2]	27	15	17	17	23	99	15.0%	$1,000
$40,000 to $59,999 [3]	31	18	14	8	10	82	12.5%	$1,500
$60,000 to $74,999	22	14	8	6	7	56	8.6%	$1,875
$75,000 to $99,999	24	13	13	9	8	67	10.2%	$2,500
$100,000 & up	61	43	18	18	15	155	23.7%	$2,500+
	203	125	100	97	130	655	100%	
% of Total	31.0%	19.0%	15.2%	14.8%	19.9%	100%		
[1] 30% of AMI for 3-person family; [2] 50% of AMI; [3] 80% of AMI ($97,800)								
Source: US Census; DemographicsNOW & RKG Associates, Inc.								

B. Non-Residential

Development opportunities for industrial, office and retail uses are discussed in this section.

1. Industrial

Although the regional industrial market is showing signs of improvement, since absorption was positive over the last year, unlike prior years, nonetheless, vacancy rates remain in the high

teens, and rental pricing appears below the level to support new construction. Marlborough had an available industrial supply of nearly 1.5 million SF, which represented about 64% of the vacant supply in the I-495/West submarket. Nearly 50% of the vacant/available industrial space was confined to the former Hewlett Packard complex which was recently sold for redevelopment purposes, and would compete with any industrial proposal within the Route 20 Corridor.

Development trends in the Route 20 Corridor suggest that the Study Area does not have the locational attributes to capture future industrial/research and development opportunities, despite the presence of the Raytheon campus at its eastern edge. In addition to the 1.5 million SF of available industrial space, another 0.67 million SF of industrial building area is proposed for Marlborough, which increases to 2.2 million SF when including a portion of neighboring Northborough. All this proposed industrial development is located on the western side of the city, where access to the interstates (I-495 and I-290) is more convenient than from the Study Area. Industrial opportunities in the Route 20 Corridor appear to be limited due primarily to its poor highway accessibility as compared to other parts of the city.

2. Office

The office market in Suburban Boston has shown signs of improvement over the last year or so, according to the two brokers' surveys. Unfortunately, this improvement in the office market was not evident in Marlborough as absorption remained negative during this period, and was associated with the loss of key companies including Fidelity Investment. In spite of this weakness, two major office complexes in Marlborough were recently sold, and in turn should reduce some of the office availabilities by 40%. Office rents in Marlborough currently remain below their peak, and below the level to support new construction at this time. There are quite a number of proposed office sites in Marlborough to expand the supply by another 2.8 million SF and all this potential supply has better locational advantage including better access to the interstate highways than any development proposed for the Route 20 Corridor.

a) Employment Projections

The Massachusetts Executive Office of Labor and Workforce Development (MA EOLWD) has developed estimates of employment change, by industry sector for the state. RKG has utilized the projected percent change, by industry sector, to develop an estimate of 2020 employment for the state, reflecting a ten year change from 2010 as the baseline. The average ratio of Middlesex County employment, by industry sector to the state, formed the basis for estimating county level employment projections. The average ratio of Marlborough employment, relative to the county, then formed the basis for projecting Marlborough employment levels in 2020. The estimated overall projected growth in employment in Massachusetts, 2010 to 2020, is 93,700 positions. From this an estimated 27% is realized in Middlesex County or about 25,200 positions and from this an approximate 3.5% or 870 positions are projected for Marlborough.

b) Estimates of Supportable Development

RKG then converted these employment projections, by industry sector, to potential demand estimates for additional office and building space. This methodology utilizes industry standard estimates of per employee SF and converts the projected growth in employment into space (SF) demands. Realistically, not all of the projected growth in employment would result in demand for new or additional space, as some demand could be met by the existing vacancies in the market or occur at existing businesses. The following Table VI-4 presents a range of the

estimated "capture" potential for new office and commercial development in Marlborough, over the next ten years. This analysis considers the potential that new commercial development (non-retail) in Marlborough could capture between 5% and 15% of the projected change in employment, by industry sector, through the year 2020, resulting in the following:

- The total estimated demand for additional SF of commercial space is nearly 772,000 SF, of which the Route 20 Corridor Study Area may garner 38,600 SF (5%) to 115,800 SF (15%), over a ten-year time frame.
- The opportunity for additional (or increased demand) in space for the professional/technical services is greatest at 18,100 SF to 54,200 SF. This is followed by health care with 11,800 SF to 35,300 SF, and then administration services, 2,500 SF to 7,600 SF.
- As such, in RKG's opinion the potential may exist for some medical offices in conjunction with Marlborough Hospital, or service oriented office users that prefer locations with high traffic counts and retail/service build-up rather than an office campus or business park location where most of the Marlborough office supply exists.

