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# Downtown Marlborough Parking Analysis

Funding provided by the Marlborough Economic  
Development Corporation and District Local  
Technical Assistance (DLTA)



*Building on a Common Vision*

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## Executive Summary

The Metropolitan Area Planning Council (MAPC), a regional planning agency serving the 101 cities and towns of Metro Boston, collaborated with the City of Marlborough to complete a Downtown parking study. As the City embarks on a re-zoning effort for Downtown Marlborough, analyzing the local parking capacity and occupancy was deemed an important step in trying to maximize efficiency of the current parking spaces, and determine whether additional parking capacity is necessary for Downtown Marlborough. Therefore, at the request of the City, MAPC conducted a small-scale parking study in Downtown Marlborough with the intent of creating an inventory of all existing on- and off-street public parking, and providing recommendations as appropriate for improving the existing parking supply. In addition to the parking study, an in-depth evaluation of existing parking requirements found in the City's Zoning Bylaw was undertaken for the downtown area. As part of the study, MAPC analyzed existing parking capacity and occupancy data, and met with local residents and business owners to identify current issues.

Study area observations were completed during the Fall of 2013. Overall, the parking analysis showed there is adequate parking supply in Downtown Marlborough during the weekday peak hours. Although the core of the business area along Main Street experiences a high level of parking demand, there are numerous parking lots and garages within a one or two minute walk that experience a much lower demand and provide additional capacity.

### Key Field Observations

- Marlborough has a significant number of parking spaces within the Downtown area, thanks to two large public garages, surface parking lots, and on-street parking. There are a total of 886 on- and off-street public parking spaces within the study area (904 spaces were observed for the purposes of this study).
- Downtown Marlborough has one of the largest parking capacities in the MetroWest region.
- Peak occupancy occurred at 1pm with 60% of the spaces in the study area occupied.
- Within the study area, on-street parking on Main Street between Granger Boulevard and Bolton Street Extension experienced the highest parking demand

### Key Recommendations

Given the availability of parking, it is not necessary at this time to build any new parking spaces in Downtown Marlborough. Due to the parking capacity in the two centrally located garages, there is enough excess capacity to allow a significant amount of new development without overtaxing the existing parking supply. This report is intended to serve as a baseline of parking data for the City to use to as it moves forward with the revitalization of Downtown Marlborough.

In this report, MAPC has outlined a number of recommendations that can help Marlborough make the most of its parking supply as a tool for economic development. Physical improvements to existing parking and new parking management strategies will help businesses and the residents, employees and patrons who frequent this area, while a new framework for parking requirements will encourage development in a way that contributes most to Marlborough's unique character. The recommendations are summarized below in terms of their timeline for implementation.

Near Term:

- Improve signage to direct drivers to off-street lots and garages.

- Improve lighting and general condition in garages, as well as other maintenance to existing parking supply.
- Establish a dedicated account for parking-related revenue, and earmark funds toward parking maintenance and operations, and other improvements to reduce parking demand.
- Establish a residential parking permit program to allow overnight parking in the garages.
- Adopt recommended changes to the local zoning to encourage dense development in the Downtown that fits with Marlborough's existing character and utilizes existing parking capacity.

Medium/Long Term:

- When significant development has occurred, or if significant changes have been made to Downtown parking supply, conduct a detailed follow-up parking study to determine if supply and demand are balanced under current management policies.
- When parking utilization is observed to exceed 85% occupancy in key areas in Downtown Marlborough, pricing should be implemented to balance supply and demand. Prices should be highest in areas with the highest occupancy, and lowest in areas with excess capacity.
- Use revenue in parking account to make pedestrian, bicycle and transit improvements. These could include sidewalk and intersection improvements to improve pedestrian safety, bicycle lanes and bicycle racks, and other streetscape improvements such as lighting, landscaping, and street furniture.

## Introduction

Downtown Marlborough consists of a mix of business, retail, restaurant, and office uses. Main Street and Granger Boulevard are the two major corridors through the Downtown area. Main Street is a dense, walkable, low-speed roadway with multiple crosswalks and on-street parking. Granger Boulevard is a wider roadway with buildings that are spread out and set back from the street, and vehicles traveling at higher rates of speed, resulting in a less favorable environment for pedestrians.

The goal of this parking study is to demonstrate how existing downtown parking spaces are currently being utilized, in order to determine if the existing parking supply is appropriate, how local parking regulations should be adjusted, and how much capacity exists for future development.

MAPC studied existing parking capacity and occupancy in the Downtown Marlborough study area as outlined by the City of Marlborough. The scope for this parking study included the following tasks:

- Inventory all on- and off-street parking within the study area
- Document existing parking regulations within the study area
- Collect weekday occupancy data for public on- and off-street parking within the study area
- Identify peak occupancy times
- Evaluate the existing zoning bylaw

Throughout this process, MAPC reviewed local survey data, as well as held meetings with the public and the Downtown Study Group to determine existing issues and potential solutions.

## Survey and Public Meetings

The Marlborough Economic Development Corporation released a survey to local residents and business owners asking a variety of questions about Downtown Marlborough. The survey received approximately 500 responses, and included several questions that referenced parking issues. Detailed excerpts of survey results that relate to parking are included in **Appendix A**. The key findings include the following:

- The survey was divided fairly evenly between people who visit Downtown Marlborough daily or weekly, and people who come less often, indicating a need for easy-to-understand regulations and good signage.
- Many people mentioned that better parking would encourage them to visit Downtown Marlborough more often.
- Specific improvements mentioned by multiple respondents include better lighting in the garages, better signage directing people to off-street parking, and better enforcement so prime on-street spaces are available for short-term visitors.

In addition to the survey, MAPC gathered community input at a public forum on April 3, 2014, and a presentation of the initial results of the parking study on April 17, 2014. The public forum was attended by approximately 100 residents and business owners, and several local officials. The lively discussion featured a strong desire for Downtown Marlborough to remain walkable, and for new development downtown to focus on residential and active uses, such as restaurants, arts and entertainment.

At the April 17 meeting, MAPC staff presented preliminary results of the parking study and draft recommendations to a smaller group that included members of the City Council and Planning Board, as well as several members of the public. The presentation (attached in **Appendix B**) was extremely

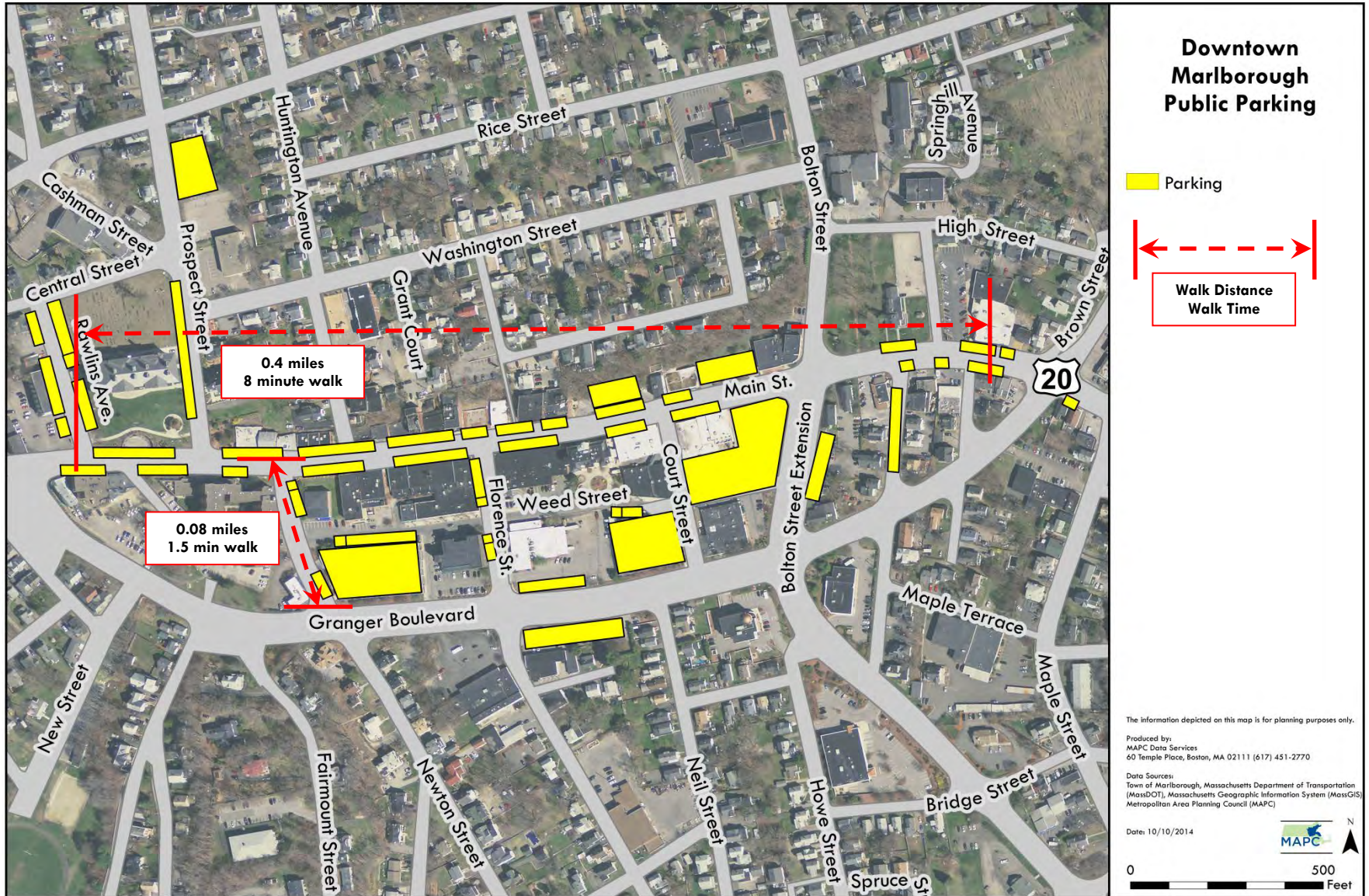
well received, with discussion focusing on how Marlborough can accommodate desired new development while focusing on preserving and enhancing walkability. The conversation even transitioned to how to increase bicycling to Downtown Marlborough.

## Study Area

Downtown Marlborough is walkable and compact, and centers around a retail area on Main Street. As shown in **Figure 1**, the study area stretches 0.4 miles in length on Main Street, or approximately an 8 minute walk. Granger Boulevard to Main Street is less than 0.1 mile, or less than a 2 minute walk. The study area includes the following public on- and off-street parking areas in Downtown Marlborough:

- Off-Street Garage: Newton Street
- Off-Street Garage: Court Street
- Off-Street Lot: Prospect Street
- Off-Street Lot: Post office
- Off-Street Lot: Granger Boulevard
- Off-Street Lot: Main Street (at Court Street)
- Off-Street Lot: Main Street (at Bolton Street)
- Off-Street Lot: Bolton Street (west side)
- Off-Street Lot: Bolton Street (east side)
- Main Street, between Rawlins Street and Maple Street
- Rawlins Avenue, between Central Street and Main Street
- Prospect Street, between Central Street and Main Street
- Newton Street, between Main Street and Granger Boulevard
- Florence Street, between Main Street and Granger Boulevard
- Court Street, between Main Street and Granger Boulevard
- Weed Street, between Newton Street and Court Street
- Cotting Avenue, between Main Street and Granger Boulevard

Figure 1 Downtown Marlborough Study Area and Walking Distances



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## Existing Parking Analysis

In order to determine the existing parking conditions within Downtown Marlborough, MAPC conducted a parking study on Tuesday, November 19, 2013, from 9:00 a.m.–2:00 p.m. Prior to the data collection effort, the number, type, and location of all parking spaces within the study area were documented.

### Parking Capacity

The number and type of parking spaces in Downtown Marlborough by block is shown in **Figure 2** and **Table 1**. The downtown area includes a variety of parking restrictions, including 2 hour, 30 minute, handicap parking, as well as unrestricted parking.

There are a total of 904 parking spaces (886 of which are public) within the study area, of which 383 are located in garages, 279 are located in parking lots, and 242 are on-street spaces. The majority (79%) of the on-street spaces are designated as 2 hour parking, most with restrictions during the hours of 2am-5am. Off-Street lots and garages generally are unrestricted or do not allow parking between 2am-5am or 2am-7am. All parking spaces in Downtown Marlborough (including the garages) are free.

