

TOWN CENTER STREETScape AND PUBLIC SPACE IMPROVEMENT STRATEGY

REPORT

Prepared for the Town of Westminster
Submitted by:
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October 20, 2014



Massachusetts Downtown Initiative

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SUMMARY

PROJECT OVERVIEW

The Town of Westminster is engaged in the beginning stages of a streetscape improvement program for Main Street, with a particular emphasis on the segments that pass through the town center. This corridor serves as an important civic and economic resource and serves a mixture of residential and commercial uses within the community.

As part of its comprehensive planning process, that Town is focusing on this area to create both a vision and process that will address a number of fundamental issues. These include circulation and safety problems. As a companion goal, Town will benefit from significantly improving the appearance of the area so that it better contributes to business success and real estate values.

The current streetscape conditions include overly wide streets that have been designed with an emphasis on vehicular circulation and accommodating through traffic. The access to and from properties into parking lots and connecting drives are not well designed, leading to potential safety issues and interruptions in the pedestrian environment. Better access management can be accomplished, responding to these issues. There is a lack of a consistent pedestrian sidewalk or pathway network, and no provisions for bicyclists. The landscape and streetscape design is inconsistent, and would benefit from the types of plantings, lighting and amenities that can distinguish a town center.

The Town has initiated the improvement process with several steps to explore design concepts drawn from emerging practices for “complete streets” that better serve the Town’s need. This approach balances vehicle, pedestrian and bicycle modes with the need to address parking supply and demand, aesthetics and environmental sustainability. Preceding this study, the Town hosted a public workshop and participated in studies provided by faculty and students of the University of Massachusetts (Amherst) to consider citizen’s ideas and illustrate several design concepts. The workshop results and the contributions from the University program are reflected in the findings and observations in this report.

This study was conducted with the services of The Cecil Group through a grant from the Massachusetts Downtown Initiative, a program initiated by the Department of Housing and Community Development. The Cecil Group is a planning and design firm that is engaged in town center enhancements throughout New England, with expertise in streetscape, landscape architecture, zoning and design of both public and private improvements.

PROCESS

This document outlines The Cecil Group's existing analysis, recommendations, alternatives and implementation strategies to assist the Town of Westminster in advancing the complete streets strategies and techniques to Main Street.

Existing Condition Evaluation

This task was accomplished in two steps: through a community meeting and design charrette facilitated by the bachelor of Landscape Architecture students at University of Massachusetts Amherst and The Cecil Group's existing conditions analysis. The key topic areas that guided the discussion were:

- Lack of sidewalk connectivity
- Zoning and design guideline issues to facilitate future and successful development
- Minimal existing streetscape and landscape enhancements
- Deficient of alternative transportation facilities
- Overall emphasis on vehicular movement
- Expansive vehicular facilities

Streetscape Recommendations

The recommendations within the report include:

- Streetscape/Landscape: The addition of appropriate shade and ornamental tree and shrub species will insert vibrancy and interest into the landscape. A consistent program of streetscape amenities will foster for streetscape activity and provide a distinct character to the corridor.
- Traffic Calming: This treatment will be limited to curb extensions to define parking
- Bicycling Infrastructure: An east/west connection along Main Street and a potential multi-purpose path is critical to capture the maximum amount of the cycling community.
- Gateway Intersection Traffic Calming: Underutilized spaces in the anchoring intersections can benefit by reallocating these areas for public space expansion, landscape enhancements or accessibility improvements to create a pedestrian friendly environment.
- Crosswalk Enhancements and Relocation: A more walkable and complete streetscape can be produced by implementing a consistent program of paving materials, shifting crosswalk locations, and decreasing crosswalk distances.
- Strategic Curb Cut Removal: The strategic reduction of business curb cuts can create a safer and continuous sidewalk experience and fix fragmented on-street parking options without obstructing current private vehicular circulation.

- Increased Walkability: A continuous pedestrian network is vital to the success of a downtown business district.

Implementation

Organization and a cohesive strategy for implementation are imperative for a successful streetscape program. This study suggests a variety of action items to be addressed by the Town and potential funding resources that can be used to finance the initiative, which include:

Action Items

- Secure funding to advance specific engineering and design studies which would facilitate the support for funding and grant requests
- Secure construction funding to implement enhancements
- Promote beneficial development patterns in concert with street and public and private parking improvements
- Analyze zoning and development issues within the corridor and through effective design guidelines implement streetscape principles provided in the study.

Potential Funding Resources

- MassWorks infrastructure improvement grant
- Massachusetts Chapter 90 street and roadway funding
- Community Preservation Act (CPA)
- Mass In Motion
- District Increment Financing (DIF)
- Community Development Block Grant Program (CDBG)
- Safe, Accountable, Flexible, Efficient Transportation Equity Act: a Legacy for Users (SAFETEA-LU)
- Transportation Improvement Program (TIP)

EXISTING CONDITIONS EVALUATION

The Main Street district is the central corridor in Westminster connecting Gardner, Route 2, and Leominster. Acting as the downtown business district in Westminster, it is home to a variety of businesses, residences and civic institutions. However, the Main Street potential is being restricted by the existing streetscape and its character as a vehicular-oriented district. The negative qualities that can be modified through improved design to modify expansive roadways and poorly organized access to lots and side streets. The review of existing conditions noted excessive areas devoted to parking that could be more efficiently designed and landscaped, a lack of pedestrian connections between destinations, and an inconsistent streetscape design character.

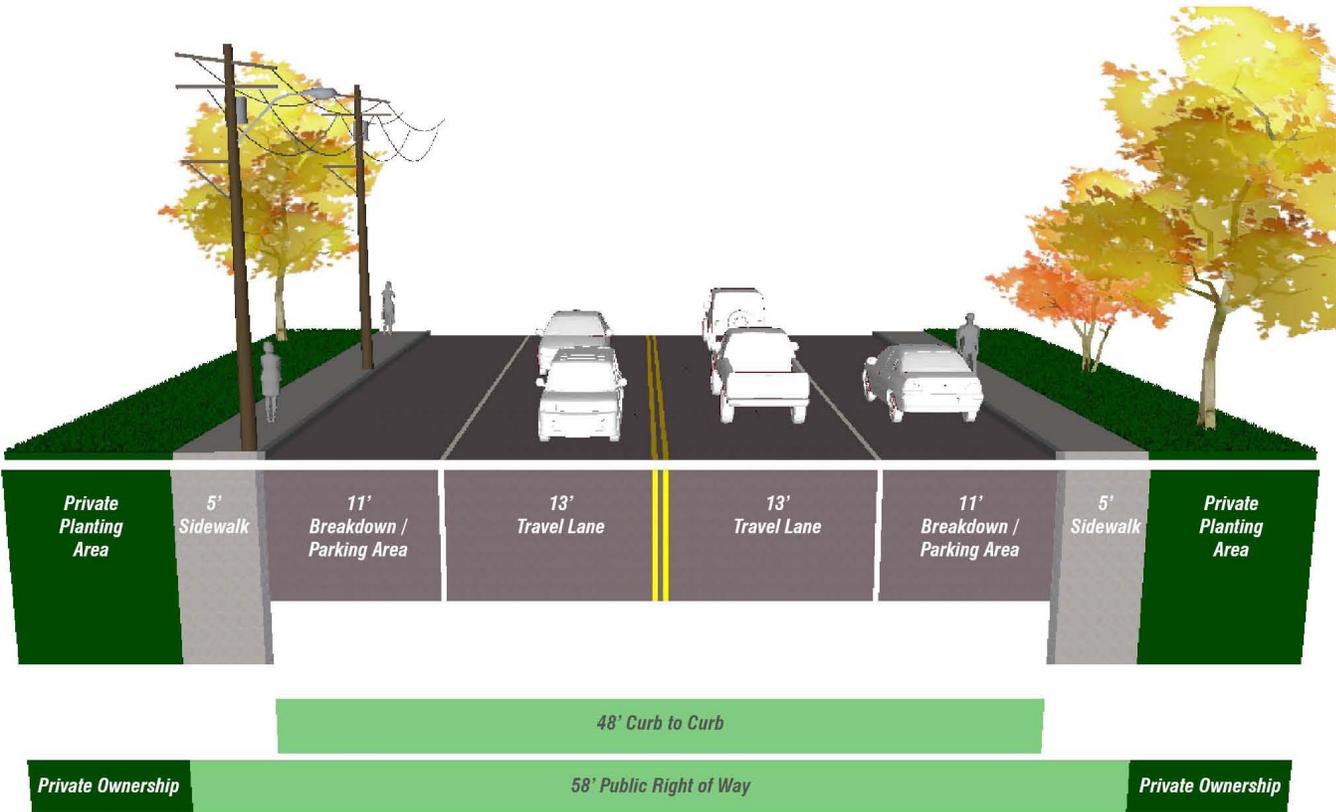


Figure 1 - Main Street existing conditions



Figure 2 - Unregulated access



Figure 3 - Excessive entry widths



Figure 4 - Direct parking access



Figure 5 - External parking circulation



Figure 6 - Fluctuating parking area widths

ROADWAY

Current conditions, seen in figure 1, allow 13-foot travel lanes, 11-foot flexible breakdown and parking areas, and MassDOT minimum 5-foot sidewalks. While the existing public right-of-way is generous and measures to approximately 60 feet, the allocated vehicular travel zone is approximately 48 feet. By analyzing the individual parts of the existing roadway, the driver and pedestrian should begin to comprehend that these typical dimensions is characteristic to a highway instead of a downtown.