Two important considerations with respect to such potential office development include (1) this analysis is stretched over a ten-year time period and would result in only incremental development annually; and, (2) potential tenants could include small businesses, entrepreneurs, and start-ups, requiring flexible lease rates and terms that may be insufficient to warrant new construction costs.

Table VI-4 – Estimated Employment Growth and Office Demand

Industries and Demand Indicators	AVG SF per EMP	Marlborough, MA 2020 Employment	Marlborough, MA Change from 2010	Marlborough (total) Potential SF Gross Demand	Estimated Supportable SF 5.00% Capture	10.00% Capture	15.00% Capture	2010 County LQ
Office/Flex/Institutional								
Information	350	1,443	72	25,131	1,257	2,513	3,770	1.67
Finance and Insurance	350	1,339	(52)	NA	NA	NA	NA	0.55
Real Estate	350	211	1	350	18	35	53	1.00
Professional and Technical	350	5,242	1,032	361,273	18,064	36,127	54,191	1.76
Management	350	437	(9)	NA	NA	NA	NA	1.78
Administration and Waste Services	450	1,292	112	50,496	2,525	5,050	7,574	1.00
Educational Service	700	169	11	7,904	395	790	1,186	1.40
Health Care and Social Assistance	700	2,594	336	235,459	11,773	23,546	35,319	0.71
Subtotal	**NA**	**12,728**	**1,504**	**680,613**	**34,031**	**68,061**	**102,092**	**NA**
Commercial								
Arts and Entertainment	500	346	35	17,539	877	1,754	2,631	0.68
Accommodations and Food Services	500	2,170	98	48,949	2,447	4,895	7,342	0.80
Other excluding Public Administration	500	705	50	24,827	1,241	2,483	3,724	0.91
Subtotal	**NA**	**3,221**	**183**	**91,314**	**4,566**	**9,131**	**13,697**	**NA**
TOTAL		**15,949**	**1,687**	**771,928**	**38,596**	**77,193**	**115,789**	**NA**

Source : MA EOLWD and RKG Associates, Inc.

3. Retail

As noted previously (Table V-9) Marlborough is both an importer and an exporter of retail sales, depending on what types of retail and what merchandise lines. All markets experience some degree of sales leakage, or an inability to capture local spending demand. New development offers an opportunity to increase retail penetration (i.e., sales) in a market area, both for existing retailers and potential new retailers. In this analysis, RKG estimates potential capture rates (at

20% and 35%) of the previously identified unmet consumer demand could result in the potential development of 14,000 SF to 25,000 SF of additional retail in Marlborough, along the Route 20 Corridor Study Area, realizing that the desire to be near the big box retailers may be strongest.

Although it is difficult to speculate specific tenants, the types of stores exhibiting the most potential include a clustering of apparel and accessory shops, with a focus to family clothing. Some potential has been identified for grocery and specialty foods, although not for a full-line supermarket unless the desire would be to protect market share from competitors.