Figure 2 Downtown Parking Restrictions and Number of Spaces

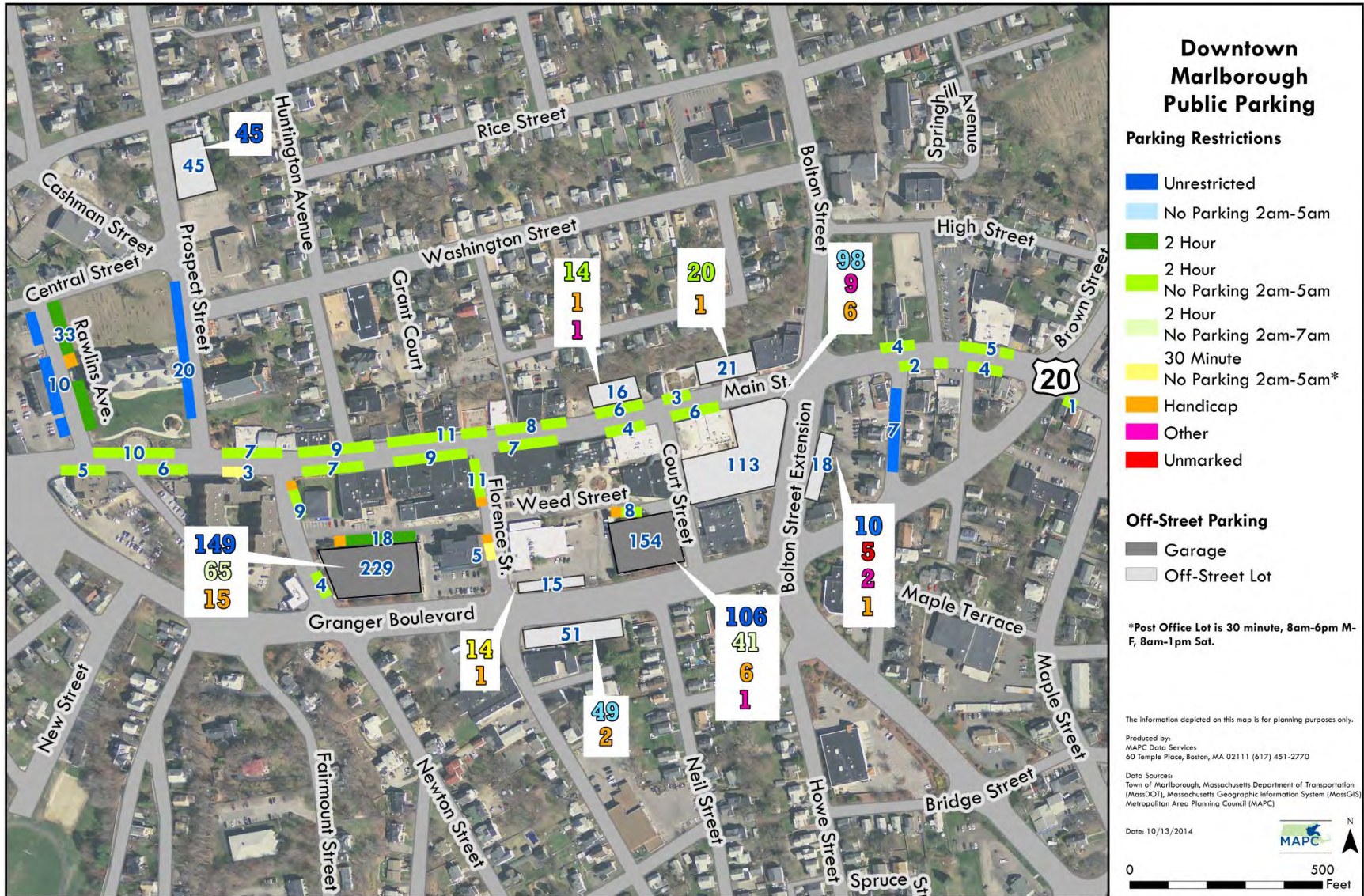


Table 1. Parking Capacity by Type<sup>1</sup>

Location	Type of Parking					
	2 Hour (No Parking 2-5am)	30 Min	No Parking 2-5am/ 7am	No regulation	Handicap	Private/ Other
<b>Garage Spaces</b>						
Garage: Newton Street	-	-	65	149	15	-
Garage: Court Street	-	-	41	106	6	1
<i>Garage Subtotal (383 spaces)</i>	<i>0</i>	<i>0</i>	<i>106</i>	<i>255</i>	<i>21</i>	<i>1</i>
<b>Off-Street Lot Spaces</b>						
Lot: Prospect Street	-	-	-	45*	-	-
Lot: Post Office	-	14	-	-	1	-
Lot: Granger Boulevard	-	-	49	-	2	-
Lot: Main Street (at Court Street)	14	-	-	-	1	1
Lot: Main Street (at Bolton Street)	20	-	-	-	1	-
Lot: Bolton Street (west side)	98**	-	-	-	6	9**
Lot: Bolton Street (east side)	-	-	-	10	1	7
<i>Off-Street Lot Subtotal (279 spaces)</i>	<i>132</i>	<i>14</i>	<i>49</i>	<i>55</i>	<i>12</i>	<i>17</i>
<b>On-Street Parking Spaces</b>						
Main St – Rawlins to Prospect (N)	10	-	-	-	-	-
Main St – Prospect to Newton (N)	7	-	-	-	-	-
Main St – Newton to Florence (N)	20	-	-	-	-	-
Main St – Florence to Court (N)	14	-	-	-	-	-
Main St – Court to Bolton (N)	3	-	-	-	-	-
Main St – Bolton to Exchange (N)	4	-	-	-	-	-
Main St – Exchange to Granger (N)	5	-	-	-	-	-
Main St – Granger to Windsor (S)	5	-	-	-	-	-
Main St – Windsor to Prospect (S)	6	-	-	-	-	-
Main St – Prospect to Newton (S)	-	3	-	-	-	-
Main St – Newton to Florence (S)	16	-	-	-	-	-
Main St – Florence to Court (S)	11	-	-	-	-	-
Main St – Court to Bolton (S)	6	-	-	-	-	-
Main St – Bolton to Ames (S)	2	-	-	-	-	-
Main St – Ames to Granger (S)	4	-	-	-	-	-
Main St – Granger to Maple (S)	1	-	-	-	-	-
Rawlins Ave – Central to Main (W)	-	-	-	10	-	-
Rawlins Ave – Central to Main (E)	32***	-	-	-	1	-
Prospect St – Central to Main (E)	-	-	-	20	-	-
Newton St – Main to Weed	8	-	-	-	1	-
Newton St – Weed to Granger	4	-	-	-	-	-
Florence St – Main to Weed	10	-	-	-	1	-
Florence St – Weed to Granger	-	4	-	-	1	-
Weed St – Newton to Florence	17***	-	-	-	1	-
Weed St – Florence to Court	7	-	-	-	1	-
Cotting Ave – Main to Granger	-	-	-	7	-	-
<i>On-Street Subtotal (242 spaces)</i>	<i>192</i>	<i>7</i>	<i>0</i>	<i>37</i>	<i>6</i>	<i>0</i>
<b>Grand Total (904 spaces)</b>	<b>324</b>	<b>21</b>	<b>155</b>	<b>347</b>	<b>39</b>	<b>18</b>

Parking space and restriction data collected in November 2013 \*\*Demarcation of public and private parking unclear  
 \* Estimated number due to lack of striping within the lot \*\*\* No overnight restrictions posted

## Parking Occupancy

In order to document parking occupancy, the number of vehicles in the study area was observed at 9am, 11am, and 1pm, in order to gain an in-depth understanding of how parking is utilized in Downtown Marlborough. The study was able to determine the parking occupancy by time of day for each parking location and type of parking space. This parking data helps to identify peak demand times and areas with the highest parking demand. A summary of the on-street and off-street parking occupancy is shown below in **Table 2**. The occupancies by time of day are also shown in chart form in **Figure 3**.

The peak for garage parking was observed at 11:00am, when 56% of spaces were occupied. The peak for off-street parking lots and on-street spaces was observed to be 1:00pm, when 66% and 68% of spaces were occupied, respectively. Overall, the peak parking was observed at 1:00pm, when 60% of all spaces were occupied. Parking occupancies during the peak hour are illustrated in **Figure 4**.

In general, 85% occupancy is a desirable target. At 85% occupancy, most spaces are full but arriving drivers will easily find an open space. For on-street parking, 85% occupancy means about one open space on each block. At lower occupancy, there is more parking than necessary, taking up space that could more productively be used for something else. At occupancy higher than 85%, drivers find it difficult to find a space, leading them to circle around and generate excess traffic, or simply leave the area. When occupancy exceeds 85% in some areas, introducing pricing can help balance supply and demand, and direct drivers to use parking areas, such as garages, that have more space available.

In Downtown Marlborough, our study revealed that parking was always available on-street, in surface lots, and in the garages. Surface parking lots and on-street parking were the most popular destinations, followed by garage parking. Currently there is no signage directing visitors and business patrons to the free garages. Improving signage could greatly increase the use of the garages and help maintain on-street parking for short-term uses.

**Table 2. Percent of Occupied Spaces by Time of Day**

Parking Location	Total Number of Spaces	Weekday Observations		
		9:00 am	11:00 am	1:00 pm
<b>Garage Spaces</b>				
Garage: Newton Street	229	40%	48%	44%
Garage: Court Street	154	62%	66%	60%
<i>Garage Subtotal</i>	383	49%	56%	50%
<b>Off-Street Lot Spaces</b>				
Lot: Prospect Street	45	18%	18%	22%
Lot: Post Office	15	40%	47%	80%
Lot: Granger Boulevard	51	69%	73%	96%
Lot: Main Street (at Court Street)	16	50%	25%	63%
Lot: Main Street (at Bolton Street)	21	-	38%	105%
Lot: Bolton Street (west side)	113	51%	74%	65%
Lot: Bolton Street (east side)	18	28%	67%	50%
<i>Off-Street Lot Subtotal</i>	279	43%	57%	66%

Parking Location	Total Number of Spaces	Weekday Observations		
		9:00 am	11:00 am	1:00 pm
<b>On-Street Parking Spaces</b>				
Main St – Rawlins to Prospect (N)	10	90%	80%	80%
Main St – Prospect to Newton (N)	7	86%	57%	71%
Main St – Newton to Florence (N)	20	60%	70%	80%
Main St – Florence to Court (N)	14	57%	71%	86%
Main St – Court to Bolton (N)	3	0%	67%	100%
Main St – Bolton to Exchange (N)	4	25%	0%	25%
Main St – Exchange to Granger (N)	5	100%	100%	60%
Main St – Granger to Windsor (S)	5	100%	80%	120%
Main St – Windsor to Prospect (S)	6	67%	17%	67%
Main St – Prospect to Newton (S)	3	33%	33%	100%
Main St – Newton to Florence (S)	16	88%	94%	69%
Main St – Florence to Court (S)	11	45%	73%	82%
Main St – Court to Bolton (S)	6	0%	17%	33%
Main St – Bolton to Ames (S)	2	100%	100%	50%
Main St – Ames to Granger (S)	4	100%	75%	100%
Main St – Granger to Maple (S)	1	0%	0%	0%
Rawlins Ave – Central to Main (W)	10	80%	90%	60%
Rawlins Ave – Central to Main (E)	33	45%	45%	67%
Prospect St – Central to Main (W)	20	40%	65%	85%
Newton St – Main to Weed	9	56%	67%	67%
Newton St – Weed to Granger	4	25%	0%	25%
Florence St – Main to Weed	11	91%	64%	27%
Florence St – Weed to Granger	5	80%	60%	80%
Weed St – Newton to Florence	18	22%	72%	61%
Weed St – Florence to Court	8	50%	63%	50%
Cotting Ave – Main to Granger	7	57%	43%	43%
<i>On-Street Subtotal</i>	242	57%	63%	68%
<b>Grand Total</b>	<b>904</b>	<b>49%</b>	<b>58%</b>	<b>60%</b>

Parking analysis performed on Tuesday, November 19, 2013. Prospect Street counts were taken on September 22, 2014. Shading indicates the highest occupancy rate of the day.