- 13-foot travel lanes encourage higher speeds because the driver feels more comfortable in their surroundings and consequently are more apt to higher speeds.
- Large breakdown and parking areas only provide a larger vantage point for the driver while placing the pedestrian out of their line of sight. This larger viewing area encourages higher speeds but creates a potentially dangerous situation for the pedestrian.
- The current sidewalk conditions are minimal and do not portray a walkable environment.

ACCESS MANAGEMENT

The term “access management” refers to the physical and operational methods to manage the vehicle movements from a main road into adjacent properties, parking lots and connecting drives. The organization of the access points includes numerous locations where the accommodation of turning vehicles is problematic.

In multiple locations along the corridor, access points typically conflict with neighboring uses. Figure 2 displays how the Vincent’s Plaza section encourages unregulated vehicular movement and circulation. This typical access management problem combined with excessive widths at entry points as shown in figure 3, and effectively prioritizes vehicular circulation over pedestrians and creates an unsafe environment. Several businesses have perpendicular parking configurations with direct access to the street (figure 4). This particular configuration creates an unpredictable and dangerous situation for traveling vehicles and pedestrians on Main Street. Additionally, there are situations which promote the use of the public right-of-way for interior parking lot circulation, as in the example in figure 5. This type of parking lot design requires maneuvering vehicles to cross the sidewalk zones and results in unsafe conditions for pedestrians.

PARKING

In general, on-street parking can be an asset in a town center if it serves a useful function. However, in Westminster's town center, on-street parking is allowed in many locations where there is not likely to be any consistent need for such spaces because of the type of adjacent uses or the proximity of parking lots on private land. Ranging from 7 to 10 feet in width, the parking lanes consume right-of-way that might better be used for landscaping or sidewalks (see figure 6). A planned approach to the provision of on-street parking should distinguish where it is needed and provide signage and markings to designate the spaces and manage their use. Where they are not useful, the streetscape can better be used for landscaping and sidewalks.

CONNECTIVITY

Connections for pedestrians between destinations tend to be tenuous in most locations. Crosswalks are lacking along the corridor; there are only three opportunities for crossing Main Street which are - on average - about 700 feet apart. The three crosswalks are located towards the center of the district, and there are no crosswalks at the gateway locations at either end of the corridor. This inconsistency complicates an overall streetscape approach that should provide pedestrians with multiple attractive routes and convenient access along improved sidewalks. Signage for pedestrians is inadequate and traffic control is informal, such as the use of orange traffic cones as shown in figure 7. This results in an unsafe and undesirable situation for pedestrians. Crosswalks do not connect with sidewalks in all locations as seen in figure 8.

The sidewalk network exhibits a variety of issues with walkability and safety. Among them are an incomplete network, minimum widths, lack of a clear delineation between roadway and sidewalk, and issues with access management. All of these characteristics are exhibited in figure 9. The walking surfaces are not consistent, as indicated by the location of a manhole cover as shown in figure 10.

STREETScape

The current streetscape lacks consistent and high quality landscaping and amenities that could benefit a downtown district. Due to the proportions of the roadway paving, the landscaping is largely composed of plantings and trees on private property. As a result, there is no consistency in the appearance of the area that distinguishes it as the center of Westminster. The prominent overhead utilities have a negative visual impact. They constrain the location and type of trees that can be employed, and interfere with views of the buildings and landscape.



Figure 7 - Arbitrary crosswalk signage and visibility



Figure 8 - Hazardous crosswalk connections



Figure 9 - Existing sidewalk conditions



Figure 10 - Utility and sidewalk conditions



Figure 11 - Existing amenities



Figure 12 - Existing residential mailboxes



Figure 13 - Lighting and above ground utilities

The town center district currently has very limited amenities for pedestrians or that would enhance the visual quality of the area. However, there are several assets that can contribute to a future design approach.

- There are two memorial benches, which honor a local hero, but seem to be placed arbitrarily (see figure 11).
- Mailboxes are seemingly temporary objects placed in the streetscape, as a majority of them concreted into painter's buckets (see figure 12).

The lighting fixtures are of a type commonly associated with arterials and roadways, rather than town center streets (figure 13). The typical lighting fixture is a standard cobrahead highway fixture and because of its height and luminance it is generally placed at long intervals, resulting in lighting patterns that provide bright, large pools of light but that do not enhance or emphasize the pedestrian areas or highlight key crossings or features.

STREETSCAPE RECOMMENDATIONS

The streetscape recommendations of this report investigate opportunities to facilitate a “complete streets” vision for the Main Street town center district. The objective is to facilitate a walkable environment through a combination of safety enhancements, improved pedestrian infrastructure, more efficient vehicular circulation, and enhanced streetscape amenities. As the Town advances through more detailed studies, designs, and funding requests, this study can be referenced for the concepts and strategies that will contribute to a successful streetscape. Appendix B provides a graphic diagram expressing the concepts and recommendations that are described below.

A fundamental consideration in the planning and design of streetscape enhancement is the ownership of the right-of-way. Westminster’s Main Street is owned by the Commonwealth of Massachusetts and is administered by the Massachusetts Department of Transportation (MassDOT). As a result, the state has complete design control over the roadway and other improvements within the right-of-way. The state maintains key routes to ensure that fundamental circulation needs are met. As is the case for many communities, the roadway crosses through the town center, but is not a Town facility.

Over the past few years, the state has become receptive to the idea that roadways do not need to be highways to serve circulation needs. In addition, the state is implementing new standards that recognize the importance of “complete streets” that balance pedestrian, vehicular, and bicycle traffic and seek to create environmentally sustainable places through landscaping or other enhancements. The Town can pursue various design directions through discussions and negotiations with the state, but will need to take into account the standards that the state uses as standards practice.

In some instances, municipalities have accomplished a transfer of the street ownership from the state so that it becomes a local road. Along with this type of transfer, maintenance becomes the responsibility of the municipality. The transferred street must meet agreed-upon standards that ensure that the state’s traffic management goals are met. The Town of Westminster could consider proposing such a solution if it believes that this best achieves its goals.

This report recommends that the Town meet with the appropriate district-level and state-level representatives of MassDOT to discuss various approaches to the design, funding or financing of improvements. The discussions should include the procedural methods associated with a transfer in ownership and the implications relative to costs, resources and the design standards that would be applicable. The Town can then initiate a strategy for advancing design, funding and construction options in a coordinated manner with MassDOT participation.

RIGHT-OF-WAY REALLOCATION

In most locations, the current configuration of the Main Street right-of-way includes paved roadways that appear to be substantially wider than than may be practically needed. This study suggests that improvements could meet current base standards in use by MassDOT in similar circumstances, while resulting in a decrease in paving dedicated for vehicles while increasing the area that serves pedestrians, bicyclists and provides landscaping. This approach would provide 11-foot travel lanes and a five foot shoulder which can be marked and used as standard bicycle lanes but also serve as a safety margin and provide space for maneuvering. Implementing this approach would result in an additional 16 feet of right-of-way that could be flexibly used for plantings, new lighting, sidewalks, on-street parking in appropriate locations, or for amenities. The typical cross sections that were prepared for this study explore the benefits of this conceptual approach.