Table VI-5 – Estimated Employment Growth and Office Demand

Residential Retail Analysis - 2012 Comparative HH Demand & Sales	Retail @ Leakage Capture 20.0%	35.0%
Major Merchandise Line	**14,211**	**24,869**
Automotive Parts/Accsrs, Tire Stores-4413	421	738
Furniture Stores-4421	403	705
Household Appliances Stores-443111	203	355
Radio, Television, Electronics Stores-443112	462	809
Computer and Software Stores-44312	200	350
Camera and Photographic Equipment Stores-44313	47	81
Paint and Wallpaper Stores-44412	158	276
Hardware Stores-44413	624	1,091
Other Building Materials Dealers-44419	793	1,388
Building Materials, Lumberyards-444191	557	975
Outdoor Power Equipment Stores-44421	31	54
Nursery and Garden Centers-44422	460	806
Supermarkets, Grocery (Ex Conv) Stores-44511	3,138	5,492
Specialty Food Stores-4452	98	171
Beer, Wine and Liquor Stores-4453	58	101
Pharmacies and Drug Stores-44611	74	130
Cosmetics, Beauty Supplies, Perfume Stores-44612	55	96
Optical Goods Stores-44613	99	173
Other Health and Personal Care Stores-44619	166	290
Women's Clothing Stores-44812	407	712
Children's, Infants Clothing Stores-44813	76	134
Family Clothing Stores-44814	963	1,684
Other Clothing Stores-44819	117	206
Shoe Stores-4482	266	466
Jewelry Stores-44831	77	134
Sporting Goods Stores-45111	403	706
Sew/Needlework/Piece Goods Stores-45113	98	171
Book Stores-451211	92	160
News Dealers and Newsstands-451212	5	10
Prerecorded Tapes, CDs, Record Stores-45122	96	169
All Other General Merchandise Stores-45299	2,440	4,269
Florists-4531	19	33
Used Merchandise Stores-4533	91	159
Other Miscellaneous Store Retailers-4539	639	1,118
Special Foodservices-7223	317	554
Drinking Places -Alcoholic Beverages-7224	59	103

Source : Claritas and RKG Associates, Inc.

Appendix C
Draft Zoning Considerations

DRAFT - ZONING PROPOSAL

Based upon the vision for the Wayside District Corridor Plan, the Commercial and Residential Market Assessment prepared by RKG Associates in December 2012, and a review of the Marlborough Zoning Ordinance, it is proposed that a new overlay district be considered to implement the recommendations emanating from this planning effort. The vision for the corridor calls for a mix of retail establishments along with residential developments; establish design criteria for new or redeveloped buildings; create better landscaping and streetscaping along the corridor; and improve access management through interconnections between developments and pedestrian and bicycle access. The goal is to provide for a more pleasing and attractive "gateway" to the City and to better manage traffic flow and parking within the developed parcels fronting on Route 20.

In order to implement the preferred scenario for the Wayside District Corridor Plan, zoning changes will need to be addressed. The zoning districts that fall within or directly adjacent to the Core Study Area include:

- Residence A-1
- Rural Residence
- Business, and
- Limited Industrial

Although the provisions of the existing zoning allow for many of the land uses recommended in the illustrative corridor plan, it does not fully incorporate the type and mix of residential and commercial uses envisioned. Moreover, certain aesthetic and transportation standards are necessary to achieve the overall vision contemplated for the corridor. Such standards will enhance the streetscape, provide buffers between residential and non-residential uses, improve bicycle and pedestrian mobility, regulate parking and site access in a coordinated manner, and encourage sound design principles to new development projects. To that end, the zoning must integrate design and access management standards to achieve the goals of this planning effort.

It is recommended that a new Wayside Overlay District (herein, also after ""Wayside OD"") be established. It will knit together the four existing zoning districts into one cohesive district designed to implement the vision for the study area. The regulations proposed within the "WOD" would be mandatory for any proposed new development. Specifically, the proposed zoning changes will include the following:

- A revised list of uses allowed by right and by special use permit to include multi-family, commercial, and office uses;

- New dimensional regulations for the overlay district;

- Shared parking allowances where adjacent uses have differing hours of business in order to reduce the amount of land devoted to parking;

- Revised design standards for buildings, parking lots, and streetscapes (including pedestrian and bicycle access); and

- Access management regulations that will control the placement and design of curb cuts in the district.

This is a preliminary draft that requires additional vetting by the City to ensure that the proper procedures, use regulations, dimensional requirements, and other related development standards have been properly applied to the proposed "Wayside OD".

§650-34 – WAYSIDE OVERLAY DISTRICT

A. Purpose and Objectives

The Wayside Overlay District (herein, also a "Wayside OD") allows the application of supplemental land use controls within the boundaries of a certain overlay district, subject to City Council approval (hereinafter any reference to City approval shall be deemed to mean approval by the City Council) as an alternative to land use controls that exist in the underlying district(s). The establishment goals of the Wayside Overlay District are to enhance land use development and encourage desired growth patterns for the benefit of the public health, safety and welfare, by promoting integrated, pedestrian friendly, mixed use development to enhance the streetscape and design within the new overlay district to further promote livability and quality of life within the district.