Figure 3 Occupancy vs. Capacity

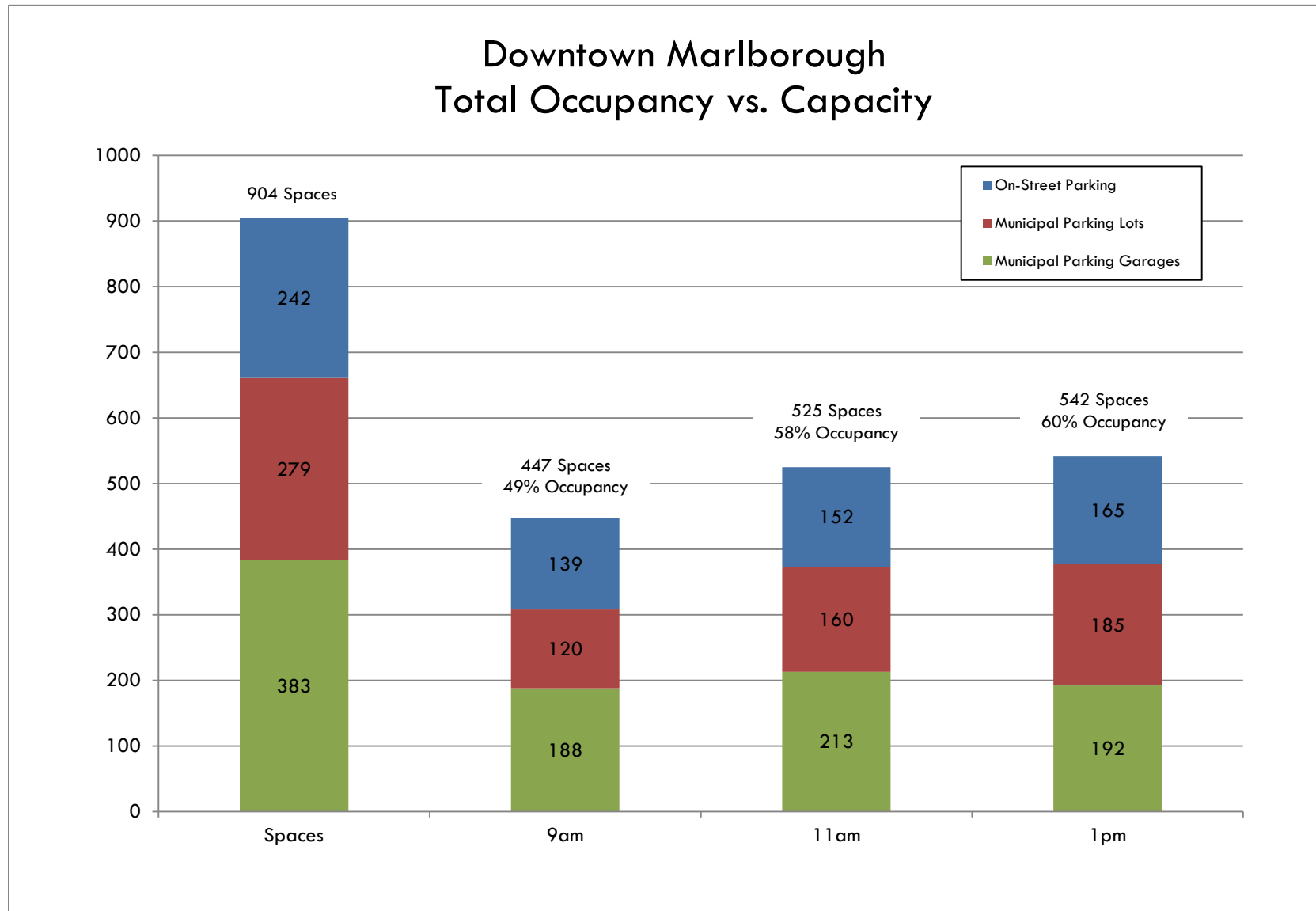
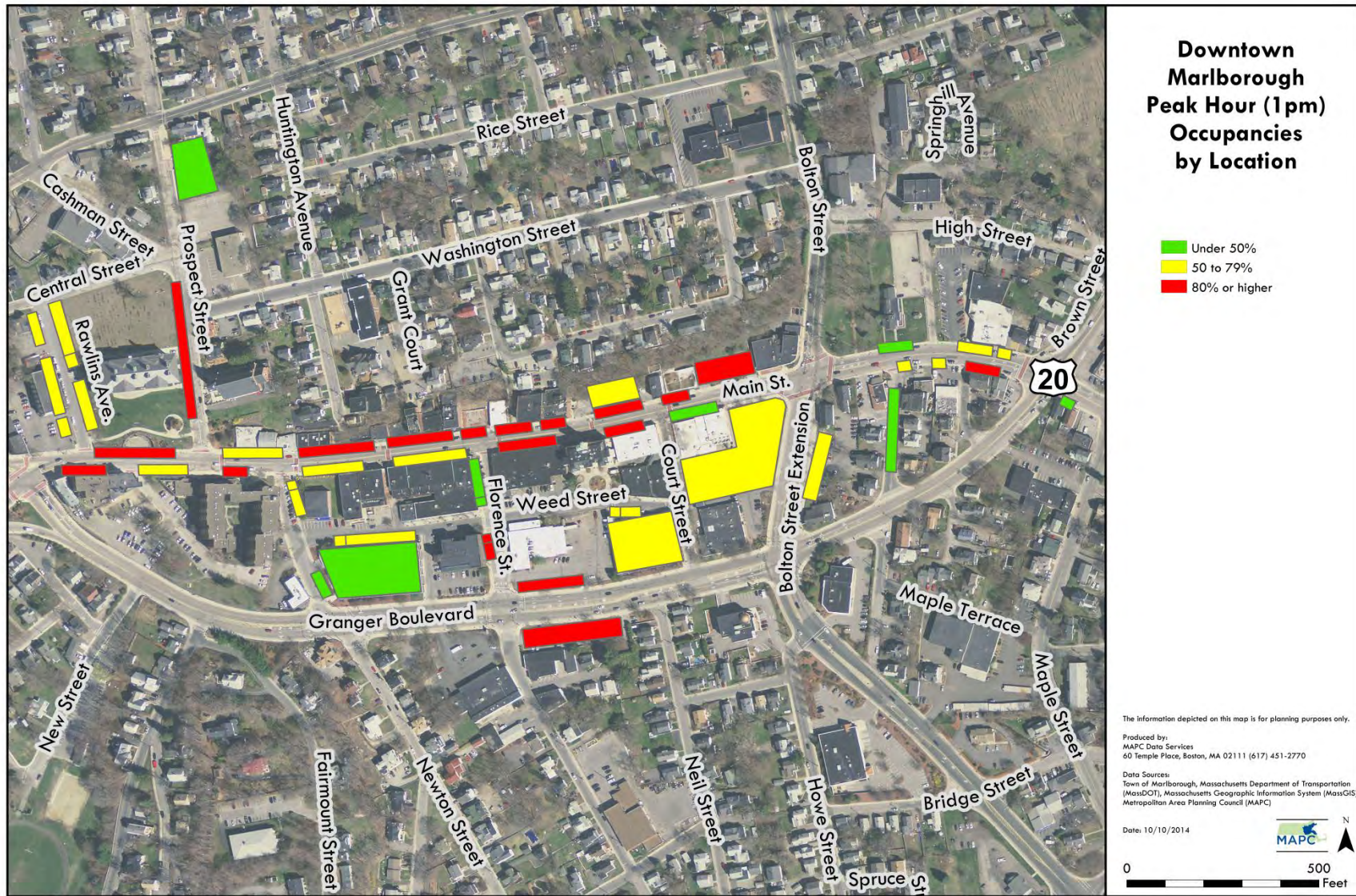


Figure 4 Peak Hour Occupancy by Location (UPDATE)



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## Parking Capacity in the Region

With 886 public spaces, Downtown Marlborough has one of the largest parking capacities in the MetroWest region. Due to the two parking garages, multiple surface lots, and on-street parking spaces in Downtown Marlborough, an ample amount of public parking is available for Downtown Marlborough's existing uses. Parking capacities for Hudson and Natick were compared to Marlborough's, in order to get a sense of parking availability and parking density within each of the communities. Through a comparison of these three communities illustrated in **Figure 5**, MAPC was able to determine that Marlborough offers significantly more public parking than Hudson and Natick. Also, due to the garages, Marlborough's parking is available in a denser area (illustrated in **Figure 6**), resulting in parking space locations that are more convenient to local businesses.



Figure 5 Public Parking Capacity and Density in the MetroWest Region

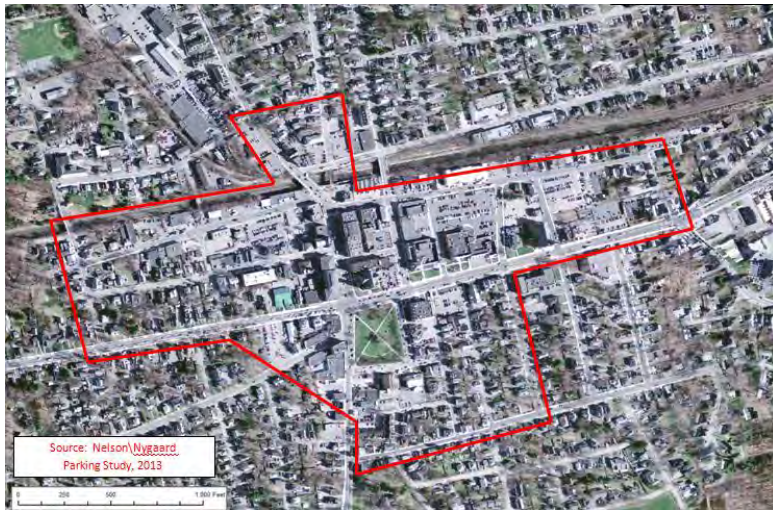
Hudson

637 spaces



Natick

770 spaces



Marlborough

886 spaces



Figure 6 Public Parking Capacity and Density in the Region – Comparison



## Parking Maintenance and Management Recommendations

Currently, Downtown Marlborough offers a variety of parking spaces for public use, including on-street, off-street lot, and garage parking spaces. Occupancy data shows that there is adequate availability in the Downtown area, with room for additional growth.

Many residents and local business owners feel that parking in the Downtown could be improved, and **MAPC urges the City to improve parking maintenance and management rather than construct new parking to solve this problem.** What follows are MAPC's specific recommendations to improve the existing parking supply, based on observations made during the study and input from the community.

**Recommendation:** Improve signage and condition of garages and parking lots.

Signage is lacking throughout Marlborough's Downtown. The survey revealed that many visitors to Marlborough seem unaware that the garages exist, and **others are unaware that the garages are free and for public use**, resulting in visitors searching for on-street spaces. **New signage identifying the garage locations (and that parking is free) can help alleviate this problem**, and will also encourage long-term visitors to utilize the garage parking instead of on-street or surface lot parking. Garage parking should also be improved and maintained on a regular basis, as many residents mentioned in the survey that the garages are "creepy" or "scary", and that people "don't feel safe" within them. In addition, a number of garages and public lots could benefit from repaving or new striping to better define the individual parking spaces and enable them to be used more efficiently.

MAPC offers the following recommendations for City-owned garages and parking lots:

### Newton Street Garage

- Provide signage directing drivers on Main Street and Granger Boulevard to the garage.
- Provide bright lighting within the garage to increase safety.
- Remove heavy equipment stored in garage to provide a more welcoming environment.
- Hire an engineering firm to test the structural integrity of the garage and make improvements as necessary.



### Court Street Garage

- Provide signage directing drivers on Main Street and Granger Boulevard to the garage.
- Hire an engineering firm to test the structural integrity of the garage and make improvements as necessary.

### Prospect Street Lot

- Provide signage at the entrance to the lot indicating that it is public parking.
- Provide new pavement markings to identify the location of the parking spaces.
- Prohibit long-term vehicle storage in this lot by local businesses and residents by providing signage that clearly states long-term parking is prohibited, and conducting periodic enforcement.

### Post Office Lot

- Provide signage at the entrance to the lot indicating that there is public parking available, and, if necessary, additional signage identifying the individual spaces that are available to the public (distinct from post office customer parking).

- Resurface the lot and provide new pavement markings to identify the location of the parking spaces.

#### Granger Boulevard Lot

- Provide signage at the entrance to the lot indicating that it is public parking and, if necessary, additional signage identifying the individual spaces that are available to the public (distinct from customer parking for the adjacent businesses).

#### Bolton Street Lot (west side)

- Provide signage at the entrance to the lot indicating that it is public parking.
- Consider posting time restrictions in this parking lot. Long-term parking should be encouraged in the garage.

#### Bolton Street Lot (east side)

- Provide signage at the entrance to the lot indicating that it is public parking.
- Provide new pavement markings to identify the location of the public parking spaces.

#### Senior Housing Lot

- The lot is currently in very poor condition, which may encourage residents to park in the nearby garages, surface lots, or on-street spaces. Resurface the lot and provide new pavement markings to identify the location of the parking spaces.
- Improve pedestrian access to the lot from Windsor Street, and consider providing new pedestrian access directly to Granger Boulevard.

**Recommendation:** Improve the condition of certain on-street parking locations.

In general, on-street parking in Downtown Marlborough is well signed and in good condition. A few areas may benefit from slight improvements, such as:

- Provide improved signage at all 30 Minute parking areas. As the majority of the Downtown is 2 Hour parking, consider installing new signs to better designate the 30 Minute spaces, such as by making them a different color from the 2 hour parking signs. Otherwise, visitors may assume that these spaces are 2 Hour spaces and the desired turnover will not occur.
- Resurface Cashman Street. Although it was outside of the study area of this parking study, MAPC staff noted that Cashman Street is in a state of disrepair and may benefit from resurfacing and restriping.



**Recommendation:** Increase the cost of parking tickets.

Currently, the City charges a \$10 fee for parking infractions. Increasing this cost to \$20 (comparable to Framingham) or \$25 (comparable to Cambridge and Boston) will provide a greater incentive for residents and business owners to abide by the posted parking restrictions.

**Recommendation:** Establish a permit system for overnight residential parking in city-owned garages and lots, with an annual fee for each residential permit.

Downtown Marlborough's public parking lots and garages are a valuable asset that should be taken full advantage of. Currently overnight parking is prohibited in many downtown parking areas, while new residential development is highly desired for Downtown Marlborough. Allowing downtown

residents to park in existing public lots is an excellent way to encourage residential development, avoid building redundant parking, and make downtown housing more affordable by taking advantage of the existing parking supply. A resident permit system would enable the City to manage supply and demand for overnight parking, and to conduct enforcement to make sure that only authorized vehicles are parking overnight. A resident parking permit program could be established along the following lines:

- Change regulations and update signage to allow overnight parking with proper permit.
- Permit program managed by Parking Clerk. Residents can sign up in person at City Hall or online.
- Permit is linked to a specific vehicle. Each permit holder can receive 1 visitor pass that can be used for up to three consecutive days, or longer if the resident notifies the City.
- Annual fee of \$50 - \$150 per year for each vehicle. (Fees in other municipalities vary widely; see table below.)
- Revenue is directed toward a dedicated parking fund (see below).

Attaching an annual fee to the permit is a way to defray the costs of administering the permit system, and to support maintenance of garages. If in the future there is very high demand for overnight parking in the public lots and garages, the fee can be increased in order to bring supply and demand into equilibrium.