Streetscape Concepts

As an illustration, the study explore the equal distribution of the available 16 feet of right-of-way to both sides of the street. Shown in figure 14, each side of the street would gain a 5-foot landscape strip that could include

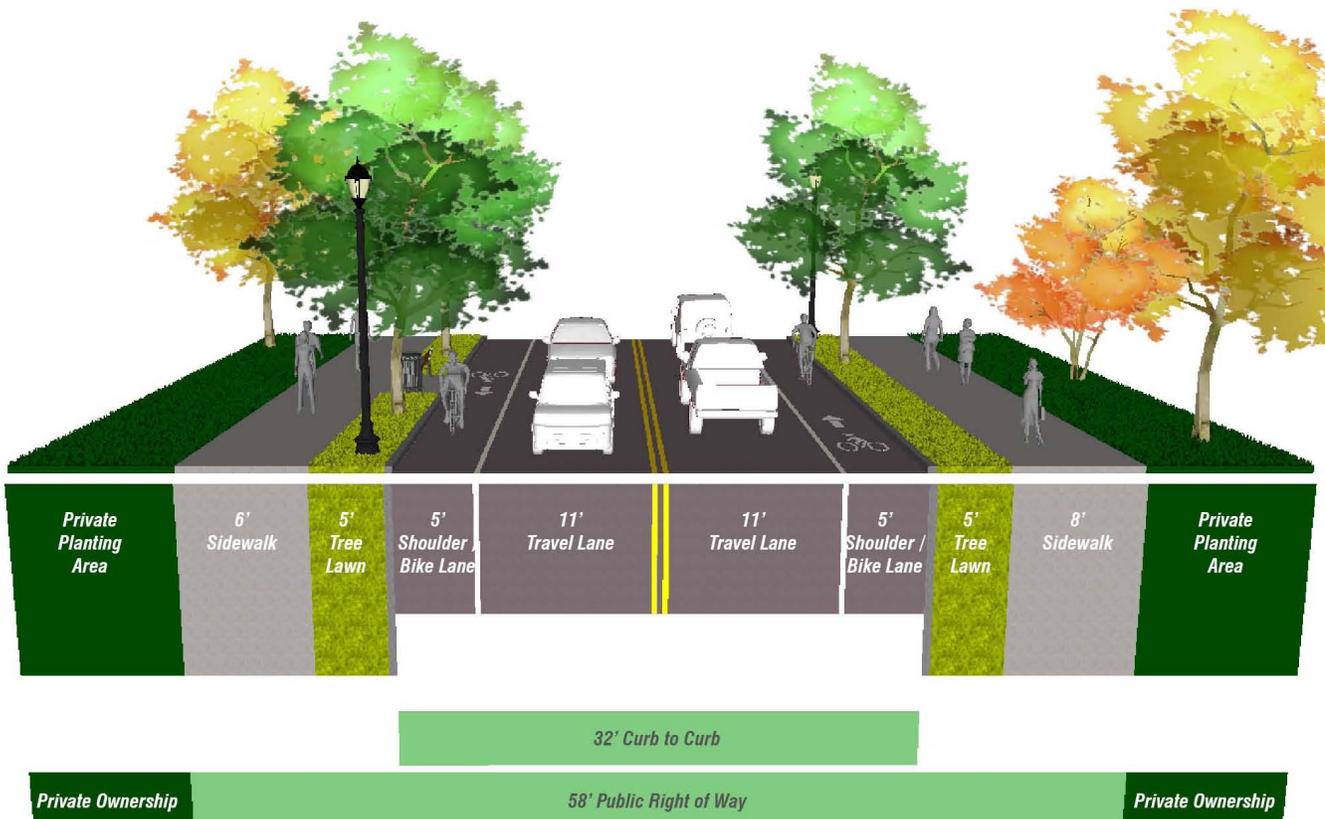


Figure 14 - Proposed Section: Equal roadway distribution

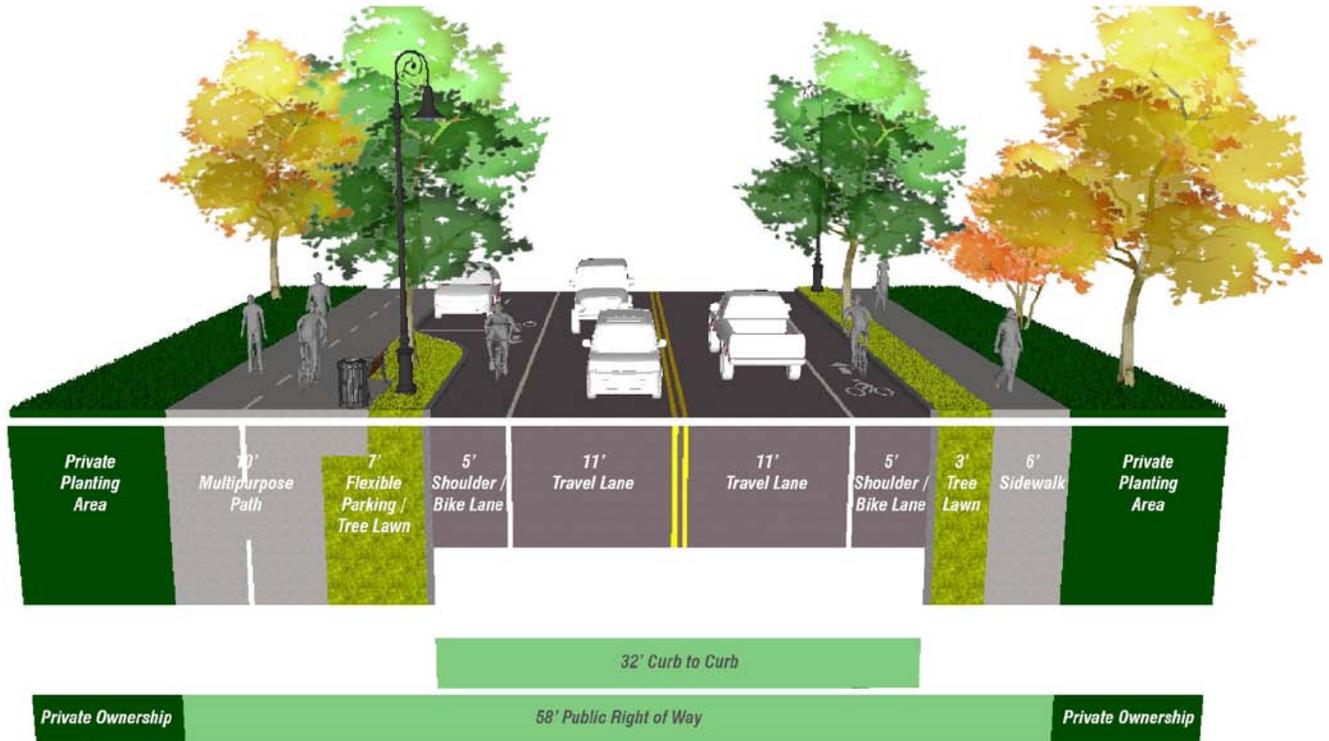


Figure 15 - Proposed Section: Multi-purpose and recreational linkage

street trees and increase sidewalks up to about 8 feet in width. This approach would benefit to the town by providing an enhanced buffer along the street, enhanced planting and amenities, and wider downtown sidewalk

Figure 15 explores a recreational opportunity, that could be created if a 10-foot multi-purpose path is established that would connect the East and West limits of the downtown district. Such a path could be used by both bicyclists and pedestrians. The sketches further explore how parking could be integrated into the streetscape through the use of a flexible parking and tree lawn strip which would not be symmetrical, but located on one side of the right-of-way.

The studies also considered the potential benefits of creating a more sustainable landscape component with the right-of-way. The method illustrated in the study would be to create a “bioswale”. This is a type of shallow drainage ditch that serves to filter stormwater run-off through dense plantings. Shown in figure 16, this illustration displays how a design could allocate 10 feet of right-of-way to a bioswale, while increasing the sidewalk width along one side to 8 feet. Additionally, new ornamental lighting and planting areas could provide a safer and more attractive environment.