For the purposes of this section, the "Wayside OD" shall be superimposed on the other districts existing at the time that any land in any said underlying district is also included in the "Wayside OD". The "Wayside OD" is (*describe metes and bounds of overlay district – Wilson Street/Farm Road to Wayside Inn Road on the Sudbury Line*).

B. Authority of Permit Granting Authority

The City Council shall be the Permit Granting Authority for Special Permit and Site Plan Approval in the "Wayside OD". In all instances, a development which proceeds under the "Wayside OD" overlay is subject to Site Plan Approval in accordance §270-2 of the Marlborough City Code.

The City Council may elect to vary the dimensional and parking requirements of this Section by Special Permit if, in their opinion, such change shall result in a substantially improved project and will not nullify or substantially derogate from the intent or purpose of this section. This authority continues subsequent to occupancy.

DRAFT

C. Eligible Uses

(1) The following uses are also permitted BY-RIGHT in the "Wayside OD":

(a) Multi-family dwelling – up to 100 total dwelling units including, without limitation, age restricted dwelling units

[Tie multifamily to a percentage of LU mix 25%/75%, 50/50 etc?] [Set a potential per project limit on unit count?], [Set a requirement for ground floor non residential use only?] [Set a distance for ground floors non residential uses – x distance from Rt 20?]

(b) Mixed residential and commercial uses (mixed use development)

(c) Recreation center

(d) Offices, banks, insurance and financial institutions

(e) Medical and dental clinics

(f) Retail sales and services – up to 75,000 square feet of total gross floor area

(g) Restaurant, café with or without table service (including outside seating and service)

(h) Consumer service establishments complimentary to the other principal uses at the property

(i) Health, sports and fitness clubs (indoor and/or outdoor) and related facilities

(j) Dry cleaning (pick up and drop off only)

(l) Car parking garages - a structure or a group of structures that facilitate the parking of vehicles at, above and/or below grade under a building or otherwise integrated into another structure

[Should BY_RIGHT uses be subject to Site Plan Review?]

(2) The following additional uses are also permitted BY SPECIAL PERMIT in "Wayside OD":

(a) Multifamily dwelling – more than 100 total dwelling units including, without limitation, age restricted dwelling units

(b) Retail sales and services – over 75,000 square feet of total gross floor area

DRAFT

(3) Any uses not listed in Subsections (1) or (2) above are expressly PROHIBITED in the "Wayside OD".

D. Dimensional Requirements

The "Wayside OD" shall be subject to the dimensional standards in accordance with Article VII of the Marlborough Zoning Ordinance with the following exceptions:

(1) The Minimum Lot Area requirement for "Wayside OD" shall be 5,000 sq. ft.

(2) Minimum Lot Frontage measurement shall be no less than fifty (50) feet for any lot wholly located within the boundaries of the "Wayside OD".

(3) Minimum Front Yard measurement shall be no less than thirty (30) feet for any lot wholly located within boundaries of a "Wayside OD".

(4) Minimum Side Yard measurement shall be no less than twenty-five (25) feet for any lot wholly located within boundaries of a "Wayside OD". Fire suppression vehicles shall have clear and adequate access to all structures.

(5) Maximum building height in "Wayside OD" shall not exceed fifty-two (52) feet.

(6) Maximum Lot Coverage shall not exceed eighty-five (85) percent of the total lot area.

E. Parking and Curb Cut Requirements.

Except as otherwise provided in this section, parking and circulation requirements shall conform with the provisions of Section §650-48 and §650-49 of the Zoning Ordinance.

(1) Parking areas shall be located to the side and/or rear for all new structures.

(2) Parking areas shall include provisions for the "parking" of bicycles in bicycle racks in locations that are safely segregated from automobile traffic and parking. For parking areas of ten (10) or more spaces, bicycle racks facilitating locking shall be provided to accommodate one (1) bicycle per twenty (20) parking spaces or fraction thereof. Bicycle racks shall be placed so as not to obstruct pedestrian walkways or impede upon the parking area for automobiles.