Examples: Cities that Allow Overnight Residential Parking in Public Garages and Lots	
Melrose	Permits available to Melrose residents for overnight parking in municipal lots. Cost is \$80 per year and number of permits is capped at 300. Administered by Parking Clerk.
Salem	Permits for parking in City garages are available for \$702/year or \$65/month. Overnight and daytime parking both allowed; car must be moved every 72 hours unless garage management is notified.
Haverhill	Residential and employee permits are available for public lots in the downtown. Cost is \$15 per month or \$45 per quarter. Permit program and all public parking managed by a private contractor.
Cambridge	Resident permits are available for on-street parking at a cost of \$25 per year. Resident permit holders receive 1 visitor pass which can be used for up to 3 consecutive days, or up to 2 weeks if the City is notified in advance.

**Recommendation:** Set up a dedicated account or revolving fund to manage all parking-related revenue.

Several recommendations in this report could generate additional parking-related revenue for Marlborough either now or in the future. Many of these recommendations will be more successful and politically palatable if the public can see that parking revenue is being dedicated toward parking maintenance and other Downtown improvement efforts. MAPC recommends that a dedicated account or revolving fund be established to receive all parking-related revenue, including parking tickets, residential parking permit fees, fees in lieu of parking paid by developers, and any future parking meter revenue. Outlays from this account should be restricted to the following expenditures:

- Maintenance, operations, and capital improvements of parking facilities.
- Administration of parking permit program.
- Efforts to reduce demand for parking, such as pedestrian and bicycle improvements, bicycle parking, and public transit.

- Improvements to the streetscape and pedestrian realm that encourage people to park once and walk between multiple destinations, or to use parking further from their destination. This could include lighting, landscaping, street furniture, and other improvements.

**Recommendation:** When parking occupancies increase and/or significant new development has occurred in the Downtown, follow up with a more in-depth parking study to assess how demand has changed and whether additional management, pricing or supply strategies are needed.

Parking observations indicate that parking supply is adequate for current Marlborough uses and excess capacity is available for future uses. MAPC recommends that the City of Marlborough utilize this study as a baseline and follow up with another parking study when there are significant increases in development and/or parking use, or a significant decrease in parking supply (such as by developing existing surface parking lots) in the Downtown. A future study should include:

- Daytime, evening and weekend observations. Evening and weekend observations are especially important if new dining, entertainment, and/or residential development occurs in the Downtown.
- Duration information. This can help identify whether the most convenient spaces (such as on-street parking, and the small lots on the North side of Main Street) are turning over, or whether they are being occupied all day long by the same vehicles, thereby making it less convenient for customers and other short-term visitors to find parking.
- Evaluation of the need for pricing. If utilization of on-street spaces increases above an average of 85% at peak times, pricing may be needed to help manage supply and demand, and encourage people to use available spaces in garages and off-street lots. If needed, pricing should be implemented in response to demand, so that the areas with the highest utilization have the highest prices, and the areas with very low utilization remain free.

## Parking Policy Analysis

MAPC's analysis of Marlborough's downtown parking supply and occupancy was conducted in order to make recommendations for the more efficient use of existing parking, and to inform the City's planned rezoning of the downtown. Downtown Marlborough has many important assets, including a large existing supply of public parking, and an attractive, walkable Main Street. The following recommendations are aimed to help Downtown Marlborough grow, while preserving and taking full advantage of what is already there.

### Existing Parking Requirements within the Zoning Bylaw

National standards for minimum parking requirements, such as those recommended by the Institute for Transportation Engineers (ITE), are often based on isolated single-use sites with no transportation options other than private automobile. Many communities around the country and around Massachusetts are moving away from these one-size-fits-all recommendations, which often result in a costly oversupply of parking. MAPC recommends a context-sensitive approach, which takes into account the existing density and mix of uses, the available transportation options, and the existing parking supply. In addition, the two public meetings and the survey referenced above have allowed us to tailor our recommendations in order to support the types of growth that the Marlborough community envisions for downtown.

**Table 3** below shows a comparison of parking requirements for desired downtown land uses in different MetroWest communities. Marlborough's existing minimum parking requirements are, for the most part, much higher than those of its neighbors.

Table 3. Comparison of Local Parking Requirements

	Retail	Office	Residential	Restaurant
Hudson	2 per 1,000 sf	2 per 1,000 sf	2.5 per unit	2 per 1,000 sf
Hopkinton	4 per 1,000 sf	3 per 1,000 sf	1 per unit	1 per 3 seats
Natick	4 per 1,000 sf	3 per 1,000 sf	1 per unit	1 per 3 seats
Southborough	6.6 per 1,000 sf	3.5 per 1,000 sf	2-3 per unit	1 per 3 seats, plus 1 per employee
<b>Marlborough</b>	<b>10 per 1,000 sf</b>	<b>4 per 1,000 sf</b>	<b>2 per unit</b>	<b>1 per 3 seats, plus 1 per 3 employees</b>

Marlborough’s existing high parking requirements effectively make development more expensive in Marlborough than in surrounding towns. Each surface parking space can cost \$20,000 to \$50,000 to construct, while taking up land that could be used for income- and tax-generating purposes. In addition, high parking requirements make it much more difficult for developers to repurpose existing buildings, especially buildings like the beautiful historic structures in Downtown Marlborough. Older buildings often occupy most or all of a site, which means that there is no place to provide parking unless the building is demolished or neighboring sites are purchased.

In addition to creating hurdles for developers, Marlborough’s existing parking requirements are mandating more parking than Marlborough residents actually need. While Marlborough’s residential parking minimum is higher than those of its neighbors, **Table 4** below shows that the vehicle ownership rate in Marlborough is the second lowest among the surrounding communities. The ownership rates below were calculated using US Census data on the number of households, and the Massachusetts Registry of Motor Vehicles’ database of all vehicles registered in Massachusetts.

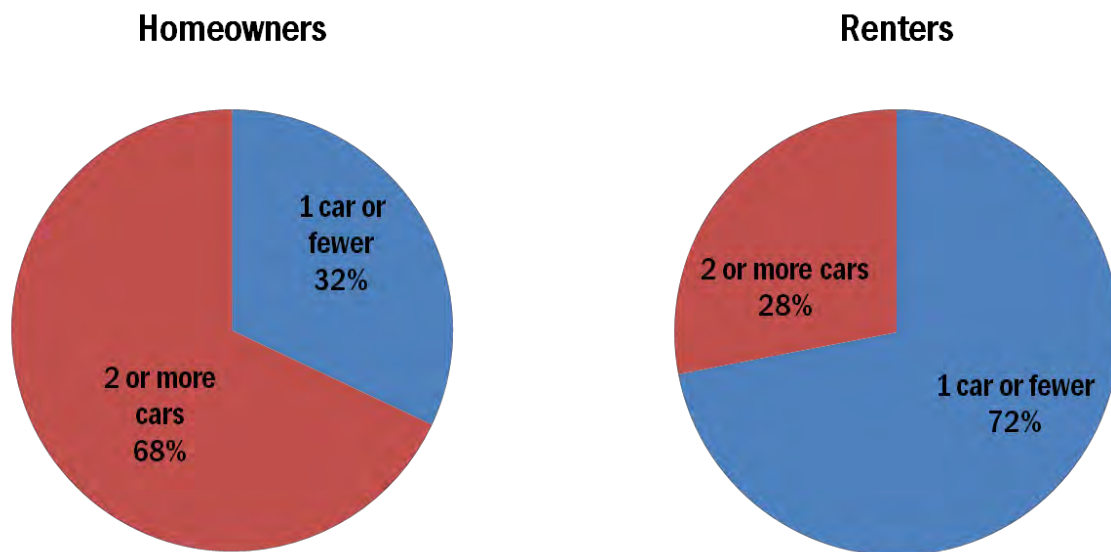
Table 4. Comparison of Vehicle Ownership Rates

Community	Current Vehicle Ownership per Household
<i>MetroWest Communities</i>	
Framingham	1.19
<b>Marlborough</b>	<b>1.30</b>
Natick	1.37
Hudson	1.45
Ashland	1.47
Hopkinton	1.71
Southborough	1.72
<i>Communities outside MetroWest</i>	
Cambridge	0.85
Somerville	1.00
Northampton	1.37
Newburyport	1.56

In Marlborough, the current minimum requirement of at least two spaces per unit is significantly higher than the current vehicle ownership rate of 1.3 cars per household. This disconnect is even more striking when renters and homeowners are considered separately. As **Figure 7** below shows,

vehicle ownership rates are lower among renters than homeowners. According to data from the US Census, 72% of renter households in Marlborough have one car or less.

Figure 7 Vehicle Ownership among Marlborough Renters vs. Homeowners



These comparisons show that Marlborough’s current parking requirements are higher than they need to be, and they certainly are higher than the requirements in neighboring communities. Reducing parking requirements in Downtown Marlborough, and making them more flexible, can help Marlborough attract the type of development that is desired downtown.

## Parking Policy Recommendations

Marlborough is fortunate to have a downtown with many excellent features: an attractive, walkable Main Street lined by historic buildings, and as the above parking analysis shows, plenty of parking already available within a one or two-minute walk of any destination. The clear consensus observed at the community meetings and in the survey was a desire to preserve and enhance downtown’s dense, walkable character.

By reducing parking requirements and making them more flexible, Marlborough can make the downtown more attractive to developers, and encourage redevelopment of existing buildings, rather than new development that tears down historic structures in order to add additional surface parking. Reduced parking requirements will in turn reduce development costs, which means that future residents and businesses in the downtown may benefit from more affordable rents. Freeing developers from the mandate to devote a large portion of their site to parking will create more opportunities for usable open space, and will increase tax revenue for the City.

Based on these considerations, MAPC has developed recommendations for Marlborough’s Downtown District zoning bylaw. **Table 5** outlines these recommendations, which were presented in an earlier draft form at the April 17 meeting. The sections that follow discuss the recommendations in more detail.



Table 5. Recommended Parking Requirements for Downtown Marlborough Zoning District

Use	Proposed Minimum	Proposed Maximum	Additional Stipulations	Current Minimum	MetroWest Comparison
Residential	1 per unit	N/A	Spaces in City-owned garages and lots within 1000 feet of the development can be counted to fulfill the required spaces \$10,000 fee-in-lieu for each publicly owned space counted toward minimum Requirement may be reduced by 10% if on-site car-sharing, such as Zipcar, is provided	2+	Natick, Hopkinton: Minimum 1 per unit  Natick: Off-site parking allowed with a \$16,000 fee-in-lieu per space
Retail	N/A	3 per 1,000ft <sup>2</sup>	N/A	10 per 1,000ft <sup>2</sup>	Hudson: 2 per 1,000ft <sup>2</sup>
Office	N/A	3 per 1,000ft <sup>2</sup>	N/A	4 per 1,000ft <sup>2</sup>	Hudson: 2 per 1,000ft <sup>2</sup>
Restaurant	N/A	3 per 1,000ft <sup>2</sup>	N/A	1 per 3 seats plus 1 per 3 employees	Hudson: 2 per 1,000ft <sup>2</sup>
Other Commercial	N/A	3 per 1,000ft <sup>2</sup>	N/A	Varies	Hudson: 2 per 1,000ft <sup>2</sup>
Public Assembly	Occupancy up to 250: N/A Occupancy over 250: no parking required for first 250 occupants; thereafter, 1 space per 6 legal occupants	1 per 4 legal occupants	For legal occupancy up to 250, no parking required. Can be reduced by Special Permit if developer demonstrates capacity in existing public parking at times of peak demand.	1 per 2 seats	Natick: 1 per 5 seats
Hotel	0.75 per room	1 per room	For 30 total rooms or less, spaces in City-owned lots and garages within 1000 feet of the development can be counted to fulfill requirement with \$10,000 per space fee-in-lieu	1 per room	Natick: 1 per room  Hudson: 2 per 1,000ft <sup>2</sup>

## Residential Parking Requirements

**Recommendation:** Reduce minimum parking requirement to .75 spaces per unit for studios and one bedroom units, and 1.25 spaces per unit for units with two bedrooms or more.

As noted above, Marlborough’s average vehicle ownership rate is 1.3 cars per household, while nearly three-quarters of Marlborough’s renters have 1 car or fewer. A lower minimum parking requirement for residential development in Downtown Marlborough can adequately serve the needs of future residents, while making it cheaper to build new apartments, and more affordable for residents.

**Recommendation:** Require un-bundling of parking, so that any onsite spaces are paid for separately by the residents who use them, rather than being automatically included in the rent or purchase price of all units.

The price of providing a parking space is typically included in the rental or purchase price of each apartment. However, not all residents have the same number of vehicles, and some residents have no vehicles at all. Unbundling the price of parking, that is, charging for each parking space on an a-la-carte basis, enables a lower overall parking ratio, because the spaces that are provided are used more efficiently. In addition, unbundling allows people who own fewer cars to save money, because when parking is automatically included in the rent or purchase price of an apartment, people who don’t own a car are paying for parking they don’t need. Unbundling the price of parking from the price of housing can incentivize people to own fewer cars, or attract people who already have fewer cars. Many communities across the country encourage “unbundling,” and many developers are doing it on their own. San Francisco is an excellent example of a city that has actually required unbundling through their zoning code.