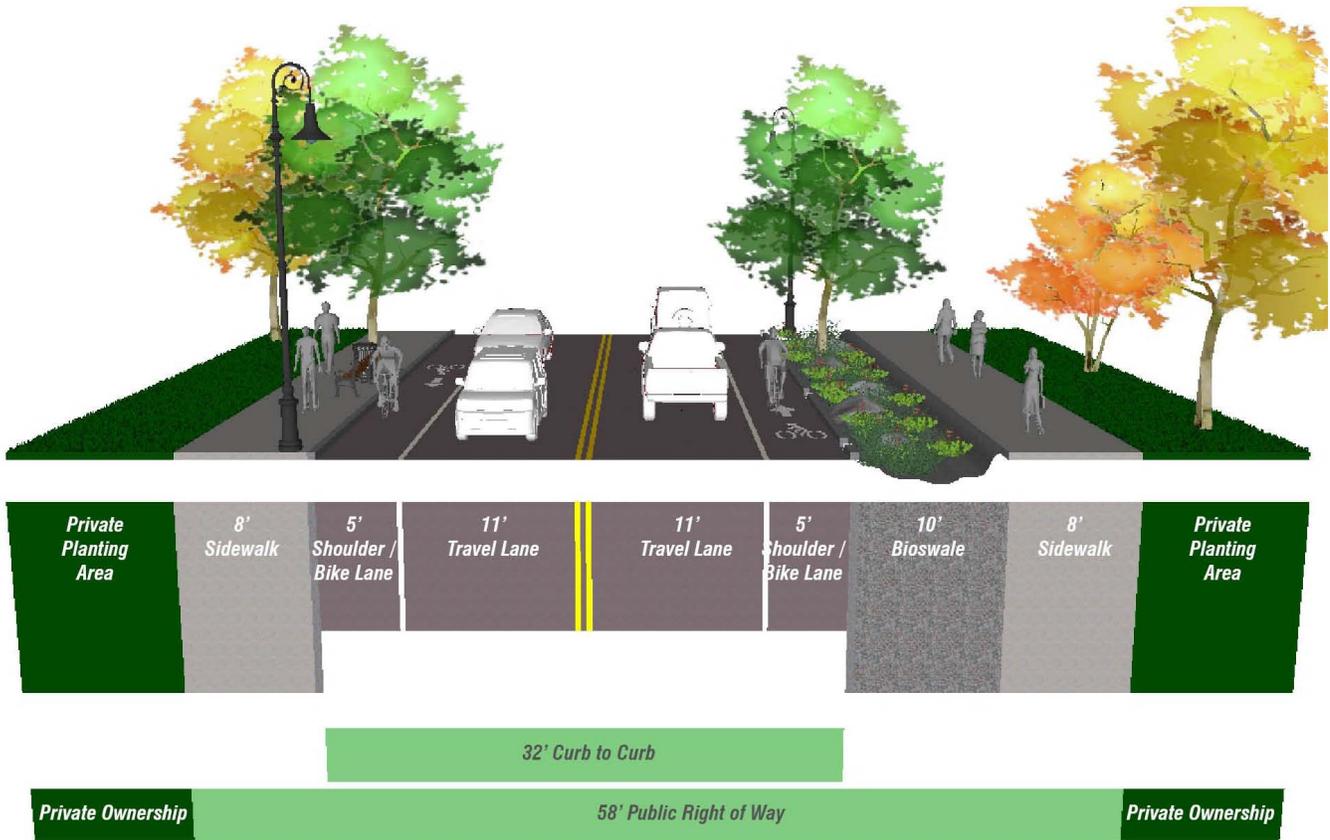


Figure 16 - Proposed Section: Sustainability

ROADWAY REALIGNMENT

There may be an opportunity to accomplish a realignment of Main and West Main Streets to create a better gateway to the community, which is shown in figure 17. This intersection links the town to other communities, and could be enhanced. The study investigated a potential realignment shown in figure 18 to increase the effectiveness of the open space if it is possible to remove the one way northbound lane, while accommodating existing turning radii, and providing adequate access to the existing residences.



Figure 17 - Existing conditions at Main and West Main Streets



Figure 18 - Proposed conditions at Main and West Main Streets

ACCESS MANAGEMENT

Currently, Main Street boasts a variety of access issues which were described in the existing conditions analysis. The Town can immediately improve conditions by regulating and sharing vehicular access points to existing residential and commercial uses. Vincent’s Plaza is the most notable section of the district where unregulated access is occurring (figure 19). Sharing of access points can create an enhanced streetscape and an appropriate private parking configuration can be achieved with minimal improvements (figure 20). This concept sketch illustrates the conversion of five unregulated access points into three shared access points. The improvements increase circulation efficiency, promotes safety, provides landscape enhancements, and increases parking supply by 33% (55 total spaces to 73 total spaces). Additionally, reduction in access points should ensure that existing residential access includes one driveway per parcel (see figure 21).



Figure 19 - Existing conditions at Vincent's Plaza



Figure 20 - Proposed conditions at Vincent's Plaza

Eliminating direct perpendicular parking from Main Street would promote safety for all users of the district and is illustrated in figure 22. Regulating this access to one access point and shifting to perpendicular parking would create an opportunity for open space on private property, see figure 22. Furthermore, existing private parking conditions that use the street for interior circulation should be prohibited in every location (figure 23). Most corridor parking facilities should be evaluated to eliminate inefficiencies and promote efficient circulation. While there is potential for minimal parking losses to the existing supply, the town and property owners should evaluate additional opportunities to provide on-street parking to offset these losses.

To minimize impact on the streetscape and pedestrian infrastructure, all access points should adhere to maximum widths for all circulation and traffic demands. By providing excessive access widths, the streetscape safety characteristic is diminished and encourages elongated crosswalk distances,



Figure 21 - Typical existing direct access parking configuration



Figure 22 - Typical proposed direct access parking configuration



Figure 23 - Parking circulation diagram

perceptions of a vehicular-oriented streetscape, and produces a fragmented pedestrian infrastructure.

CONNECTIVITY

Connectivity is essential to a successful streetscape. Providing a continuous network of sidewalks and frequent options to cross promotes walkability. This study recommends expanding the Town's existing network of sidewalks. The initial focus of effort should be to infill segments where there no sidewalk. Strategies should then be chosen to extend a complete sidewalk network.

The increase of frequency, enhancement, and safety of the existing crosswalk infrastructure is vital to creating a comfortable and walkable environment. The study illustrated new crosswalks should be located at all street intersection to promote convenience, lower vehicular speeds, and safety. Additionally, crosswalks should be located where there will be a high amount of pedestrian activity from commercial nodes. When promoting and implementing crosswalks certain characteristics should be evaluated to create a connected network; material, signage, and traffic calming (figure 24). These elements of connectivity combined with a consistent streetscape program will define a walkable and attractive downtown district for the residents and visitors.



Figure 24 - Typical crosswalk amenities: material / signage / traffic calming

ENHANCED STREETScape

A vibrant streetscape is comprised of a diversity of elements that cohabitate. These elements include, but are not limited to: heterogeneous street tree program, landscape buffers, signage, ornamental lighting, litter receptacles, benches, and bike facilities.

Landscape

When creating an effective landscape the town must select species of trees and shrubs that complement the existing conditions and provide interest and distinction to the streetscape. The following species are trees that are generally accepted in a streetscape planting program (figure 25). Appropriate spacing of the landscape is critical to retain visibility of existing and future business signs and highlighting architecture.



Figure 25 - Typical street trees: American Elm / Callery Pear / Japanese Zelkova / Honeylocust (respectively)

Amenities

The objective to make this district a lively area would need to be coupled with providing public amenities such as benches, bike racks, and trash receptacles. These create a functional downtown environment for the visitors and residents to stay, experience, and interact with. The study suggests that the town should select a typical style which would be characteristic of the downtown district, and placed in locations that would benefit the town and businesses. Figure 26 are typical amenities that are considered during a streetscape project.



Figure 26 - Typical streetscape amenities: bench / bike facilities / trash receptacles

Lighting

Better streetlighting can improve appearance and enhance safety. Current technology provides excellent choices of both historic and contemporary fixtures. Through future design efforts, the Town should select a character

of ornamental lighting to be located at equal intervals to project safety and consistency. Figure 27 are typical ornamental fixtures that are traditionally used during a streetscape project. Lighting also has an ancillary use for wayfinding signage and event signs and banners, such as those illustrated in figure 28.



Figure 27 - Typical ornamental lighting styles



Figure 28 - Typical wayfinding / signage opportunities

PARKING

Current conditions in the Main Street district are largely comprised of a series of commercial and residential uses that have met the required parking needs on private property. During the process of reallocation of public right-of-way, the town should strategically consider locations where parking could be considered to aid in future development or counterbalance parking losses. Figure 29 shows a potential location for temporary parking opportunity for existing government and commercial uses. Currently the parking demand has not shown to exceed the supply. However, the study suggests the benefit of Town-owned parking facilities in strategic locations, if future development and activity would benefit from shared parking.



Figure 29 - Marked on-street temporary parking opportunity

IMPLEMENTATION

FUNDING RESOURCES

When the time comes to implement the enhancements for the Main Street district, the Town must be prepared with an efficient means of funding and other resources to implement the community improvements and recommendations. The recommendations listed in this study cannot be achieved at once and should be thought through accordingly.