(3) Where a proposed parking lot is adjacent to an existing parking lot of a similar use, providing vehicular and pedestrian connections between the two (2) parking lots may be required. It is encouraged that parking areas be interconnected between lots by cross access driveways in a manner that allows the unobstructed

DRAFT

flow of pedestrians between businesses and the parking areas. A sidewalk shall be provided on at least one side of the driveway.

(4) Parking Locations - Parking may be provided at ground level, underground or in a parking garage. Parking garages can be free standing or as part of buildings dedicated to other permitted uses, but shall be placed to the rear of the building and screened.

(5) Minimum Parking Space Requirements:

(a) Residential Dwelling Unit - 1.5 parking spaces for each dwelling unit

(b) Retail uses – 1 space for each 250 sq. ft.

(c) Office uses – 1 space for each 350 sq. ft.

(6) Granting of Relief from Parking Regulations – The Building Inspector may waive any of the foregoing requirements or the requirements of Section §650-48 if it makes a finding that to do so will enhance the overall design of the "Wayside OD".

(7) The applicant may reduce the number and/or the location of the required parking spaces, through a Special Permit. Consideration may be given to the hours of usage of the proposed use/structure, hours of usage of other uses/structures within the "Wayside OD", amount of shared parking with other uses, as well as other relevant information to assist the special permit granting authority in determining the need for additional parking for motor vehicles. Relief may be granted provided that it is demonstrated that the additional demand for such spaces can be reasonably met without placing an undue burden on existing facilities already relying on such spaces under the following conditions:

a. Allow parking areas to be shared with adjoining businesses based upon having peak user demands at different times provided that all businesses sharing parking are located on the same lot.

b. Parking spaces on a separate lot or lots within a radius of six hundred (600) feet, measured from the lot line of the principal use, may be counted.

F. Site Access

DRAFT

(1) Curb cuts shall be minimized. To the extent feasible, access to businesses shall be provided through one of the following methods: (a) through a common driveway serving adjacent lots or premises or (b) through an existing side or rear street thus avoiding the principal thoroughfare. Garages doors or loading docks are prohibited on the front façade of any building facing the street.

i. All new curb cuts are subject to Development Plan Review.

ii. Curb cuts greater that thirty (30) feet and driveway openings greater that twenty (20) feet are subject to a Development Plan Review.

(2) Site access shall be comprised of either a single two-way driveway or a paired system wherein one driveway is designed and appropriately marked to accommodate ingress traffic, and the other driveway is designed and appropriately marked to accommodate egress traffic.

(3) Cross access driveways and shared driveways are intended, and shall be designed**,** to be used exclusively for internal circulation.

G. Pedestrian and Bicycle Circulation

Provision for safe and convenient pedestrian access shall be incorporated into plans for new construction of buildings and parking areas, and should be designed in concert with landscaping plans noted below. New construction should improve pedestrian access to buildings, sidewalks and parking areas, and should be completed with consideration of safety, handicapped access and visual quality. Where appropriate, applicants are encouraged to provide pedestrian and/or bicycle paths connecting their site with abutting areas in order to promote pedestrian and bicycle circulation and safety. When parking is located in the rear, pedestrian access via a pedestrian-oriented alley or walkway through to the primary street is encouraged.

H. Pedestrian Spaces and Comfort

For the purpose of providing a pedestrian friendly environment, new and redeveloped buildings should provide for outdoor seating areas, or outdoor display areas scaled to the size and demands of the proposed use, where feasible. For example, a multi-story project should provide a patio or small plaza area located near the front entry with multiple benches and landscaping. A mixed-use project with ground floor retail such as a restaurant may provide an area for outdoor dining which extends the indoor dining space for seasonal use. A ground floor use may provide a sidewalk bench where there is sufficient width. Such pedestrian areas provide space that affords visual connectivity but is setback from major pedestrian flow and vehicular ways and is appropriate to the location.