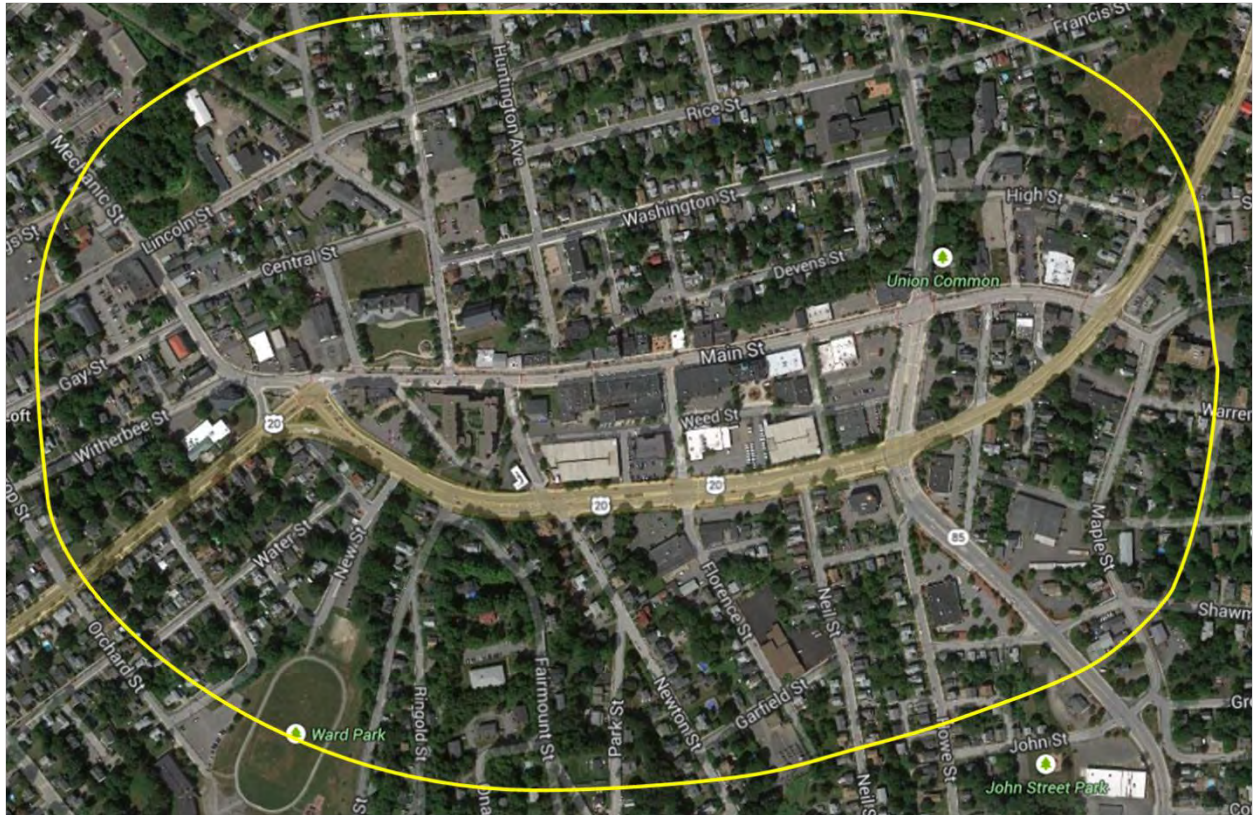
Example: Require Unbundling in the Zoning Code	
San Francisco	Planning Code Section 167: “a) All off-street parking spaces accessory to residential uses in new structures of 10 dwelling units or more, or in new conversions of non-residential buildings to residential use of 10 dwelling units or more, shall be leased or sold separately from the rental or purchase fees for dwelling units for the life of the dwelling units, such that potential renters or buyers have the option of renting or buying a residential unit at a price lower than would be the case if there were a single price for both the residential unit and the parking space.”

**Recommendation:** Allow spaces in City-owned garages and lots within 1000 feet of the development to be counted to fulfill the required number of spaces.

As noted in the first section of this report, Downtown Marlborough has plenty of public parking. In particular, the majority of existing uses in the study area are busiest during the daytime hours, which means that parking utilization is even lower at night, when there would be the highest demand for residential parking. This presents an excellent opportunity to encourage residential development and avoid unnecessary construction of new parking, by enabling residential developers to count public parking toward their minimum parking requirement.

**Figure 8** shows the areas of Downtown Marlborough that are within approximately 1000 feet of public off-street lot or garage. It takes less than 5 minutes to walk 1000 feet, which is about two typical city blocks.

Figure 8 – Approximate 1000 Foot Radius from City-Owned Garages and Lots



As shown above, essentially the entire Downtown zoning district is included in the proposed 1000 foot radius to off-site residential parking. Developers will make a case-by-case judgment on whether off-site parking is sufficiently convenient and accessible for their prospective tenants, but 1000 feet is a reasonable standard.

Examples: Cities that Allow Off-Site Residential Parking	
Natick	Off-site parking allowed with Special Permit, contingent upon safe pedestrian accommodations between parking and residential building
Salem	Residential development within the district can utilize municipal parking if within 1,000 feet

**Recommendation:** Require developers to pay a one-time fee of \$10,000 for each city-owned parking space that is counted toward their minimum requirement. Require that revenue be deposited in a dedicated parking revenue account.

As noted in the first section of this report, Marlborough’s public garages are in need of repair and ongoing maintenance. Charging a fee-in-lieu of parking for developers who take advantage of the option to count public parking toward their minimum parking requirement is a fair and reasonable way to ensure that public parking areas can be properly maintained. MAPC recommends that the fee be set lower than the average cost of constructing surface parking, which can range between \$20,000 and \$50,000 per space, in order to encourage developers to take advantage of this option. However it is important not to set the fee too low, because revenue for garage maintenance is needed.

In municipalities that have a fee in lieu of parking program, it is often administered much like any other mitigation payment paid by developers to the municipality. In the *Parking Management Recommendations* section above, MAPC recommended a dedicated account be established for all parking-related revenue, including fees in lieu of parking paid by developers. Revenues in this account should be dedicated toward maintaining and operating parking, and other improvements that reduce demand for parking.

Examples: Cities and Towns that Allow Payments-in-Lieu of Parking	
Natick	Developers may reduce onsite parking requirements with a special permit and a \$16,000 fee-in-lieu per space. Fee revenue is set aside for public parking construction and acquisition.
Braintree	Annual fee system for new uses or changed uses in the Village Zoning District where constrained sites prevent developers from meeting the minimum parking requirements. Fees are established through Special Permit and rates set by the Planning Board at a public meeting.
Northampton	Payment in-lieu of parking is allowed by right in Central Business District. One-time fee of \$3,000 per space is paid to the City and deposited in a dedicated account. Revenue can be used to add public parking, improve utilization of existing spaces or reduce the need for parking in the District.

## Commercial Parking Requirements

**Recommendation:** Eliminate minimum parking requirements for new retail, office, restaurant, and other commercial and service uses.

Downtown Marlborough currently has plenty of available parking, as shown in the first section of this report. In addition, the community has expressed a strong preference for preserving and enhancing Downtown Marlborough’s dense, walkable character. In this context, it is important to think about parking requirements not in the abstract, but by imagining what different requirements would actually look like if implemented.

Most of the parcels and potential development sites in Downtown Marlborough are relatively small, and the most attractive existing buildings are those that use up most, if not all, of the parcel, with little or no onsite parking. Allowing commercial development downtown with no parking required will encourage developers to redevelop existing historic buildings, or to build new structures that share the character of historic structures. Removing the commercial parking requirement allows developers to use more of the site for active uses, or open space. This makes Marlborough a more attractive place for investment, because more of a given parcel can be used for income-generating development. When developers are not required to build parking, they may be able to put more money into the aesthetic quality of the building or add more amenities that can benefit the downtown as a whole. At the same time, eliminating parking requirements can end up reducing rents for commercial tenants, and generating more tax revenue for the City.



Eliminating minimum parking requirements for commercial and retail development downtown does not mean that the employees and customers of those new businesses will have nowhere to park; it means that they will use the parking spaces that already exist in Downtown Marlborough.

In the future, when significant new development occurs in Downtown Marlborough, parking demand will likely increase. MAPC recommends that the zero parking requirement for commercial uses in the downtown remain in effect, even when significant new development occurs. More proactive management will be needed, including pricing the most in-demand parking spaces. However, the community’s desire to preserve Downtown Marlborough’s character will not change; using parking management techniques to balance supply and demand is therefore a better strategy than reinstating a minimum on-site parking requirement for commercial uses.

Examples: Cities and Towns with No Parking Minimums for Certain Uses or in Certain Locations	
Amherst	Off-street parking requirements waived for residential, retail, and research/industrial uses within the Municipal Parking District.
Ipswich	No parking requirements for businesses within Central Business District or within 500 feet of either municipal parking lot.
Salem	No parking requirements for non-residential development within Central Development District.
Walpole	No parking requirements for non-residential development within Central Business District or East Walpole Center Parking Relief overlay district.
Northampton	Parking requirements were eliminated for developments in the Downtown, in order to spur development.

**Recommendation:** Maximum of 3 spaces per 1000 square feet allowed for retail, office, restaurant, and other commercial and service uses.

In addition to eliminating minimum requirements, a maximum parking requirement can also be an important tool to shape the uses and character of new development in the downtown. Some large chains or more auto-oriented businesses, such as fast food restaurants, have their own standard parking ratios, which can at times be very high. Setting a maximum parking ratio can give communities a tool to ensure that if those businesses do come in, they adjust their one-size-fits-all model to be more consistent with the local setting and character. If there is truly a need for more parking than the maximum ratio, a special permit can be requested and other strategies can be employed to mitigate the effects of the additional parking.

Examples: Cities and Towns with Parking Maximums	
Bedford	With the stated intention of promoting the use of non-auto modes, Bedford’s parking requirements serve as both the minimum and the maximum for most uses.
Burlington	For most land uses, the minimum requirement is also the maximum. The specifically stated intent is to prevent the creation of unnecessary parking that can contribute to additional traffic, air pollution, and stormwater runoff.

**Recommendation:** For places of public assembly with legal occupancy of 250 or less, no parking required. For places of public assembly with legal occupancy of more than 250, no parking required for the first 250 legal occupants; thereafter, a minimum of 1 space per 6 legal occupants and a maximum of 1 space per 4 legal occupants. A further reduction is possible if through a Special Permit the developer can demonstrate parking capacity in City-owned garages, lots, and on-street spaces at times of peak demand.

Marlborough residents expressed a desire for a theater or other performance venue downtown. While these types of businesses can bring large numbers of people all at once, the peak time for parking tends to be on evenings and weekends, when offices and other businesses are closed. Theatre-goers may be easily accommodated by the existing parking supply if the facility is sited appropriately, making it unnecessary to construct additional on-site parking. Removing the requirement for on-site parking for the first 250 occupants will make it more financially viable for a performance venue to locate in Downtown Marlborough. MAPC has also included a maximum for public assembly uses, as large national chains may have standard parking ratios that would result in an island of surface parking surrounding a new movie theater, for example. This would be detrimental to downtown Marlborough’s walkable character; a parking maximum provides a tool for the city to prevent such a scenario.

**Recommendation:** For hotels, a minimum of .75 per room and a maximum of 1 per room; no parking required for employees. For hotels with 30 rooms or less, spaces in City-owned garages and lots can be counted to fulfill the required number of spaces, with a one-time fee of \$10,000 per space.

Marlborough residents also expressed a desire for a downtown hotel. MAPC recommends that dedicated parking be provided for guests, while employees should be encouraged to use the existing parking supply. A hotel can function similarly to new residential development, in that onsite parking is not needed if there is available space in nearby public garages and lots. While it would be unfair for a large chain hotel to monopolize the public garages for its guests, allowing smaller hotels to take advantage of the existing parking supply can help attract investment to Marlborough.

Examples: Cities with Reduced Parking Minimums for Hotels	
Everett	Minimum of 0.5 spaces per room
Cambridge	Minimum of 0.5 spaces per room
Revere	Minimum of 0.75 spaces per room

## Impact of Parking Requirements on Potential Development Yield

As part of the public program and discussion related to proposed future parking regulations, MAPC prepared build-out analyses for a hypothetical parcel in the downtown, based upon existing regulations and two alternative scenarios. A build-out analysis calculates, and illustrates, the potential development yield on a parcel, based upon a specific set of regulations and land use assumptions.

The existing zoning ordinance presents a number of significant constraints on downtown development and redevelopment, including high parking requirements, such as 2 spaces per residential unit, and 10 spaces per 1000ft<sup>2</sup> of retail. **Table 6** on the following page shows the type of development that result on a half-acre site, comparing the existing zoning to two alternative scenarios. In all three scenarios there is a requirement for 20% of the lot to be reserved for open space. In both alternatives the first floor is imagined as retail, which carries no parking requirement, with residential on the upper floors. The residential carries a parking requirement of one space per unit; in Alternative 1 the parking is provided on-site, while in Alternative 2 the parking is provided off-site by utilizing space in public garages and lots.