Actions

There are a series of actions that should be considered in the short term to set the stage for implementation of these recommendations. The actions that the Town of Westminster should consider immediately are:

- Fund and undertake engineering and design studies to finalize the scope, character of intended improvements, and establish detailed cost estimates and phasing plans. These are often considered as “25%” plans, and are used for grants, funding and financing.
- Devote time and resources to secure state funding and allocate appropriate Town resources for improvements, including targeting multiple potential sources such as the state’s MassWorks program, allocation of Chapter 90 infrastructure funds, and special legislative allocation in view of the importance of these improvements to the Town and region, and Town funding.
- Prepare final designs and implement construction.
- Sponsor a professional and technical study to propose methods to improve the use and effectiveness of the parking supply in the Main Street District. Among the techniques that should be considered to improve parking are:
 - Improvements for shared layouts, signage and use agreements among landowners and the Town
 - Comprehensive on-street parking program for existing commercial uses and government buildings
- Promote beneficial mixed-use development that can take advantage of the Main Street district and its enhanced pedestrian connectivity, alternative transportation, and improved access management strategy.
- Consider the creation of a Complete Streets Ordinance or policies to guide further infrastructure improvements consistent with the goals for Main Street.
- Develop an understanding of the sustainable and complete streets initiatives implemented by other communities.

Tools

There are a series of “tools” or programs that will assist or advance the actions, either with policy and program support or through direct or indirect financial support. A number of these are local decisions to adopt sections of the state law and apply them to the study. The others are funds and programs managed by state authorities under the regulations established for those laws.

Local Powers

There are some relatively new state laws that may be useful tools for the Town, and there are ways that previously enacted legislation, with which the Town is already familiar, may be used to support the strategies.

- **District Increment Financing (DIF)** – This is a program that allows the incremental increase in private tax dollars, which result from new construction in a specific area, to be directly invested into infrastructure improvements, such as roads, utilities and public parking. A Development District is designated and, if approved by the state economic assistance coordinating council, becomes the source of tax funds used to fund projects in the Invested Revenue District.

Local / State / Federal Programs

A combination of new and existing programs can assist the Town in funding the recommended strategies.

- **MassWorks Infrastructure Program:** This includes a number of formerly separate state funding programs, including the Public Works Economic Development Grant (PWED) program, which was created to invest in infrastructure that stimulates economic development. The level of grants has typically been one-half to over a million dollars.
- **Massachusetts Chapter 90 Funding:** These funds are allocated yearly to municipalities to fund road and bridge construction and maintenance projects.
- **Mass In Motion:** This is a statewide movement that promotes opportunities for healthy and active places for people to live, learn, work and play. Funding from various health initiatives and foundations can help promote a complete streets approach for wellness.
- **Small Town Road Assistance Program (STRAP):** This program provides small towns with resources to assist in local road repair and construction costs.
- **Community Development Block Grant Program (CDBG):** This grant is often used to support urban streetscape projects, and can be used for planning and construction of infrastructure and recreation projects that support the goals of the CDBG program to service residents with lower income jobs and housing.

- **Safe, Accountable, Flexible, Efficient Transportation Equity Act:** a Legacy for Users (SAFETEA-LU) – This is a federally funded program for infrastructure improvements to highways and roads. It addresses many challenges related to safety, reducing traffic congestion, improving efficient freight movement, increasing connectivity and protecting the environment. The program covers several areas, including wayfinding/signage, bicycle safety and environmental and/or recreational stewardship.
- **Transportation Improvement Program (TIP):** A federally and state funded program aimed at providing funding for eligible transportation system improvements. These improvements range from, but not limited to, improved bicycle facilities, sidewalks, and bus stop improvements.

COSTS

The chart below represents a cost per linear foot for various levels of streetscape improvements. The linear foot cost includes all elements listed within the entire right of way. The most enhanced streetscape would include most or all three levels of improvements. Costs will fluctuate based upon the specific situation and a varied level of improvements required from other levels.

COST / LINEAR FOOT	SOFT COSTS % / TOTAL CONSTRUCTION COST	TYPICAL STREETScape IMPROVEMENTS
\$250-\$650	8%-9%	Concrete walkways, new curbing, roadway overlay, street trees, standard street lights or enhanced lighting at key locations, standard painted crosswalks, standard traffic striping, standard permitting
\$400-\$800	10%-11%	Enhanced intersections, decorative paving bands at key locations, period style lighting, curb extensions, underground utility realignment coordination*, banner poles, select amenities (benches, bollards, trash receptacles, bicycle racks, raised granite planters), enhanced bikes lanes, imprint crosswalks, environmental permitting.
\$1,100-\$1,500	12%-14%	Major intersection or roadway realignments, new traffic and pedestrian signals, enhanced roadway paving at intersections (Traffic print), way finding/signage, banners, interpretative elements (paving, benches or signs), special amenities (large raised planters), non-participatory open space areas (adjacent to right of way)

Using the baseline scenario *Table 1 - Typical streetscape improvements per linear foot cost* provided in this study, the range of potential costs for the improvements can be concluded from the table below for the purposes of initial budget planning. More detailed and accurate estimates would be provided as part of the next phase of engineering and streetscape design, which will be needed to confirm specific funding targets.

RANGE OF PROJECT COSTS*

Components	Linear feet	Low cost range	Median cost	High cost range
Streetscape segments	3900	\$1,053,000	\$1,904,175	\$2,763,150
Unsignalized intersections	200	\$88,000	\$132,600	\$177,600
Signalized intersections	300	\$369,600	\$440,700	\$513,000
Totals	4400	\$1,510,600	\$2,477,475	\$3,453,750

The cost of providing underground utilities varies substantially, and is largely

2 - Estimated range of project costs

determined by the utility companies, which need to agree with and participate in locating the utilities underground. As a result, it is not practical to estimate the cost in advance of detailed discussions and negotiations with the relevant utility providers, and this has not been included in the estimates.

STATE ROUTE OWNERSHIP

State owned roadway transfer is an opportunity for all municipalities that have proper funding to do so. This would allow the town to provide upgrades and implement design alternatives that do not necessarily align with MassDOT roadway standards. However, the town must be cognizant of what they can expect throughout the transfer process. MassDOT prefers to transfer roads in good condition, and during this process there will be some funding from them to contribute to repairs and upgrades prior to transfer. Final design and standards will depend on the funding sources acquired throughout the process, including:

- MassWorks – some leeway in the design (bike lanes, road widths)
- Transportation Improvement Program (TIP) – state standards

Following the ownership transfer the road will remain a state numbered road with local ownership. The local authority will then be responsible for all maintenance and upgrades of the roadway, but are still eligible for state and federal funding. These opportunities should be carefully considered with regards to design, future development, and existing and future finances before moving forward with the transfer process.

UNDERGROUND UTILITIES

There are a variety of constraints and opportunities to be aware of when the town decides to undertake the reconnection of utilities to existing and proposed businesses. Providing underground utilities varies substantially, and are largely determined by the utility companies.

- Relocated utility will have to be separated into stand-alone underground infrastructure

- Private connections to the existing development will have to be reconnected with the shift to underground. This added cost will have to be negotiated between owner, town, and provider.

However, utility providers are private entities and their fee has the potential to non-market prices. This can be a controversial topic to a project and should be carefully negotiated and discussed between town residents and officials as the process further develops. The town should also investigate other opportunities such as re-routing existing infrastructure to the rear of all existing and future development on Main Street. This relocation maintains current utility operation at an alternative to high costs associated with underground utilities and provides an infrastructure free downtown district.

When considering how to fund underground or relocated utilities, the town should recognize there are a variety of options, which include:

- Local Bonding
- Grants
- Federal Funding
- Municipal Funding

These potential funding options and programs have been expanded upon in the funding resources section in this study.

An aerial photograph of a suburban area with houses, trees, and a large commercial building. A dark, semi-transparent rectangular overlay is positioned in the lower right quadrant, containing the word 'APPENDICES' in white, bold, uppercase letters. A vertical red line runs down the left side of the image, and a horizontal red line runs across the middle, intersecting at a small red square on the left side of the dark overlay.

APPENDICES

Main Street Design Workshop: Westminster, Massachusetts

April 28, 2014

Presented to:
Board of Selectmen
Westminster, Massachusetts

Presented by:
Center for Economic Development
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Introduction

The town of Westminster is a quaint New England-style village town located in North Central Massachusetts. In the heart of the community is a downtown district located on Main Street between the intersection of Route 2A and West Main Street to the north and South Street and Route 2A in the south. The Westminster Master Plan Committee identified the Town Center as a community asset with locally owned businesses, restaurants, community structures, and numerous buildings of historical significance. Westminster is home to the famous Oyster Cracker Factory, the Forbush Memorial Library, the notable Old Town Hall, and the historic Upton Building. Local village residents are keen to preserve these attractions that resonate with the charm of a typical New England-style community. However, current zoning regulations do not favor building forms that embrace a quintessential New England-style village. Current zoning requires buildings to be set back from Main Street. The design and layout of these structures encourages development of large parking lots for vehicles in front of

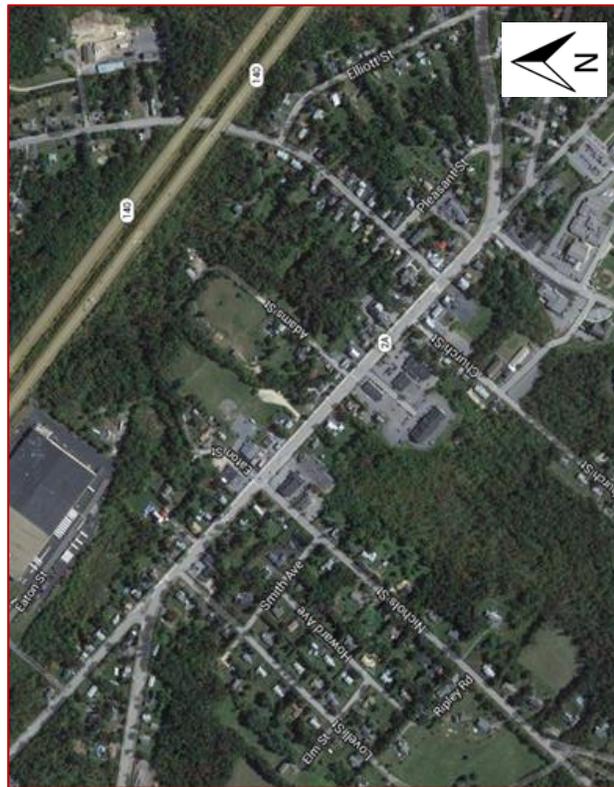


Figure 1: Downtown Westminster

buildings and creates an uninviting environment for pedestrians.

On April 12, 2014 members of the Master Plan Committee, graduate students from the University of Massachusetts Amherst, and Town Planner, Stephen Wallace, hosted a Main Street Design Workshop. The goal of the workshop was to gather

input from community stakeholders regarding their vision for Main Street. Their recommendations will ultimately craft future zoning regulations and design guidelines. Approximately 20 residents, divided into three groups, participated in the event consisting of three exercises. The first exercise was a walking tour that began at the Forbush Memorial Library on Main Street. Graduate students from UMass were responsible for facilitating discussion amongst workshop participants during the tour. Students helped participants point out specific areas that inhibited the walkability of Main Street such as lack of crosswalks and sidewalks, too many curb cuts, and various design elements including street lighting, landscaping and trees, utilities, signage, building setbacks, and parking.

After the walking tour, participants reconvened at the library and were asked to remain in the same groups. The second exercise consisted of a round table discussion focusing on critical design elements that they would like to see in the future. Each group assigned a facilitator and a scribe, none of which were a member of the UMass team, Master Plan Committee, or Town staff. Facilitators were responsible for keeping the discussion on track while the scribe wrote down notes and main topics of concern on a large flip chart. Each group also had a large scale map of Main Street and was asked to illustrate where they would like to see future improvements. Following the discussion, the third exercise was a dot preference exercise. Each group attached their summary of ideas to the wall and participants were asked to attach four red adhesive dots on other group's ideas around the room. Their stickers signified the top four priorities most important to them with the limitation that they could not place a red dot on their own idea.

Results

The walking tour lasted approximately one hour as each of the three groups headed in different directions. Each small crowd walked along both sides of Main Street from the intersection of Main Street and State Road West to the intersection of Main Street and Leominster Street. The suggestions, comments, and concerns were summarized into the following categories: sidewalks, the street, signage, and zoning. Currently, the road is under State jurisdiction which prevents the town from making any improvements. Participants were asked to keep in mind that the town has control of Main Street.

Sidewalks

There was a consensus amongst all groups that the above ground power lines should be buried below the sidewalks, roads, and driveways. Participants also stressed the importance of replacing the utility poles with street trees and historically relevant street lamps. There was some debate about whether benches would be an appropriate furnishing on the sidewalks; residents were concerned that they may not receive much use. Participants also addressed the location of private property owner's location of mailboxes. Ubiquitous throughout downtown, mailboxes in buckets filled with cement were located along the roads and



Figure 2: Mailboxes along Main Street

sidewalks. Pedestrian safety is a major concern as well. All groups unanimously agreed that adding more sidewalks and crosswalks would improve public safety and accessibility to local stores and destination. Every group indicated that they would like to see sidewalks on both sides of Main Street, particularly on the south side of Main Street between Lovell Street and Nichols Street. Many participants also stressed the importance of having a sidewalk from Main Street all the way to the Senior Center to provide seniors with safe access to downtown and up to the Town Common. A few participants advocated that sidewalks should incorporate brick and a granite curb in the future.

The Street

There was also group consensus to add a cross walk on Main Street in front of the Westminster Café, in front of Vincent's Plaza, and across Main Street at the intersection with South Street. Many participants also highlighted the importance of making all cross walks more visible by using traffic calming techniques such as alternative materials, bump outs, or paint. These techniques make drivers more aware of surrounding pedestrians or bicycles. A traffic signal or raised cross walk at the intersection of Main Street and Nichols Street was also brought to the attention of the workshop team. This technique would attempt to slow traffic even more within downtown. In addition to a stoplight or crosswalks, on street parking also has the potential to impede the flow of high speed traffic. This common idea was emphasized throughout the group. Parking along the street would make Main Street narrower; slowing down passing cars in order to



Figure 3: Crosswalks lacking visibility

create a safer environment for pedestrians was a common value. Participants also stressed a need for a downtown municipal parking lot and identified the area behind the First Baptist Church as an option. Numerous participants want to see more landscaping and signage on the street islands at both ends of downtown in order to increase aesthetics. The addition of green infrastructure (bioswales, trees, and plantings) reduces storm water runoff and enhances overall environmental quality. Storm water drainage was of concern for two of the groups particularly in front of the Cumberland Farms store and the Cracker Factory.

Signage

Workshop participants articulated that they value high quality aesthetics for Main Street. During the walking tour and discussion there were numerous instances where participants pointed out abandoned signs that should be taken down. Participants also recognized a preference for monument signs, post signs, flag signs, dimensional letters, and wall signs. There was a common distaste for free standing pole signs and temporary A-frame signs. Participants indicated the importance for way-finding signs that directed pedestrians and motorists to community resources such as the post office, town hall, library, elementary school, and the town common. There was also a strong interest in all groups for having a community event sign in downtown to display current events and flyers.



Figure 4: Way-finding Signage in Northfield, Texas

Zoning

As noted earlier, participants recommended making Main Street more pedestrian friendly and safer. One method for engendering safe pedestrian activity is to use zoning bylaws to encourage parking on streets or behind buildings. Relocating parking behind the buildings and decreasing setback requirements enhances the safety and aesthetics of Main St, allowing the community to fully appreciate a downtown that resembles a classic New England-style village.

Zoning regulations can also

limit the amount of curb cuts. One of the

most acknowledged elements for the future of Main Street was to decrease the number of curb cuts. Participants in each group pointed out the four curb cuts that allow cars in and out of Vincent's Plaza. They would like to see that number reduced to two; one curb cut for cars entering and other for cars exiting. The community also wants to see the town address the need for more

empty nester housing. In doing so, the workshop insists the town update their current zoning bylaws to allow mixed use buildings and empty nester housing along Main Street. Participants also stressed the importance to redevelop the Old Town Hall and Cracker Factory while preserving the character of each building.



Figure 5: Building setback too far



Figure 6: Curb cuts in front of Vincent's

Conclusion

In the short-term, the data from this event will inform perspective illustrations, provided in Appendix B, of what Main St. could look like if workshop participants' ideas were implemented. In the long term, this data will inform future zoning regulations and design guidelines for Main Street. Tabulated results from the dot preference exercise are provided in Appendix A. The illustrations in Appendix B represent the most popular design elements mentioned by workshop participants including: street trees, raised crosswalks, a vegetative buffer along Main Street, brick sidewalks, underground power lines, a reduction of curb cuts, and colorful landscaping.