DRAFT

Design Criteria (for discussion)

Overview: The relationship between buildings, parking lots and the street is the most important design element within the overlay district. The existing development pattern within the proposed overlay district is somewhat reflective of a typical suburban commercial district that has been influenced by increasingly accommodating the automobile. Somewhat widely spaced buildings that are separated from the street by parking lots characterize this area. Such an environment, though convenient for the automobile, appears visually disjointed, cluttered, and is inhospitable to pedestrians. The design criteria listed below attempt to mitigate those impacts by enhancing the appearance and livability of the area.

(1) Building Design Considerations

- Buildings should be located close to the street, with off-street parking, behind and/or beside buildings. Buildings oriented to the primary streets will better shape the street corridors and, ultimately, the identity of the community. If a building must be set back, no more than one row of parking should separate it from the street.
- For redevelopment of existing structures where parking is located in the front, landscaping should be placed to screen parking and create a more aesthetically pleasing environment.
- To maximize the street frontage of building and minimize the street frontage of parking lots, buildings should be articulated so that the long side fronts the street.
- To the extent practical, drive-thru facilities should be oriented away from public streets and primary development entrances.
- Parking lots should be visually buffered at the perimeter from their surroundings, using landscaping and possibly an intermittent low fence or masonry wall in key locations.
- Smaller commercial buildings can be located in front of "big box" structures to disguise their overall bulk, while still allowing for clear identity and points of entry.
- In developments with multiple structures, recurring forms and materials should be used to tie the development together, while establishing an overall hierarchy of buildings for visual interest and to aid in orientation.
- Buildings should be arranged to create functional public and private outdoor spaces, including sidewalks, patios, entryways, and courtyards.
- Both new development and large redevelopment projects should enhance prominent corners of buildings with elements such as towers, arches, or roof forms that will serve as identifiable and memorable landmarks.

DRAFT

- Gabled, hipped, mansard, gambrel, stepped, and peaked roofs add variety and interest to buildings and should be incorporated in developments. Shed and flat roofs should be concealed with architectural detailing including elements such as parapets or finished flashing.

(2) Facades

- Large expanses of unarticulated or blank walls are not appropriate. Walls facing the street or walkways should be punctuated with display windows, doors, indentations, or other fenestration to add visual interest on the street. All sides of a building visible to the public should be treated consistently with quality materials and finishes.
- Facades should be well composed and articulated with a variety of materials and forms to create visual interest and character. This can be accomplished by using a selection of architectural details such as vertical and horizontal projections and recesses, changes in height, floor levels, roof forms, parapets, cornice treatments, belt courses, pilasters, window reveals, forms and color, etc.
- Building entrances should be designed in a manner which breaks up the building mass and aids in pedestrian orientation.
- Use traditional materials such as wood, brick and stone. When used properly, these materials are as good as other materials. Treated board and other synthetic materials are discouraged.

(3) Awnings

- Awnings, trellises or canopies are encouraged above windows, doors, and entrances to provide shade and architectural relief from flat façades. These also serve as an easily read and distinctive sign. The business name and logo are encouraged to be placed on the awning.

(4) Exterior Lighting

- Lighting should be consistent throughout the development and coordinated in appearance with building-mounted light fixtures.
- Property owners/developers are encouraged to utilize decorative poles and fixtures for all lighting affixed and not affixed to buildings.
- Use of high-quality light, which provides good, uniform visibility while avoiding light pollution, is encouraged. Consider illuminating sidewalks, parking areas, and other multi-use pathways using low

DRAFT

intensity fixtures that provide an even distribution of light while avoiding areas of intense shadows.

- All site lighting will be required to not contribute significantly to glare and reduce light trespass. Fully shielded and full cut-off light fixtures should be used in the following locations: parking lots, public streets and pedestrian areas, pathways and building overhangs.

(5) Signs

- Signs and sign locations should be an integral part of the overall development, reflecting the scale, image and style of associated buildings. Sign design and materials should relate to the building elements.
- Signs should not cover or obscure architectural elements.
- Signs shall be externally lit from the front. Back lighting of signs shall not be used.
- Signs should be made of the following materials: wood (painted or natural), stone, copper, brass, galvanized steel, painted canvas or painted/engraved on façade surface.
- Freestanding Monument signage is the most appropriate along the highway corridor; pole signs should not be used. Other signs appropriate for the individual tenants may include: projecting sign, frame sign, awning sign, canopy sign, marquee sign, wall/fascia sign, and window sign.
- Individual tenant signs may be located on individual storefronts, over display windows and/or at entries.
- Provide small scale "directory" signage as needed within the development to aid in orientation for drivers and pedestrians.
- Flashing signs, moving signs (or signs with moving elements), and roof signs are not allowed.
- Parking signs should be simple and understated.

(6) Landscaping

- The corridor should reflect a natural landscape pattern, utilizing an informal pattern of high canopy trees and clusters of low-height shrubbery within the setback or buffer area adjacent to the roadway, particularly at parking areas.
- The area in between the street and front façade shall contain special landscape treatment (even when parking is located in the front). This should include but is not limited to: specimen trees and shrubs,

DRAFT

groundcover, accent rocks, low walls, and signage. Large expanses of mulch and grass are not desirable.

- Where parking is located in the front of the building, the landscape should be more substantial and serve to screen the building from the sidewalk.
- A mix of deciduous and evergreen plantings should be utilized to maintain texture and greenery in winter.
- Dead plants are worse than no plants at all. Landscaped areas bring with them a responsibility for maintenance, which includes watering, removing debris and litter, pruning and replacement of plants when necessary. All private open space and landscaping should be maintained by the owners of the development.
- Landscape features should be used to highlight entryway and other free-standing signage, to screen sign supports and ground-mounted equipment where practical, and to call attention to special gateway areas, such as corners at major intersections.
- Drainage improvements should be designed as natural landscape features, avoiding structural improvements in design where practical.

DRAFT

Appendix D
Preliminary Funding and Costs

Preliminary Funding and Costs

Funding

Funding sources for the transportation infrastructure portion of this project could potentially come from a number of different sources. MEDC and the City should explore the following options as they are likely the best opportunities for a project like this:

MassWORKS Grants -
formerly known as Public Works Economic Development (PWED) grants, this program is generally targeted at infrastructure projects that would support economic growth opportunities and other Commonwealth initiatives.

Transportation Improvement Project (TIP) Funding -
the traditional way to advance roadway and transportation projects, the TIP process is a competitive one that seeks to utilize the Commonwealths' limited financial resources for transportation investment on projects that have the most merit.

Challenge/Innovation Grants -
this program seeks to provide funding for projects that are unique in nature and can serve as a demonstration effort for future similar projects. These grants are extremely competitive in nature, but also provide opportunities to demonstrate how innovative approaches to traditional challenges can improve the quality of life and/or economic conditions of specific areas.

Tax Increment Financing (TIF) and District Improvement Financing (DIF) Programs -
Communities can use TIF programs to leverage the future tax base of a project to pay for infrastructure needs. This program can be complex and should only be used on projects where the return on the investment is more or less guaranteed (not speculative projects).

Costs

A preliminary order and order of magnitude cost estimate has been prepared as part of the plan development. This cost estimate is preliminary in nature and should be used as a guide to better understand the funding options that may be available and develop funding strategies that could be used to execute the various roadway related corridor improvements. Private development and/or internal modification to existing parcels were not considered part of this cost estimate.

Corridor Improvements - Order of Magnitude Costs

		Unit	Qty	Cost	Total
1.1	Striping and Signage	Mile	1.32	$75,000.00	**$100,000.00**
1.2	Sidewalks (both sides of the street)	LF	13920	$150.00	**$2,000,000.00**
1.3	Landscaping, Street Trees and Fencing				
	Street Trees	LF	348	$600.00	$200,000.00
	Landscaping	LF	3713.33	$100.00	$350,000.00
	Fencing	LF	11140	$42.00	$450,000.00
				subtotal	**$1,000,000.00**
1.4	Lights and Banners	Ea	92	$15,000.00	**$1,500,000.00**
				subtotal	**$4,600,000.00**
1.5	Intersections				
	Intersection Upgrades	Ea	2	$100,000.00	$200,000.00
	New Intersection	Ea	1	$250,000.00	$250,000.00
	New Intersection at Wilson St/Farm Rd	Ea	1	$500,000.00	$500,000.00
				subtotal	**$950,000.00**
				Total	**$5,550,000.00**

VHB Vanasse Hangen Brustlin, Inc.