Table 6. Development Yield Under Existing Zoning and Alternatives

Scenario	FAR	Total Area of Active Uses	Building Height	Parking as a Percentage of Lot Area	Open Space
Existing Zoning	0.28	6,100ft <sup>2</sup>	2 story	63%	7' parking buffer/ building setback
Alternative 1	1.4	30,700ft <sup>2</sup>	4 story	44%	7' parking buffer/ building setback
Alternative 2 (recommended alternative)	3.2	69,700ft <sup>2</sup>	4 story	0%	4,350ft <sup>2</sup> park or plaza

The table above shows that existing zoning severely constrains the amount of development that can be built on a given site. The comparison between Alternative 1 and Alternative 2 shows that allowing residential development to utilize existing public parking both enables more development, and allows the open space to be consolidated into a usable park or plaza, rather than serving simply as a buffer strip. These differences are illustrated in **Figure 9** on the following page.

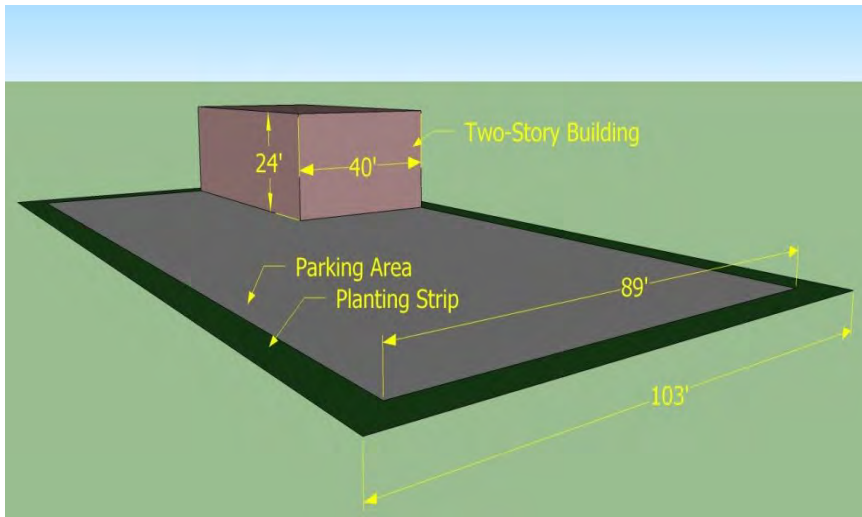
In addition, allowing denser development in Downtown Marlborough will improve the local tax base. In areas with limited acreage for development, such as Downtown Marlborough, requiring large amounts of on-site parking, large setbacks, and low building heights drastically limits the amount of development that is possible, and the amount of tax revenue that could be realized by the City.

The clear consensus from the community at both the April 3 and April 17 meetings was a desire to preserve Marlborough’s historic structures, such as those in the photograph below, and for new development to have similar design elements. This type of development is impossible under the current zoning, but would be possible under the recommended zoning.

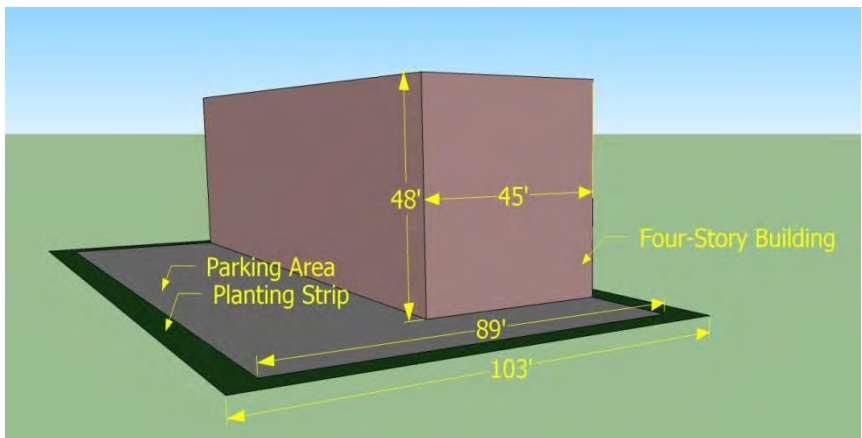


Figure 9 – Development Yield Comparison

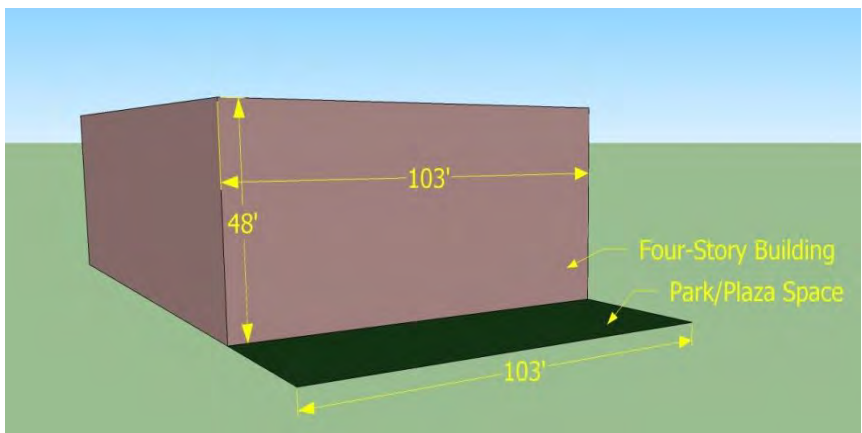
Existing Zoning:



Alternative 1:



Alternative 2 (Recommended Alternative):





## Summary and Recommendations

This report is intended to serve as a baseline of parking data for the City to use to as it moves forward with development in Downtown Marlborough. The area has the potential to change significantly due to the proposed zoning changes and parking may be needed for new uses in the future. However, at this time it does not seem appropriate to construct new parking in the study area.

The results of this parking study show that there is adequate on-street parking in Downtown Marlborough. During observations, peak occupancy was observed to be 59% at 1pm, resulting in excess capacity even during the peak period.

As peak period occupancy levels are low, the area is able to handle additional demand within the existing parking supply. Within Downtown Marlborough there are a number of vacant business spaces. Even as those vacant spaces fill up over time, there will still be ample on-street parking available for patrons of the new businesses as well as the existing ones.

There is a perceived lack of parking by local business owners, employees, and residents. However, this parking study indicates there are generally adequate numbers of available parking spaces within a 1-2 minute walk of all businesses in the area. Business patrons desire a parking space right outside of the business that they wish to visit, and generally when that is not available, it exacerbates the perceived lack of parking availability. The City should highlight the parking availability in the nearby free garages, and although parking may not be available right outside of the desired destination, it may be available on the next block or around the corner.

In summary, MAPC is recommending that the City take a number of steps to improve maintenance and management of parking in Downtown Marlborough:

- Improve Signage and Condition of Garages and Parking Lots
- Improve the Condition of certain On-street Parking Locations
- Increase the cost of parking tickets
- Establish a permit system for overnight residential parking in city-owned garages and lots, with an annual fee for each residential permit
- Establish a dedicated account or revolving fund to receive all parking-related revenue. Earmark funds in the account to maintain and operate parking, and make other improvements that will decrease demand for parking.
- Follow up with a more in-depth Parking Study when parking occupancies increase and/or new development has occurred in the Downtown

The parking recommendations in this study are generally all low-cost, and could be implemented in the near term. These small changes to existing parking policies, as well as some improvements, will help foster economic growth and encourage new development. These changes will also help the existing businesses in Downtown Marlborough and the residents, employees and patrons who frequent this area.

In addition to the recommendations above to make more efficient use of Marlborough's existing parking, we recommend that off-street parking requirements for new development in Downtown Marlborough be reduced and made more flexible. MAPC's recommendations for new parking requirements are as follows in **Table 7**.

Table 7. Recommended Parking Requirements for Downtown Marlborough Zoning District

Use	Proposed Minimum	Proposed Maximum	Additional Stipulations
Residential	1 per unit	N/A	Spaces in City-owned garages and lots within 1000 feet of the development can be counted to fulfill the required spaces \$10,000 fee-in-lieu for each publicly owned space counted toward minimum Requirement may be reduced by 10% if on-site car-sharing, such as Zipcar, is provided
Retail	N/A	3 per 1,000ft <sup>2</sup>	N/A
Office	N/A	3 per 1,000ft <sup>2</sup>	N/A
Restaurant	N/A	3 per 1,000ft <sup>2</sup>	N/A
Other Commercial	N/A	3 per 1,000ft <sup>2</sup>	N/A
Public Assembly	Occupancy up to 250: N/A Occupancy over 250: no parking required for first 250 occupants; thereafter, 1 space per 6 legal occupants	1 per 4 legal occupants	For legal occupancy up to 250, no parking required. Can be reduced by Special Permit if developer demonstrates capacity in existing public parking at times of peak demand.
Hotel	0.75 per room	1 per room	For 30 total rooms or less, spaces in City-owned lots and garages within 1000 feet of the development can be counted to fulfill requirement with \$10,000 per space fee-in-lieu

Taken together, the recommendations to improve Marlborough’s existing parking, and to reduce zoning requirements for new parking, will enable the city to attract new investment while preserving the dense, walkable character that makes Downtown Marlborough unique.

## Resources

There are several resources that could be used to put the recommendations into action. Local resources, both in terms of funding and staff time, will push the recommendations forward, but additional outside resources will likely be necessary for completing improvements. A listing of potential outside resources, which include planning toolkits and funding, is detailed below:

Sustainable Transportation: Parking Toolkit – This toolkit is designed to help local officials, developers, citizen board members, and advocates understand the sources of parking issues in their communities and identify potential solutions. The strategies outlined in the toolkit address a variety of situations and concerns in ways that save money, protect the environment, support local businesses, and encourage alternatives to driving. <http://www.mapc.org/resources/parking-toolkit>

SWAP Parking Bylaw – The SWAP Parking Bylaw Project develops a series of recommended regulations that can be adapted by individual communities to update existing parking requirements. The draft language can be modified by the Town Planner and Planning Board to suit a specific community, and presented to Town Meeting for incorporation into town zoning bylaws. The goal is to provide communities with information and tools to make informed decisions about parking so that the demand and supply are balanced and appropriate. <http://www.mapc.org/resources/swap-parking>

Mixed Use Zoning Toolkit – Mixed Use Zoning: A Planners Guide presents the fundamentals you need to plan a mixed use bylaw. A version of the guide for citizens is also available for download. This guide is based primarily on the experiences of five suburban communities that have prepared bylaws with assistance from the Metropolitan Area Planning Council (MAPC), supported by grants from the state's Priority Development Fund. <http://www.mapc.org/resources/mixed-use-zoning-toolkit>

Pedestrian Transportation Plan – This toolkit identifies actions local governments, advocacy organizations, the private sector, and individuals should take to encourage walking. The plan recommends policies and practices that will facilitate walking as a convenient, safe, and practical form of transportation. <http://www.mapc.org/resources/ped-plan>

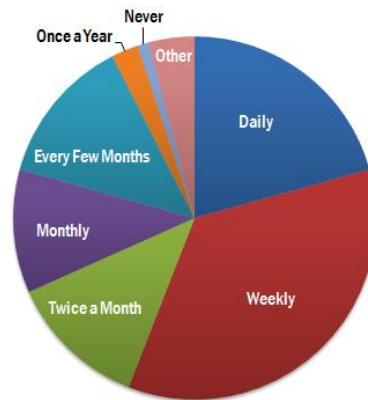
Downtown Revitalization – DHCD's Massachusetts Downtown Initiative (MDI) offers a range of services and assistance to communities seeking help on how to revitalize their downtowns. The primary mission of the MDI is to make downtown revitalization an integral part of community development in cities and towns across the Commonwealth. <http://www.mass.gov/hed/community/funding/massachusetts-downtown-initiative-mdi.html>

## Appendix A: Survey Results Related to Parking Issues

The Marlborough Economic Development Corporation released a survey to local residents and business owners asking a variety of questions about Downtown Marlborough. Some of the questions referenced parking issues. Survey results (as of March 31, 2014) follow for parking related questions:

How often do you visit Downtown Marlborough?

Daily	21%
Weekly	35%
Twice a month	12%
Monthly	11%
Every Few Months	13%
Once a Year	3%
Never	1%
Other	4%



What would encourage you to visit Downtown Marlborough more often? (open ended)

- Restaurants, bars, and night life with easy parking
- Availability of parking on Main Street
- Parking (cars stay on street in front of businesses all day long without being ticketed even though there is a two hr. max)
- Better parking (\*numerous references)
- More parking (\*numerous references)
- Lighting could be better from garage and off-street parking to Main St.

Do you think there is enough parking in Downtown Marlborough?

Yes	70%
No	30%

Open-ended answers:

Currently there is but it needs to be future proofed in the event that more people will attend Main Street

Barely enough parking for today's usage, will need more if area is developed to increase residents and visitors. If visitation increases, more parking will be needed.

The two garages, street parking, and office street parking seem to be enough for what is there now, would need to be expanded if more shops or services were added that people would use

Plenty of on street parking and the parking garage

I have never had trouble parking

There's plenty of parking but sometimes it's a long walk to where you want to go.

There's too much parking not enough cars

There's a huge amount of parking behind Main St and on it. Marlborough is VERY walkable, which is part of what keeps me here. Please please don't ruin Main Street by adding more

parking or more car traffic on it. Keep the cars on Granger and funnel them into the giant parking garage back there.

The parking is more than ample, perhaps people just need to be educated about the free parking available.

Better signage to direct people to the Parking Lots is needed.

I know there is a lot of parking in between Main and Granger. I bet most people don't know this if they do not go downtown often. We need to try to create a nice place to get people from Marlborough, Northborough, Hudson and Sudbury to come to center.