Appendix A: Dot Preference Exercise Summary

Element	Red Dots
Create zoning for empty nester housing	6
Create mixed use zoning	6
Preserve cracker factory	6
Install traffic calming features at intersections	5
Place utilities underground	5
Reduce the amount of curb cuts	4
Encourage upscale housing, farmers market, arts, local food business, and commercial kitchen	4
Install way finding signs for community resources	4
Remove old/abandoned signs	3
Plant street trees	3
Incorporate sustainable landscape features	3
Create town parking lot	3
Create zoning for higher density	3
Create angled parking on Main St.	2
Install bike lanes	2
Disposition of old town hall	2
Extend anchor of village to Senior Center and Academy Hill	2
Construct sidewalk from Nichols St. to Westminster Café	2
Install signage and landscaping at entrances to downtown	2
Slow traffic	2
Install a community events signs	2
Construct brick sidewalks	1
Place buildings closer to the street and parking behind them	1
Implement classic New England design standards	1
Install granite curbs	1





Element	Red Dots
Construct green buffer strip along sidewalk	1
Implement guidelines for consistent business signage	1
Construct hardscape crosswalks	1
Take over Jurisdiction of main street	1
Advocate for MART bus route	1
Install crosswalks between Nichols St. and Lovell St.	1
Reduce spot zoning in downtown	1
Create on-street parking in selected areas	1
Remove mailboxes from sidewalks	1
Construct sidewalks on both sides of Main Street	1
Place public trash and recycling barrels on sidewalks	1
Widen sidewalks/narrow roads	1
Encourage more wood post and panel signs	1
Place benches along Main St.	0
Encourage design guidelines for fencing and signs	0
Eliminate future drive-thrus	0
Place gas lamp street lights with flags	0
Improve and increase the number of crosswalks	0
Improve drainage at Nichols St. Intersection with Main Street	0
Improve relationship with Wachuset mountain	0
Improve West Main St. intersection	0
Improve flow and safety at Cumberland farms intersection	0
Enhance landscaping for existing commercial properties	0
Prohibit larger vehicles	0
More visible historic building signage	0
Create off-street walking path from school area into town	0
Prohibit satellite dishes	0
There are too many white buildings	0
Create traffic signals at Nichols St.	0

Appendix B: Perspective Illustrations

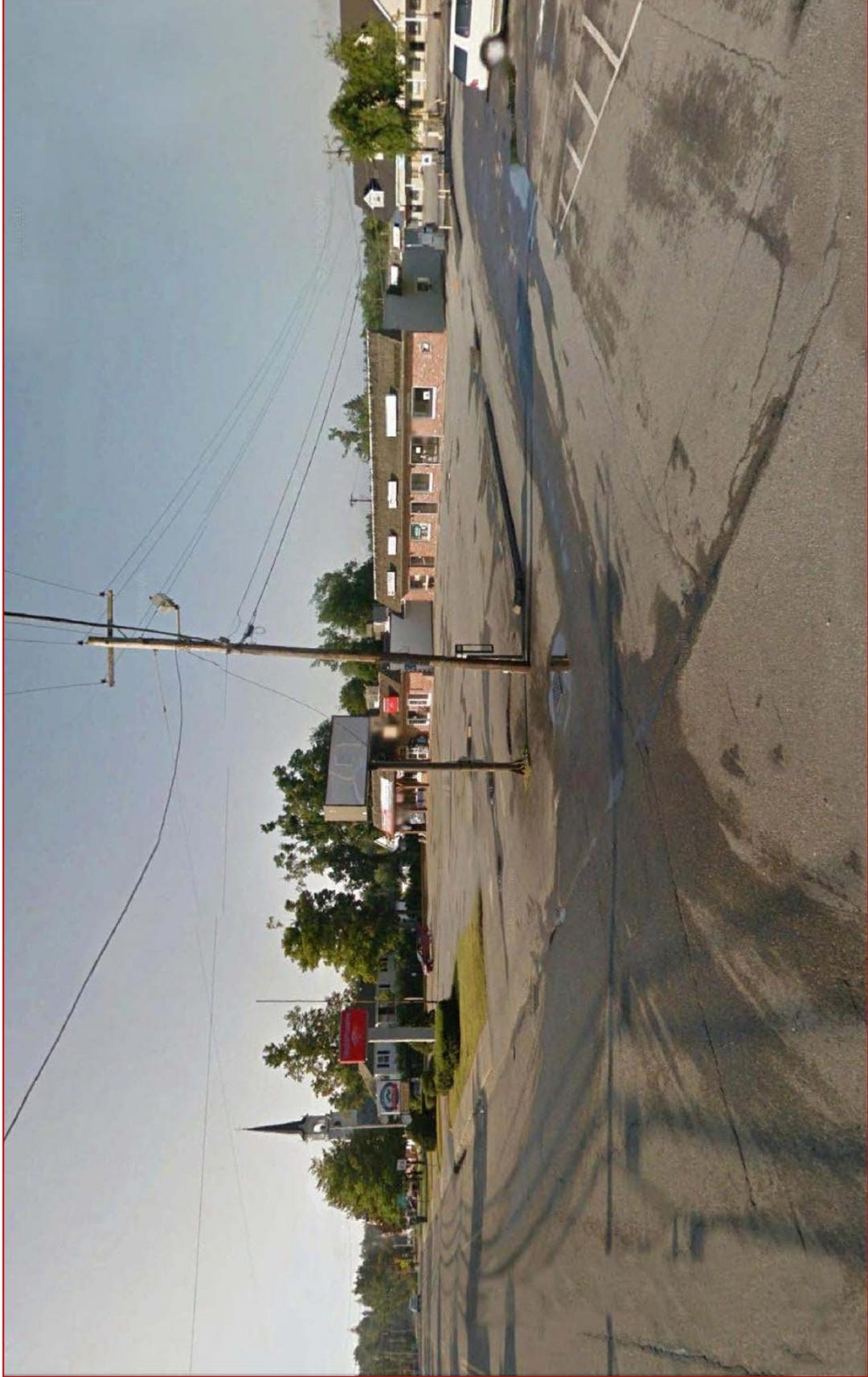
In front of First Congregational Church, looking west - Existing



In front of First Congregational Church, looking west – Illustration



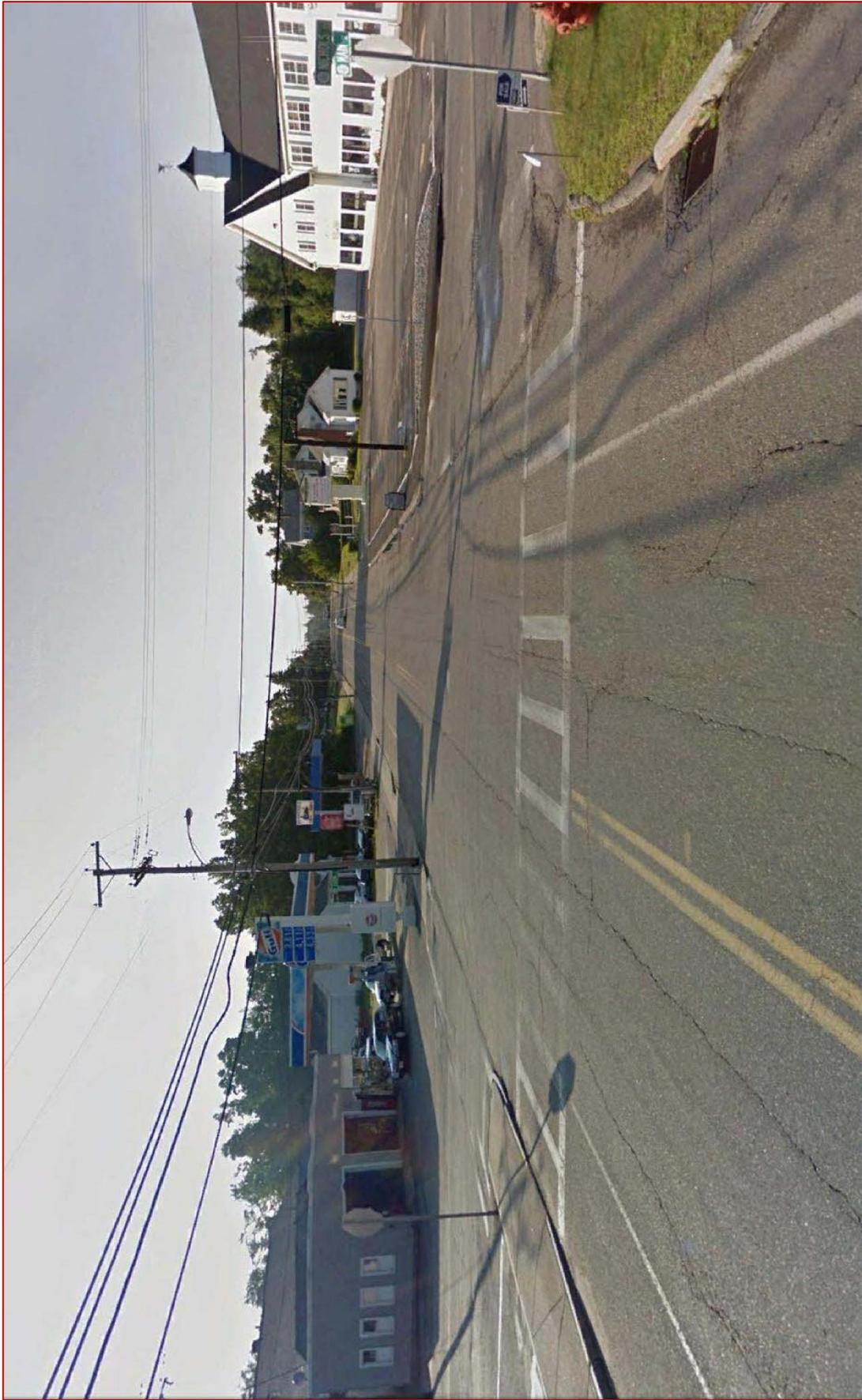
In front of Vincent's Plaza, looking east - Existing



In front of Vincent's Plaza, looking east – Illustration



Intersection of Nichols Street and Main Street, looking east – Existing



Intersection of Nichols Street and Main Street, looking east – Illustration



Intersection of Nichols Street and Main Street, looking east – Illustration



PRELIMINARY DIAGRAMMING



-  Potential Roadway Reallocation
-  Intersection Realignment
*(Potential - Solid Outline/
Existing - Dashed Outline)*
-  Reallocated Private Property
(Parking to Open Space)
-  Reorganized Private Parking
-  Parking / Sidewalk Treatment
-  On-Street Parking to Remain
-  Crosswalk Removed
-  Proposed Crosswalk
-  Crosswalk to Remain
-  Curb Cut Removed
-  Curb Cut to Remain
-  Proposed Landscape Treatment



TOWN OF WESTMINSTER



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OBSERVATIONS ON DESIGN GUIDELINES FOR DOWNTOWN DISTRICTS

A question was raised during the course of this study regarding the most appropriate methods to employ design guidelines in a manner that would benefit the appearance and economy of the Town Center. The Cecil Group considered the regulatory framework in Westminster and recommends that the Town employ advisory design guidelines and administers them through processes that provide for design review and recommendations during appropriate phases of project design and approvals. Design guidelines that are incorporated directly into zoning are not recommended due to the complexity of drafting appropriate standards and administering them in the context of likely development scenarios and existing design issues in Westminster. However, certain dimensional standards and site design criteria could be reviewed and updated within the existing zoning to establish more appropriate approaches to issues like setbacks, location of parking on sites, provision of landscaping, provision of sidewalks, and other topics.

Design guidelines are a very useful tool for communicating the opportunities to provide higher value, coordinated designs for buildings and for sites that reinforce the desirable qualities of the town center district. The recommendations for Westminster include:

- Prepare a focused set of design guidelines tailored to the types of properties and projects in the town center
- Include principles for both building and site design
- Establish a design review committee (a Design Review Advisory Board) that is separate from the permit granting authority that includes members with familiarity in design and construction topics, and with the historic resources in the Town
- Involve the Town staff in the review process
- Use the guidelines within an advisory review process that is clearly established with the Town's zoning and subdivision regulations, and that is included in the application and review process for projects seeking zoning approvals, variances or site plan approvals.
- Employ the design guidelines as mandatory and require approval of the design review board for projects that involve grants or financing by the Town, or include Town property.

There are a variety of templates that can be used to shape how a community determines their approach to managing development in the downtown district. Some examples are:

- Grant funding or loan criteria
- Zoning by-laws and ordinances
- Special permit criteria

- Site plan review criteria
- Historic district criteria
- Redevelopment district criteria (urban renewal)
- Chapter 40R design standards
- Private sector guidelines and standards (large development)
- Informational and inspirational guidelines

Elements of Design Guidelines and Standards

As the town moves forward with a design guideline it is good practice to identify exactly what all the elements that could be adopted into a cohesive document. The Design Guidelines should provide clear information as to expectations and responsibilities so that all participants understand what to expect from the design review process. Some of these elements could include:

- Purpose – The purpose of the design guidelines should be to address specific goals of the Town relative to the built environment
- Definitions –The terminology stated in the document should be consistent with the purpose and clear as to the Town’s expectations regarding development
- Applicability and Applications – The design guidelines should state which project types are required to meet in what type of projects can the developer expect to see these guidelines apply
- Architectural Elements – Clear examples of architectural elements appropriate to the design vision of the Main Street Downtown Corridor should be included
- Site Elements – Streetscape elements are significant to the identity of a downtown corridor and amenities such as ornamental lighting and bollards, signage, benches, trash receptacles, and bike facilities should be coordinated with the overall feel of the downtown and its architecture
- Special Criteria and Performance Guidelines - Guidelines related to sustainable design, public art, transportation, lighting, preservation and other topics of concern may be included.
- Design Review Process – A clear review process, identifying the parties involved (Planning Board, Zoning Board of Appeals, Design Review Committee) and the steps for review (pre-application review, application, post-application review, peer review) should be part of the Design Guidelines.
- Criteria for Decisions – The Applicant should understand how the project will be reviewed and by what criteria the project may be approved or denied. Criteria should be listed as part of the review process and be specific.

Design Guidelines may address the following topics:

- Architecture (building massing, building form, façade elements)
- Infrastructure
- Streetscape (street crossings, street furniture, planters)
- Parking (landscape buffers, snow removal)
- Signs (blade, sandwich, illuminated)
- Lighting (street, building, parking lots)
- Natural Features (trees, waterways)
- Open Space (public and private)

Case Studies

The Cecil Group reviewed the Town's existing zoning and approval structure, and considered the relevant experience of comparable communities, assembling case studies through research of their processes and the outcomes of the approaches that they have taken. The results of this research resulted in a series of observations, including:

Concord

- Design Guidelines are advisory for all projects within specific districts
- Additional criteria required for Site Plan Review
- Town staff prepares preliminary review of conformance prior to application and reports to Planning Board of Zoning Board of Appeals with recommendations after application submitted
- Three projects completed since 2011
 - Process has been successful for Site Plan Review
 - Applicants have used guidelines to understand review criteria
- Process has not be successful for projects not eligible for Site Plan Review
 - Applicants able to ignore design guidelines when applying for building permit

Dedham

- Design Review Advisory Board
 - Reviews all new construction and signage, additions and alterations within certain districts
- Recommendations made to Planning Board or other body
- DRB review before submission and/or after application
- Uses applicable "design guidelines"
 - No reference to a specific set of guidelines

- Design Bulletin and Design Manual for Building Improvement
 - On Town’s website
 - Neither document is a regulatory standard
- Town planning to further integrate guidelines into sign bylaw
- May move to design standards in the future

Recommendations

- Add specific dimensional standards to zoning regulations
- Create written Design Guidelines that are advisory
- Identify trigger event
 - Site Plan Review
 - Any development in a specific area
- Develop clear submittal requirements
- Create Design Review Board; appoint design professionals (architect, landscape architect, planner)

Other Resources

The study encourages the town to research other resources for exploring how other communities have used design guidelines. The links below provide additional information.

- Smart Growth America : Rural Areas and Small Towns – <http://www.smartgrowthamerica.org/complete-streets/implementation/factsheets/rural-areas-and-small-towns/>
- Putting Smart Growth to Work in Rural Communities – http://icma.org/en/icma/knowledge_network/documents/kn/Document/301483/Putting_Smart_Growth_to_Work_in_Rural_Communities
- Implementing Complete Street: Rural Communities and Small Towns - <http://www.smartgrowthamerica.org/documents/cs/factsheets/cs-rural-2.pdf>
- Active Transportation in Rural America – <http://www.railstotrails.org/ourWork/reports/beyondurbancenters.html>
- Greenway Guides – <http://www.co.dutchess.ny.us/CountyGov/Departments/Planning/17331.htm>