Parking limits need to be enforced

There is a problem with all-day employees and residents parking in prime municipal spaces.

Covered parking is prime prior to a snow event for overnight/multi-day resident parkers. Consider working with residents to allow for overnight parking in winter months with regulations - Ex. opposite side street parking shifts, snow emergency exceptions, designated permit parking in municipal lots

Moody Street in Waltham is a good example of how lack of parking doesn't solely keep people away

Downtown Wellesley is busy all of the time and does not have a lot of street parking.

We have more parking than Hudson, but no reason to visit.

Residents on the east end of Main St. have inadequate parking in rental properties, Cotting Ave. & Ames Pl. particularly.

Main St is constricted but there is usually space in the garages.

I can usually find a spot, but I hate parallel parking.

Not enough currently and not easily accessible Main Street parking for the disable/handicapped, seniors

With the current activity I have been able to find parking in one of the garages.

There needs to be a bigger parking garage

I hate walking at night through the parking structures I don't feel safe.

The garage ensures there is always enough parking.

I think there's a garage but it's hard to find/not enough signage.

Free parking garages are great

There seems to be sufficient parking, but it's not the most convenient to walk from the Parking garages to Main Street.

I know there is a garage but it is not convenient for someone who has limited mobility and wishes to shop on Main Street.

There is a parking garage on one of the side streets? Is that for the public?

The garages are creepy. Don't like to park there.

Parking garage is scary

I use the lot next across from Vin Bin. The garage is creepy and dark.

Just need to improve the parking garages: lighting, cleanliness, signage

Parking garages are only used by area workers.

Daytime yes, but if I'm by myself at night I don't want to park in the garage

Plenty of garage parking but that's a huge pain with kids.

When there is a storm coming there is never any parking in the garage. I have seen cars parked in the garage for days on the bottom.

Need another parking garage, one that fits pickup trucks.

There is parking but people want to be able to park in front of business & won't walk from garages

Is it usable in the garages? Not really! Cars scrape the bottom when they go in near the Masons. The garages are poorly maintained.

The parking is all in the back and no one wants to lug things back there.

Too little parking in the Post Office area, & getting to the garage from Florence St is a real pain.

# Appendix B: Parking Presentation



# Downtown Marlborough Parking Analysis

April 17, 2014



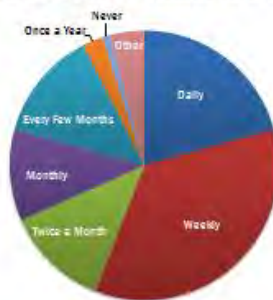
## Survey Data: Parking Comments

## Survey Results

**Only 56% of people visiting Marlborough arrive on a daily/weekly basis**

Emphasizes the need for well signed parking and easy to understand regulations

How often do you visit Downtown Marlborough?



## Survey Results

What would encourage you to visit Downtown Marlborough more often?

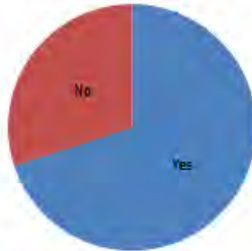
- "Better parking" / "More parking" \*Multiple references
- "Availability of parking on Main Street. Parking should be regulated by meter so as to ensure availability of space"
- "Parking is still a pain. I would like to see angled parking on Main St. Instead of parallel. Lighting could be better from off-Main Street parking to Main Street"
- "Less BS like cops/tickets/parking access"
- "Parking and traffic can be a problem"
- "Night life with easy parking"
- "Cars stay on street in front of businesses all day long without being ticketed even though there is a two hour max"



## Survey Results

70% of people surveyed feel there is enough parking available

Do you think there is enough parking in Downtown Marlborough?



## Survey Results

Do you think there is enough parking Downtown?

- "...if there is expansion, parking is an issue..."
- "...the mix of on-street, small lots, and parking garages provides enough parking except in instances when a large event is taking place..."
- "...if downtown turns into a real draw, make sure that parking doesn't become a problem then..."
- "...plenty of parking but sometimes it's a long walk to where you want to go..."
- "...parking limits need to be enforced..."
- "...don't ruin Main Street by adding more parking or more car traffic on it..."



## Survey Results

Do you think there is enough parking Downtown?

- "...needs to be a bigger parking garage..."
- "...hate walking at night through the parking structures I don't feel safe..."
- "...garages are creepy. Don't like to park there..."
- "...garage is hard to find/ not enough signage..."
- "There is a parking garage on one of the side streets? Is that for the public?"
- "When there is a storm coming there is never any parking in the garage. I have seen cars parked in the garage for days on the bottom"
- "...people want to be able to park in front of businesses and won't walk from the garages..."
- "Main Street is constricted but there is usually space in the garages"



Study Area

### Study Area & Walking Distances



### Parking Capacity

### On-Street Parking



### All Parking





## Parking Capacity in the Region

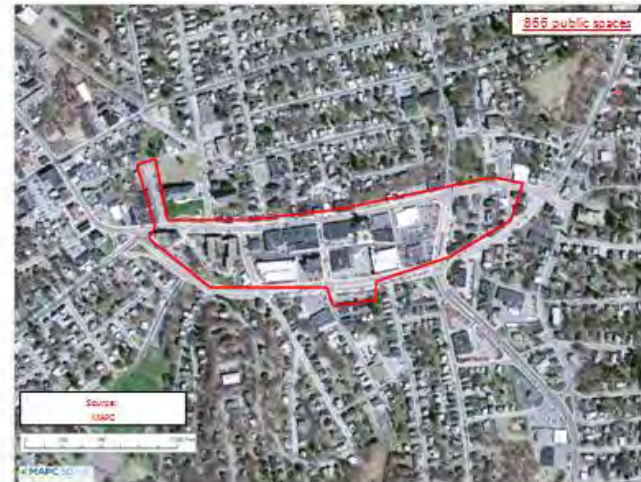
### Hudson



### Natick



### Marlborough



## Area Comparison



## Data Collection

## Data Collection

- Tuesday November 19, 2013
- Number of parked vehicles documented at 9am, 11am, 1pm
  - Capacity vs. Occupancy analysis
  - No analysis of duration/turnover
  - No Saturday analysis



## Peak Time Analysis & Trends

## Occupancy

Parking	# Spaces	9:00 am	11:00 am	1:00 pm
Garage	383	49%	56%	50%
Off-Street Lot	279	43%	57%	66%
On-Street	222	59%	63%	67%
<b>Total</b>	<b>884</b>	<b>50%</b>	<b>58%</b>	<b>59%</b>

Source: MAPC  
Data Collected: Tuesday, November 19, 2014

## Capacity vs. Occupancy



## Parking Management Recommendations

## Recommendations

- Overall parking is available! (Even with additional development)
- Work on parking management with directional signage and **maintenance** ("Better Parking")

### Maintenance:

- Add lighting in Newton St garage – feels unsafe currently dark, low ceilings, heavy maintenance equipment, birds
- Stripe parking lot on Prospect Street – and add signage
- Stripe post office lot
- Improve senior housing lot

## Recommendations

### Signage:

- Need signage to garages – identify as free and open to public!
- Improved signage for all municipal lots - create a Marlborough specific sign or use standard "P"
  - Bolton Street lots
  - Granger lot across from post office
  - Prospect lot
- Improve signage/pavement marking for all non 2-hour spaces (30 min, etc)



## Recommendations

### Other:

- Increase parking tickets (currently \$10)
- Do not build more parking at this time
- Conduct full weekday and Saturday parking analysis to identify
  - turnover and peaks
  - potential lack of parking on Saturday when future retail, residential, office, etc. would all be used
  - need for additional enforcement
  - need for employee parking
  - evening uses



## Parking Zoning Comparisons



### Marlborough's parking requirements are among the highest in the area

Residential	
Hopkinton	1 per unit
Natick	
<b>Marlborough</b>	<b>2 per unit</b>
Hudson	2.5 per unit
Southborough	2-3 per unit

Restaurant	
Hudson	2 per 1000 sq ft
Hopkinton	1 for every 3 seats
<b>Marlborough</b>	<b>1 for every 3 seats, plus 1 for every 3 employees</b>

Retail	
Hudson	2 per 1000 sq ft
Hopkinton	4 per 1000 sq ft
Natick	
Southborough	6.6 per 1000 sq ft
<b>Marlborough</b>	<b>10 per 1000 sq ft</b>

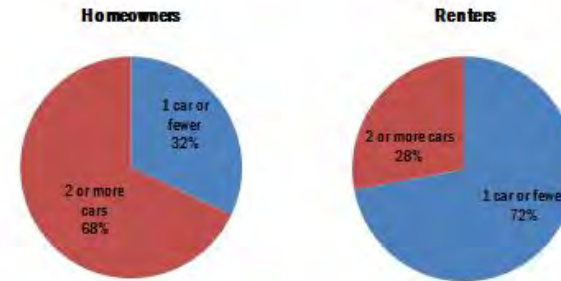
Office	
Hudson	2 per 1000 sq ft
Hopkinton	3 per 1000 sq ft
Natick	
Southborough	3.5 per 1000 sq ft
<b>Marlborough</b>	<b>4 per 1000 sq ft</b>

## Yet Marlborough's vehicle ownership rate is the second LOWEST in the area

Current Vehicle Ownership per Household	
Framingham	1.19
<b>Marlborough</b>	<b>1.30</b>
Natick	1.37
Hudson	1.45
Ashland	1.47
Hopkinton	1.71
Southborough	1.72
Other comparisons outside Metrowest:	
Cambridge	0.85
Somerville	1.00
Northampton	1.37
Newburyport	1.56

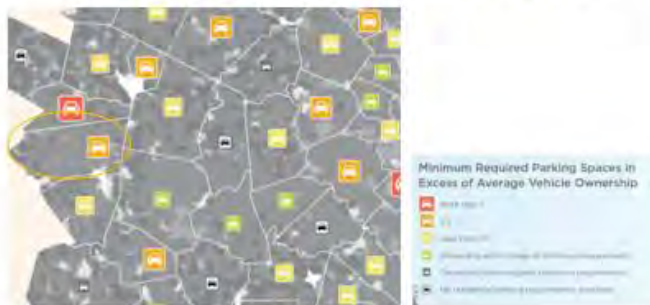
Data Source: Registry of Motor Vehicles, comprehensive data on all vehicles registered in Massachusetts

## Marlborough's vehicle ownership rate is especially low for renters



Data Source: US Census

## Marlborough's residential parking requirements are higher than the vehicle ownership rate



Residential parking requirement = 2 spaces per unit  
 Vehicle ownership rate = 1.3 cars per household



## Proposed Parking Zoning Recommendations



## Residential Parking Recommendations

- Reduce residential requirement to 1 space per unit
- Require no on-site parking, instead encourage off-site parking for residential units downtown
- Require that developers demonstrate availability of off-site parking nearby
- Create permit system for residents to park overnight in City garages or lots
- Small fee for annual permit, use funds to maintain garages

## Comparison: Natick

- Residential parking requirements reduced in the downtown
- Developer pays fee proportional to number of spaces reduced, which goes into a parking construction and maintenance fund
- Off-site parking is allowed via special permit
- Off-site parking must be within 300 feet
- “proper provision [must be] made to ensure pedestrian and traffic safety”



## Commercial Parking Recommendations

- Eliminate minimum parking requirements for new commercial development
- But how can this work?
  - There is currently significant unused parking supply
  - Shared parking is much more efficient
  - Shared parking encourages “park once and walk”
  - Many of the desired uses have a different peak time from the existing uses
- But won't it fill up eventually?
  - If Downtown Marlborough sees more development and more demand for parking, especially on-street spaces, pricing should be used to balance supply and demand

## Commercial Parking Recommendations

- What would the City sacrifice for more surface parking?
  - Most parcels are built out, very little space for new surface lots
  - Many historic buildings in the downtown with little or no on-site parking
    - in order to accommodate on-site parking requirements, buildings would have to be torn down to make room for parking
  - Downtown is very walkable today. Adding more site-specific parking lots would degrade the walking environment and add more curb cuts that can be a hazard for pedestrians
- Better to have constrained parking or higher prices, than to have a downtown no one wants to visit because it's pockmarked by parking lots

## Long-term Recommendations

- When there is significant new commercial development and current supply is overutilized, price will help manage supply and demand
  - When demand for free parking eventually exceeds supply, do another parking study to design effective pricing and management system
  - Set a goal for parking occupancy, then designate a staff person or department in the City to manage it
  - Price should only be high enough to ensure one or two empty spaces
    - Most popular areas will have highest prices
    - Other areas might remain free or very inexpensive
    - Pricing in garages should always be lower than on street

## Long-term Recommendations

- What about if new residential development eventually exceeds the number of available garage spaces?
  - Increase price of resident garage permits to manage supply and demand
  - Create a resident permit parking system to manage on-street resident parking
  - Economics may support residential developers building on-site structured parking



Illustration of  
Current and  
Alternative Zoning

## Visions for Downtown Most Desired Uses from 4/3/14 Forum

- |                               |  |
|-------------------------------|--|
| • Arts and Theater space - 36 | • Local food Market - 26   |
| • Café seating outside - 35   | • Book store - 20  |
| • Brew Pub - 32               | • Coffee house - 19  |
| • Movie House - 30            | • Seasonal Farmer's Market - 19  |
| • Music Venue - 28            | • Bakery - 17  |
| • Nightlife - 28              | • Ice cream house - 16   |
| • Bus + Train connection - 28 | • Satellite campus - College of Art/ Berklee School of Art/ Regular College - 16 |
| • Condos + walkability - 26   |  |

## Development Limitations caused by Existing Zoning Ordinance

- **Parking requirements are very high**
  - 2 spaces /unit for residential
  - 10 spaces/ 1000 for retail
  - 1 space/2 legal occupants for Places of Assembly
  - 1 space/3 seat plus 1 space/3 employees for restaurants
- **Height is limited to 52 feet**
- **Front Setback is 50'** (unless development is infill between two existing buildings)
- **Mixed use is not expressly allowed**
- **Multi-family is by Special Permit**

## Estimating Development Yield from local regulations

- **Floor Area Ratio (FAR) = amount of Floor Space that can be built on a parcel of land;**
  - for example, .25 FAR means that 10,000 total square feet of floor space can be built on a 40,000 square foot parcel.
- **The Effective FAR is a combination of factors:**
  - FAR limit by ordinance
  - height limits
  - percent lot coverage
  - percent open space
  - parking ratios
  - planting buffers

## Estimating Development Yield: Existing Zoning

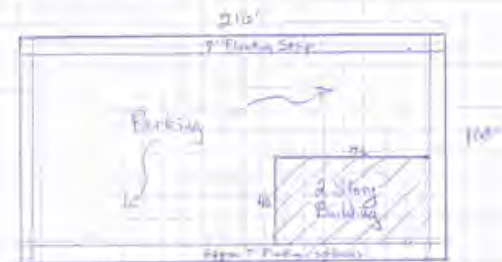
### Assumptions:

- **2 story total height, with one story of office over 1 story of retail**
- **80% lot coverage for structure and parking**
- **20% minimum open space coverage**
- **On-site parking requirements**
  - 4 spaces/1000 square feet – offices
  - 7 spaces/1000 square feet – retail (assuming 70/30 split for public vs. storage)
- **Planting strip approximately 7' wide around parking area/parcel**

Yields Effective FAR of .28

## Visualizing Development Yield – Existing Zoning

- FAR of .28 yields, on a .5-acre site, yields a 6,098 sq. ft. 2-story building
- Footprint (retail first floor) is 3,049 sq. ft.
- Required parking is 33 spaces at 13,860 sq. ft.
- Open space is 22% of the lot at approx 4,870 sq. ft.



## Estimating Development Yield: Alternative Zoning 1

### Assumptions:

- 4 story total height, with three stories of residential over 1 story of retail/ restaurant
- 80% lot coverage for structure and parking
- 20% minimum open space coverage
- On-site parking requirement
  - Zero parking required for commercial space
  - 1 space per unit for residential
- Each residential unit averages 1,000 gross square feet in the mixed use structure (1 - 2 bedroom)
- Planting strip approximately 7' wide around parking area/parcel

Yields Effective FAR of 1.41

## Visualizing Development Yield - Alternative Zoning 1

- FAR of 1.41 yields, on a .5-acre site, yields a 30,709 sq. ft. 4-story building
- Footprint (retail/ restaurant first floor) is 7,677 sq. ft.
- Required parking is 23 spaces at 9,660 sq. ft.
- Open space is 20% of the lot at approx 4,443 sq. ft.



## Estimating Development Yield: Alternative Zoning 2

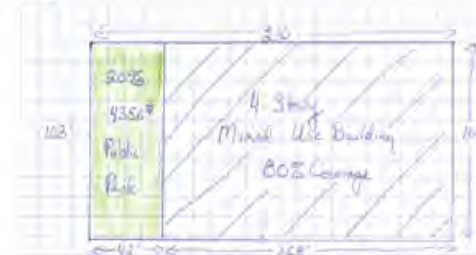
### Assumptions:

- 4 story total height, with three stories of residential over 1 story of retail/ restaurant
- 80% lot coverage for structure (assumes no surface parking on site)
- 20% minimum open space coverage - Since there is no parking there is not a need for the 7' planting strip around the edge of the parking
- On-site parking requirements - none - require that the developer meet residential parking requirements either on-site or negotiate off-site
- Each residential unit averages 1,000 gross square feet in the mixed use structure (1 - 2 bedroom)

Yields Effective FAR of 3.2

## Visualizing Development Yield - Alternative Zoning 2 with Parking Off-site

- FAR of 3.2 yields, on a .5-acre site, yields a 69,696 sq. ft. 4-story building
- Footprint (retail/restaurant first floor) is 17,424 sq. ft.
- Required area for on-site parking is 0 sq. ft. - This site visualization illustrates all parking is either off-site (in garages or lots) or under structure.
- Open space is 20% of the lot at approx 4,356 sq. ft. Because there is no planting strip around the parking this can now become a meaningful area of open space, in either public or private use.



# Appendix C: Detailed Development Yield Calculation

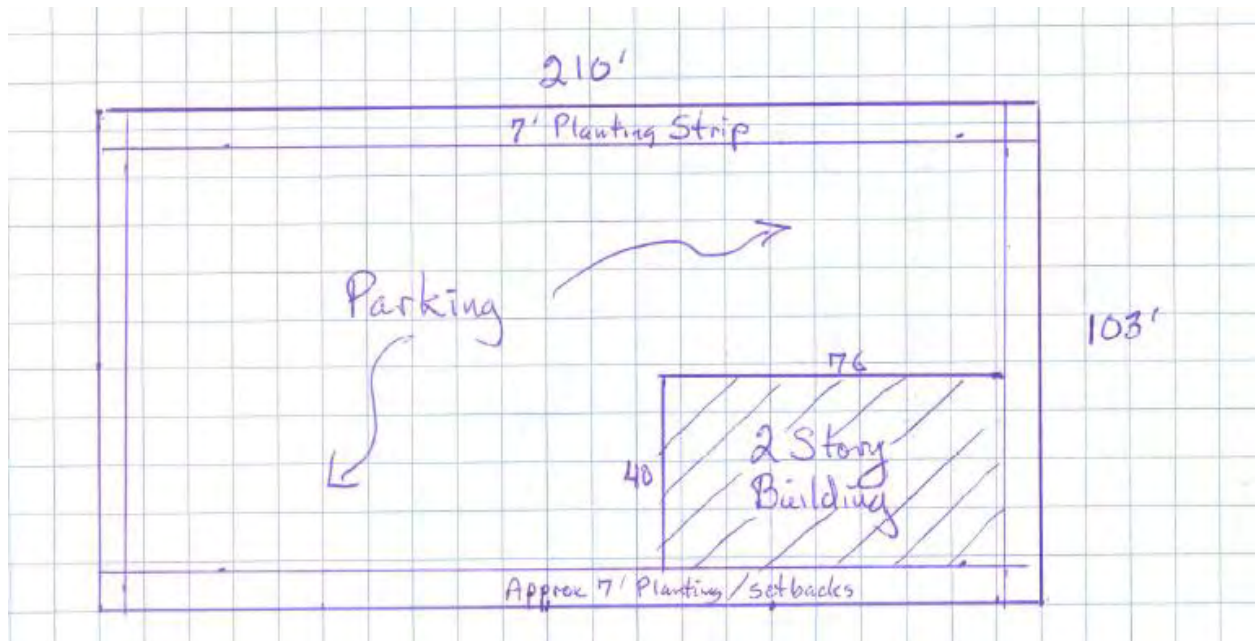
Marlborough's existing zoning places strict constraints on development, including the following:

- 2 parking spaces /unit for residential
- 10 parking spaces/1000 square feet for retail
- 1 parking space/2 legal occupants for Places of Assembly
- 1 parking space/3 seat plus 1 space/3 employees for restaurants
- Building height is limited to 52 feet
- Front Setback is 50' (unless development is infill between two existing buildings)
- Mixed use is not expressly allowed
- Multi-family is by special permit

Based upon the existing regulations, the Floor Area Ratio (FAR) calculated for the downtown district is 0.28. The FAR is the ratio of potential built space allowable under regulations in relation to a specific size of parcel, expressed as a ratio. This results in the following potential development:

- FAR of .28 yields, on a .5-acre site, a 6,098 sq. ft. 2-story building
- Footprint (retail first floor) is 3,049 sq. ft.
- Required parking is 33 spaces totaling 13,860 sq. ft. of lot area
- Open space is 22% of the lot at approximately 4,870 sq. ft.

One potential layout of the development on a parcel would be as shown in the following sketch, which illustrates that the majority of the site is occupied by surface parking and only a relatively small structure can be built:



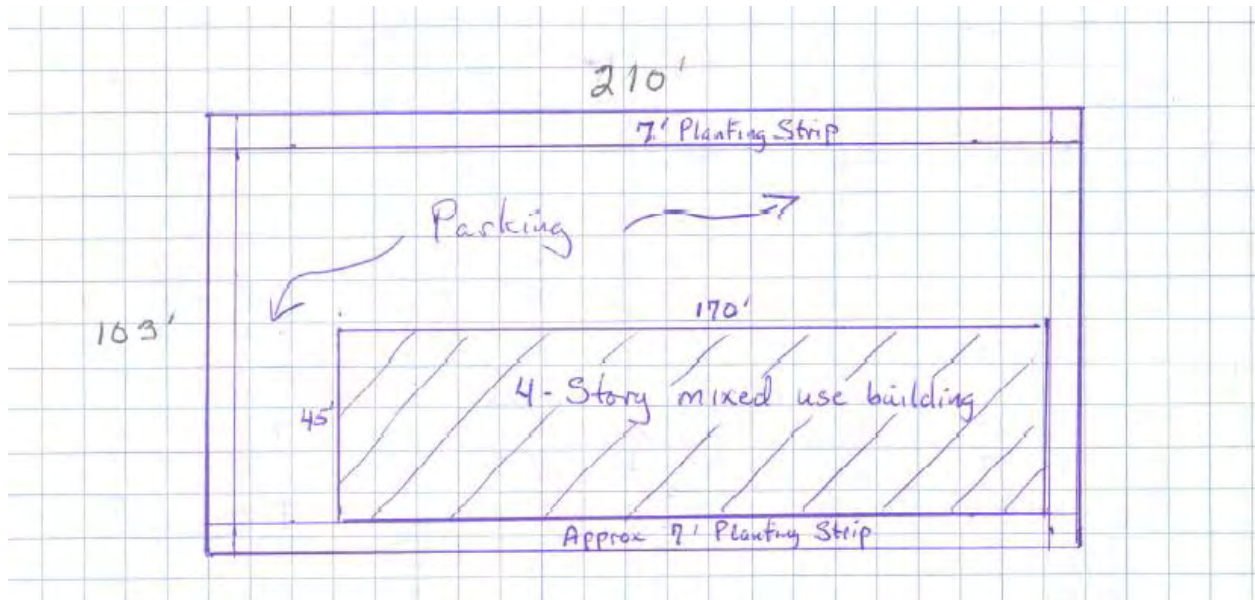
An alternative scenario that keeps much of the same regulations, but which allows for mixed use and which significantly reduces the parking requirements (by assuming that the parking for commercial uses would be on-street or in the existing garages), includes the following assumptions:

- 4 story total height, with three stories of residential over 1 story of retail/restaurant
- 80% lot coverage for structure and parking
- 20% minimum open space coverage
- On-site parking requirement
- Zero parking required for commercial space
- 1 space per unit for residential
- Each residential unit averages 1,000 gross square feet in the mixed use structure (1 – 2 bedroom)
- Planting strip approximately 7' wide around parking area/parcel

The above alternative set of regulations yields an Effective Floor Area Ratio of 1.41. The details related to this development are as follows:

- FAR of 1.41 yields, on a .5-acre site, yields a 30,709 sq. ft. 4-story building
- Footprint (retail/restaurant first floor) is 7,677 sq. ft.
- Required parking is 23 spaces at 9,660 sq. ft.
- Open space is 20% of the lot at approx 4,443 sq. ft.

This scenario results in significantly more potential future development. The following sketch illustrates one possible way that this alternative development could be laid out on a 0.5-acre site:



The final scenario was proposed in order to explore the regulations that might be put in place to achieve development more similar to the types of higher density developments that participants at the public forum indicated that they desired in the downtown. It also reflects the potential for use of existing garage and surface lot parking spaces for use by the developments, perhaps in conjunction with a parking pass system for residential units.

The assumptions for this scenario included:

- 4 story total height, with three stories of residential over 1 story of retail/restaurant
- 80% lot coverage for structure (assumes no surface parking on site)
- 20% minimum open space coverage – Since there is no parking there is not a need for the 7' planting strip around the edge of the parking
- On-site parking requirements – none. Instead, require that the developer meet residential parking requirements either on-site or negotiate off-site
- Each residential unit averages 1,000 gross square feet in the mixed use structure (1 – 2 bedroom)

This scenario yields a Floor Area ratio of 3.2, with the following details:

- FAR of 3.2 yields, on a .5-acre site, yields a 69,696 sq. ft. 4-story building
- Footprint (retail/restaurant first floor) is 17,424 sq. ft.
- Required area for on-site parking is 0 sq. ft. - This site visualization illustrates all parking is either off-site in garages or lots. Note that this same sketch would apply if some on-site parking were built underneath the structure.
- Open space is 20% of the lot at approximately 4,356 sq. ft.. Because there is no planting strip around the parking this can now become a meaningful area of open space, in either public or private use.

One possible layout of this development on the hypothetical site is as follows:

