

KEENE DOWNTOWN INFRASTRUCTURE IMPROVEMENT & RECONSTRUCTION PROJECT

PUBLIC INFORMATION WORKSHOP

KEENE DOWNTOWN IMPROVEMENTS PUBLIC INFORMATION MEETING AGENDA

- Mayor's Welcome
- Project Overview and Process
- Outreach and Engagement
- Issues and Concerns
- Preliminary Design
 - Utility Infrastructure
 - Main Street
 - Central Square
 - Gilbo Avenue/Railroad Square
- Project Schedule
- Public Comment



KEENE DOWNTOWN IMPROVEMENTS

PROJECT OVERVIEW AND PROCESS

- Project Kickoff – April 2022
 - Data Gathering
 - Survey/Evaluation/Studies
 - Identifying Issues and Addressing Concerns
- Public Engagement
 - Public Workshop #1 – June 2022 (Issues/Concerns)
 - Project Webpage Launch
 - Develop and Refine Project Goals
 - Public Workshop #2 – October 2022 (Concept Designs)
- Mayor’s Ad-Hoc Steering Committee
 - Alternative Analysis
 - Preliminary Design
- City Council Review Process
 - Public Information Workshop – January 30, 2023
 - **Public Comment Session – February 21, 2023**



KEENE DOWNTOWN IMPROVEMENTS OUTREACH RESULTS | GOALS

Utility Infrastructure Improvements

Define/Expand Connections to Downtown District

Support a More Sustainable Built Environment and Transportation Choices

Strengthen Image and Character, Including Arts and History

Expand Flexible Open Space

Improve Multimodal Transportation Access

Provide Adequate Parking

Upgrade Walking Environment



KEENE DOWNTOWN IMPROVEMENTS PROJECT PLANNING BACKGROUND

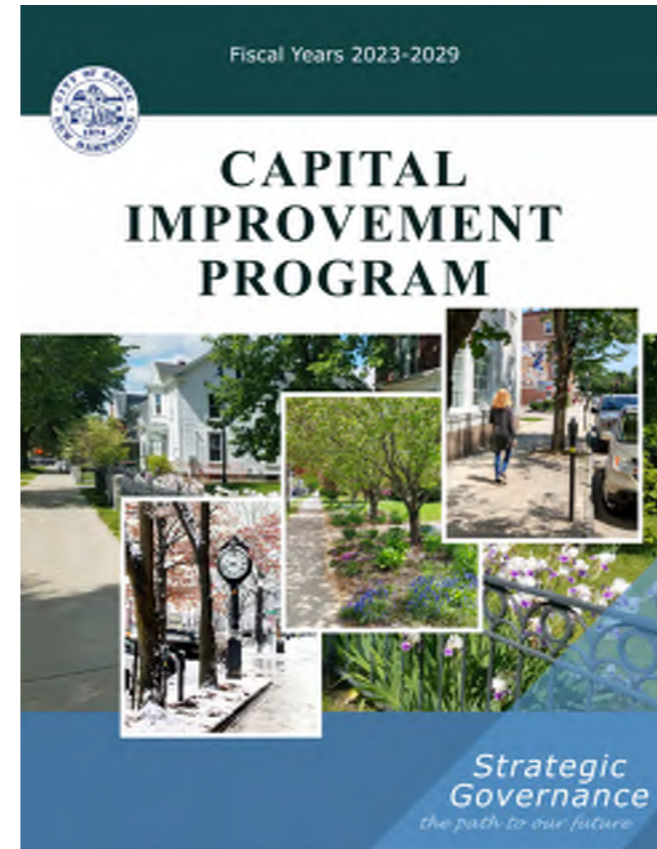
Keene Comprehensive Master Plan (2010)

Keene Complete Street Planning and Design Guidelines (2015)

Modeling the Future of the Keene Arts Corridor (2021)

Strengthening Connections: Downtowns & Trails, Keene, NH (2022)

Keene Capital Improvement Plan



Keene Comprehensive Master Plan



SEPTEMBER 2010

KEENE DOWNTOWN IMPROVEMENTS

ISSUES AND CONCERNS

- reliable utility infrastructure
 - water, sewer, storm drain
 - electrical services (EV planning for the future)
 - private utilities (power, gas, telecommunications, fiber)
- environmental concerns
 - vehicle delays/GHG
 - flooding (delays and property damage)
- traffic concerns
 - signal timing/delays/conditions
 - emergency vehicle access
- pedestrian safety concerns
 - crosswalk lengths
 - mid-block crossings
 - double threat near misses
 - lighting/signage/visibility/conditions
- bicycle safety concerns
 - limited to no bicycle facilities in Downtown
 - storage/racking
- public transit
 - limited public transit stops
 - growing need
- Downtown sidewalk commerce
 - create more opportunities
 - conditions don't allow in some areas
- image and character of Downtown Keene
 - tree canopy
 - iconic views
- universal access
 - accessibility in public realm
 - business/building access

KEENE DOWNTOWN IMPROVEMENTS

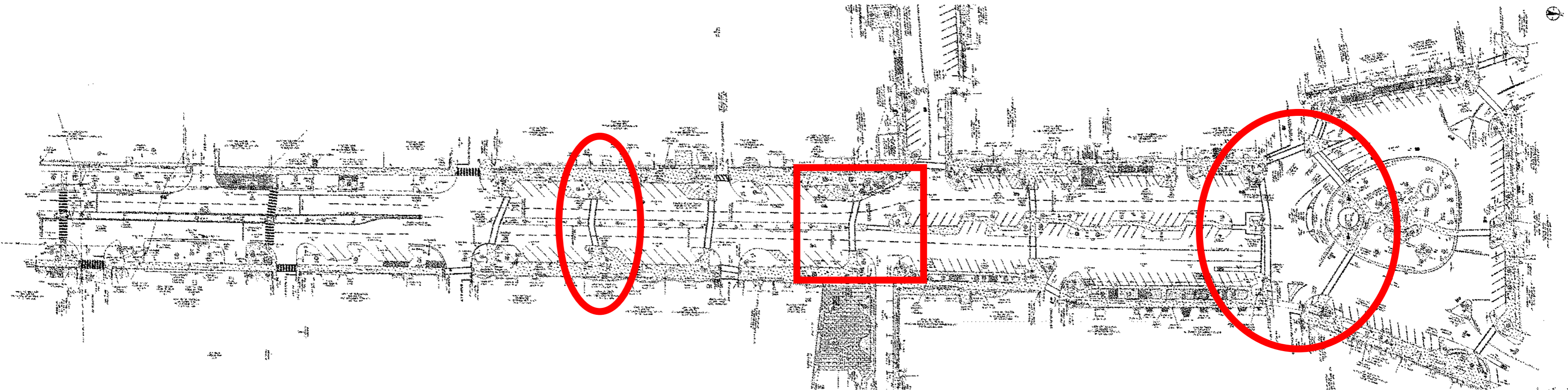
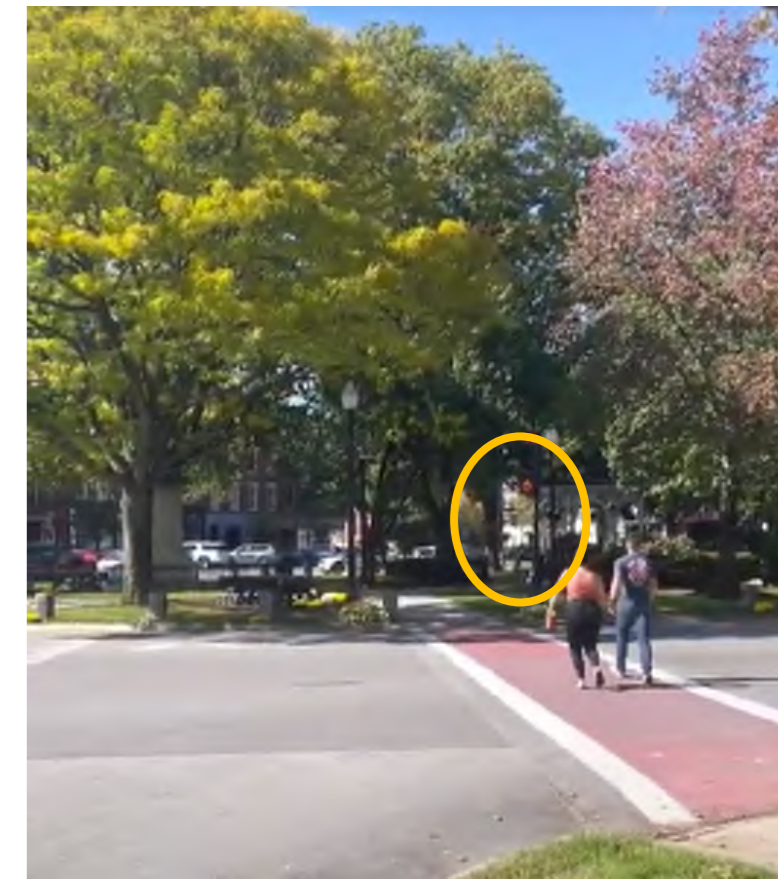
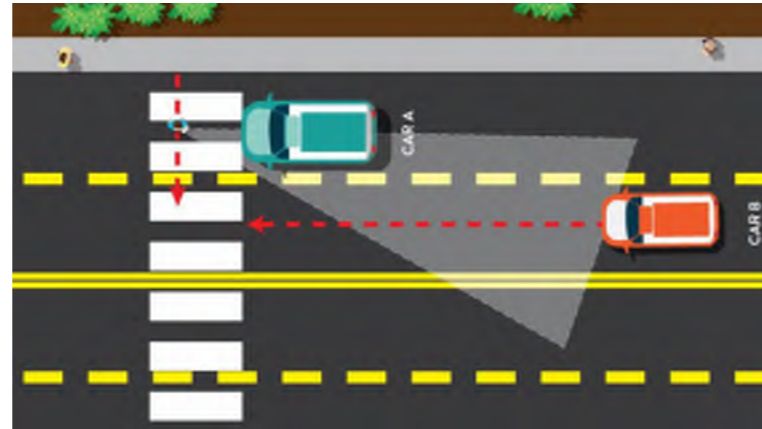
ISSUES AND CONCERNS

- Infrastructure Replacement
 - Water
 - Sewer
 - Drainage
 - Electrical



KEENE DOWNTOWN IMPROVEMENTS ISSUES AND CONCERNS

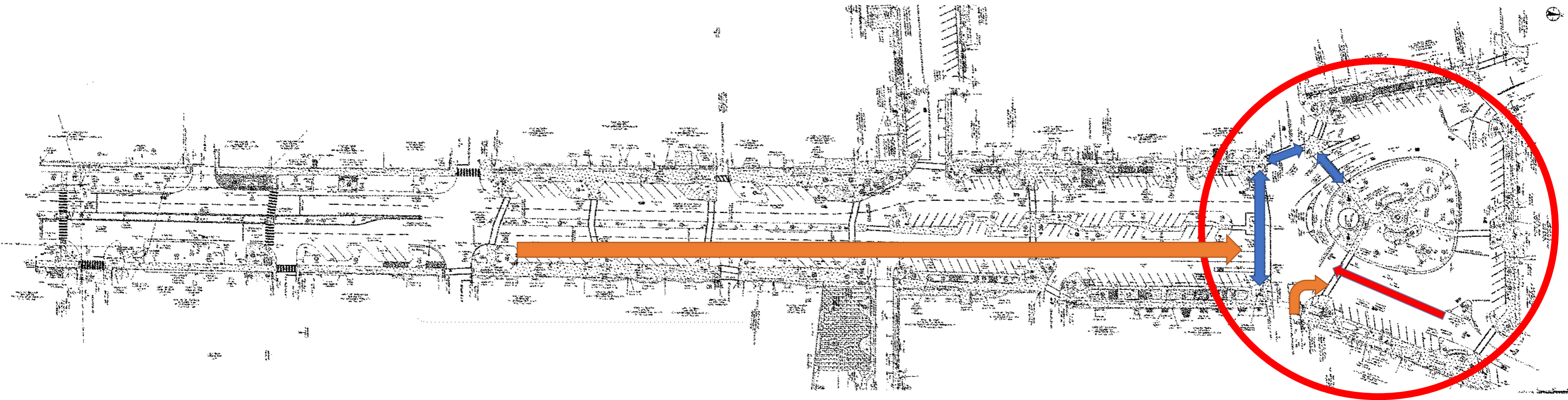
- Crosswalk Safety
 - Mid-Block Crossings
 - Excessive Length
 - Poor Lighting
 - Double Threat



KEENE DOWNTOWN IMPROVEMENTS

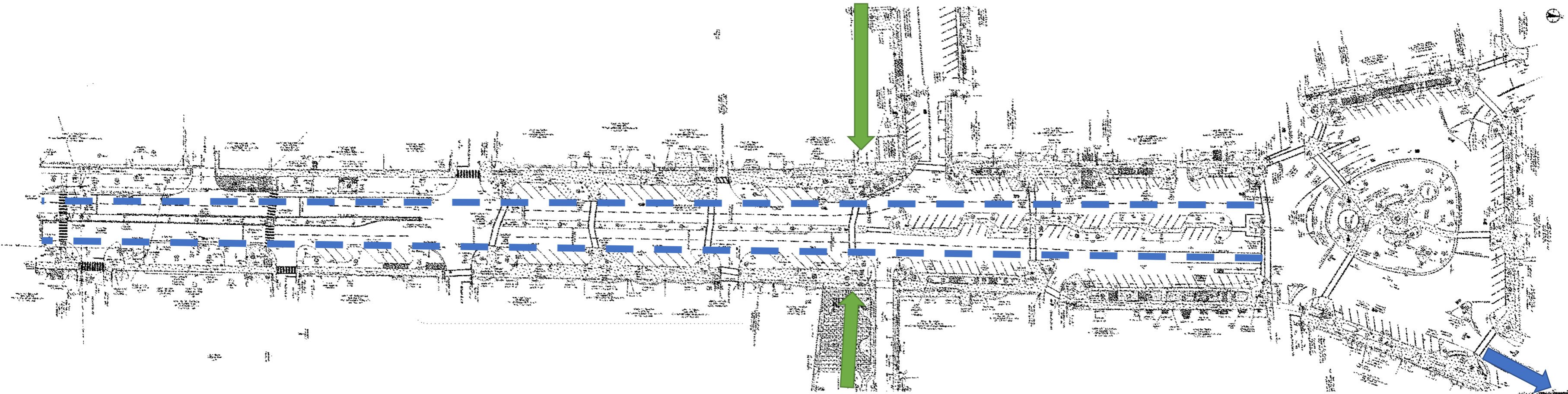
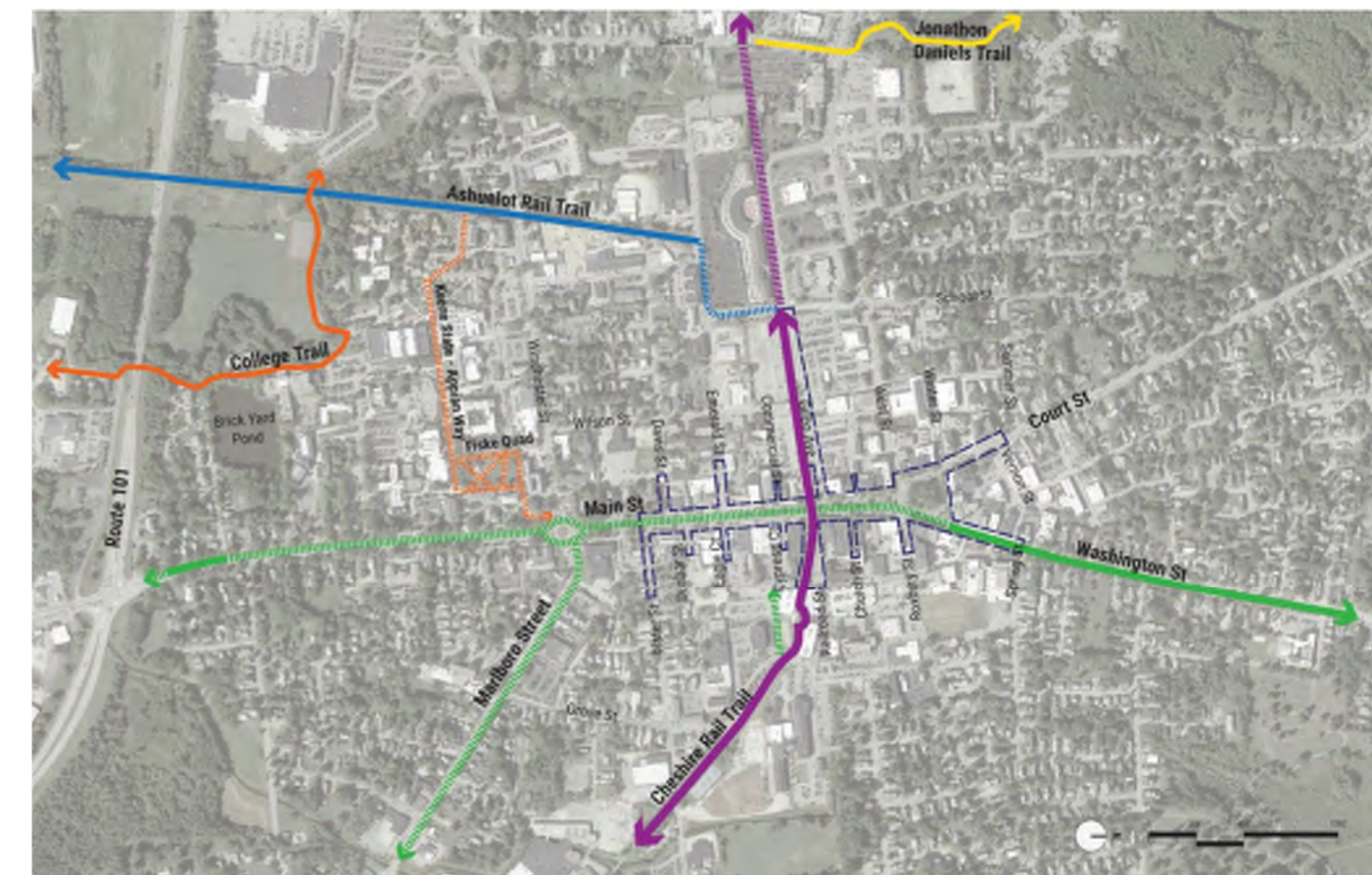
ISSUES AND CONCERNS

- Traffic Operations
 - Main Street Queues
 - Lack of Lane Definition
 - Traffic Signal Timing
 - Emergency Vehicle Access



KEENE DOWNTOWN IMPROVEMENTS ISSUES AND CONCERNS

- Bicycle Facilities
 - Safe Bike Access
 - Bike Storage/Parking
 - Trail/Path Connectivity



KEENE DOWNTOWN IMPROVEMENTS ISSUES AND CONCERNS

- Tree Study
 - 156 trees evaluated
 - 74% are Mature Trees
 - 12% in Poor Condition

TREE SPECIES IDENTIFIED

Genus	Species	Common Name	Count	% Distribution Total
Acer	<i>negundo</i>	Maple-Boxelder	1	1%
	<i>platanoides</i>	Maple-Norway	4	3%
	<i>rubrum</i>	Maple-Red	9	6%
	<i>saccharum</i>	Maple-Sugar	3	2%
	<i>x.fresmanii</i>	Maple-Freeman's	5	3%
Acer Total			22	14%
<i>Celtis</i>	<i>occidentalis</i>	Hackberry	1	1%
<i>Cercis</i>	<i>canadensis</i>	Redbud-Eastern	3	2%
<i>Chamaecyparis</i>	<i>nootkatensis</i>	Falsecypress-Nootka	1	1%
<i>Cladrastis</i>	<i>kentuckia</i>	Yellowwood	1	1%
<i>Crataegus</i>	sp.	Hawthorn	1	1%
<i>Fraxinus</i>	<i>pennsylvanica</i>	Ash-Green	18	12%
<i>Ginkgo</i>	<i>biloba</i>	Ginkgo	5	3%
<i>Gleditsia</i>	<i>triacanthos</i>	Honeylocust-Common	8	5%
<i>Koeleruteria</i>	<i>paniculata</i>	Goldenraintree-Fanctied	1	1%
<i>Malus</i>	sp.	Crabapple	7	4%
<i>Prunus</i>	<i>serrulata</i>	Cherry-Flowering	1	1%
<i>Pyrus</i>	<i>calleryana</i>	Pear-Gallery	19	12%
<i>Quercus</i>	<i>palustris</i>	Oak-Pin	24	15%
<i>Quercus</i>	<i>rubra</i>	Oak-Northern Red	9	6%
Quercus Total			33	21%
<i>Stewartia</i>	<i>pseudocamellia</i>	Stewartia-Japanese	1	1%
<i>Syringa</i>	<i>reticulata</i>	Lilac-Japanese Tree	2	1%
<i>Tilia</i>	<i>cordata</i>	Linden-Littleleaf	13	8%
<i>Ulmus</i>	<i>americana</i>	Elm-American	4	3%
<i>Zelkova</i>	<i>serrata</i>	Zelkova-Japanese	15	10%
Grand Total			156	100%



TREES BY CONDITION CLASS

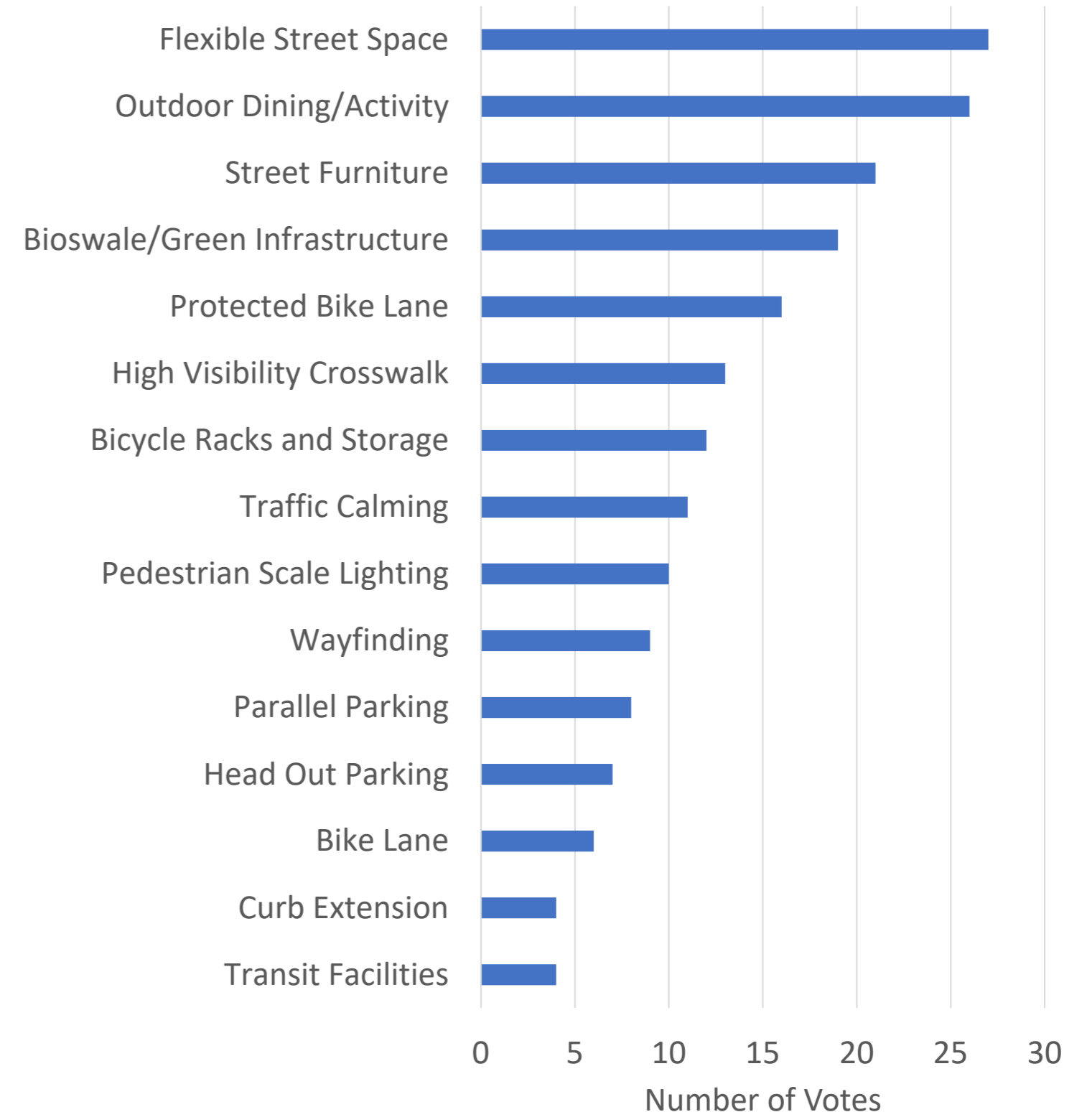
- GOOD CONDITION
- FAIR CONDITION
- POOR CONDITION

KEENE DOWNTOWN IMPROVEMENTS

PUBLIC INPUT

1. Placemaking and wayfinding is lacking in Downtown
2. Downtown does not always feel comfortable for people walking/rolling and biking
3. Expand low-impact development/green infrastructure
4. Car facilities are needed, but need to reduce and streamline
5. Infrastructure upgrades are needed
6. Expand opportunities for Downtown activities
7. Incorporate art and history into the new design

What elements would you like to see on Main Street?



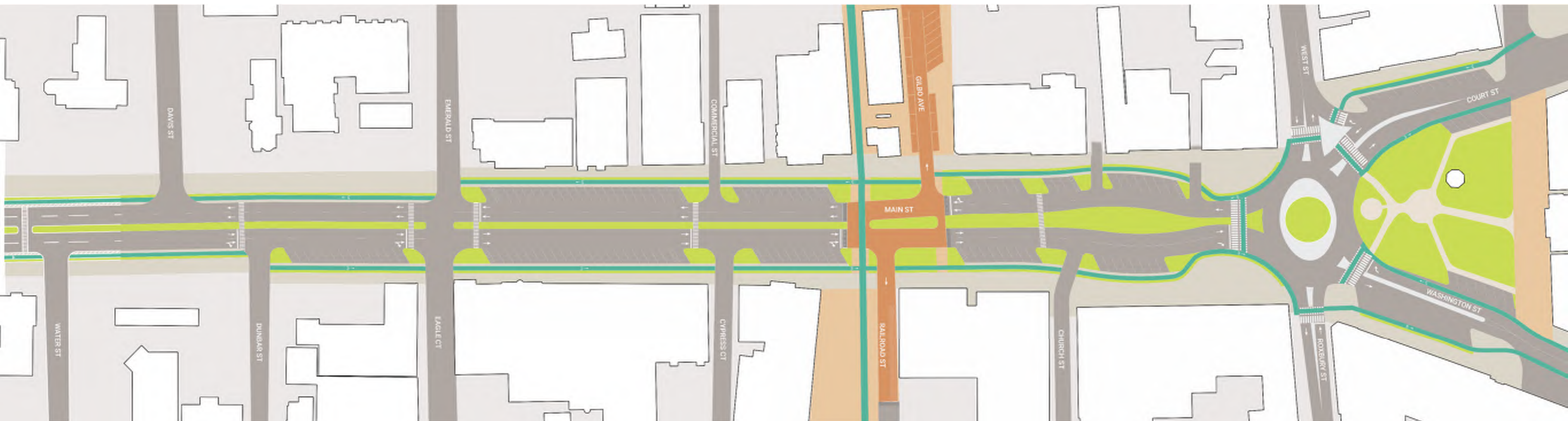
KEENE DOWNTOWN IMPROVEMENTS STEERING COMMITTEE CONSIDERATIONS

Preliminary Design – Key Committee Takeaways

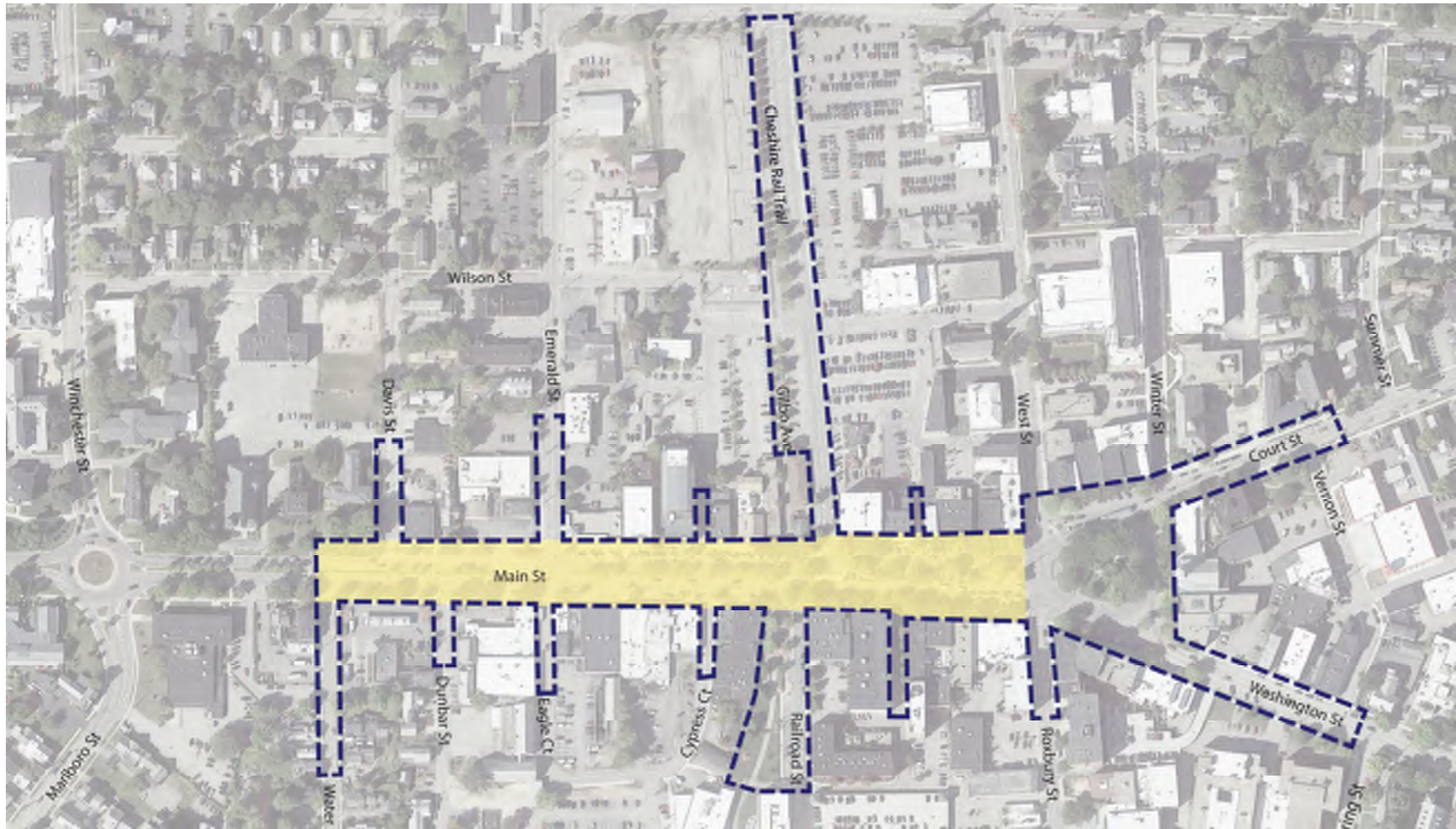
- Main Street Design
 - Multimodal Corridor
 - Protected Bike Lanes
 - Angled Parking
 - Multi-Lane Operation
- Central Square
 - Roundabout Intersection
 - Expansion of Common
- Gilbo/Railroad Square
 - One-way Operation
 - Raised Intersection



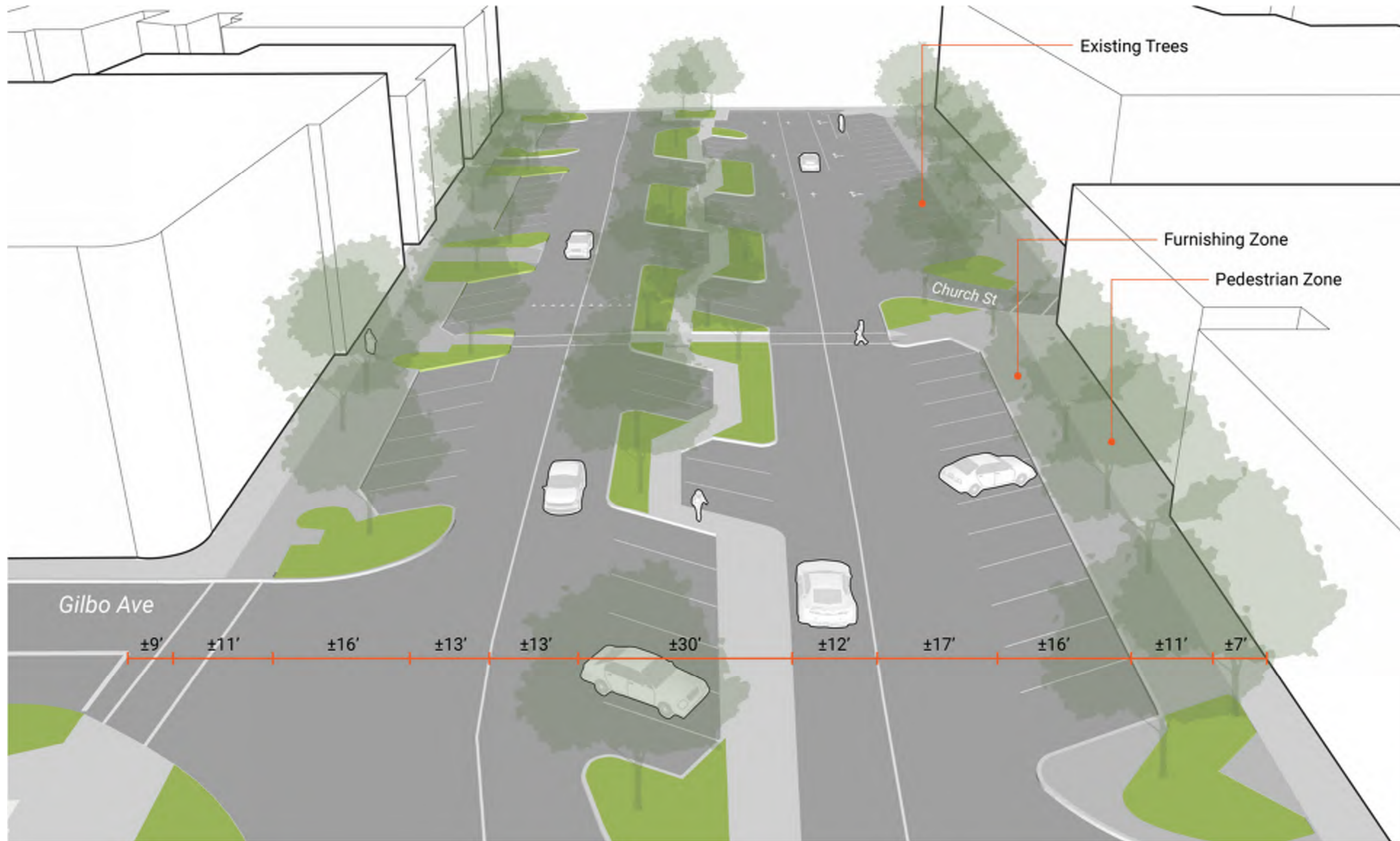
KEENE DOWNTOWN IMPROVEMENTS OVERALL PRELIMINARY SITE PLAN



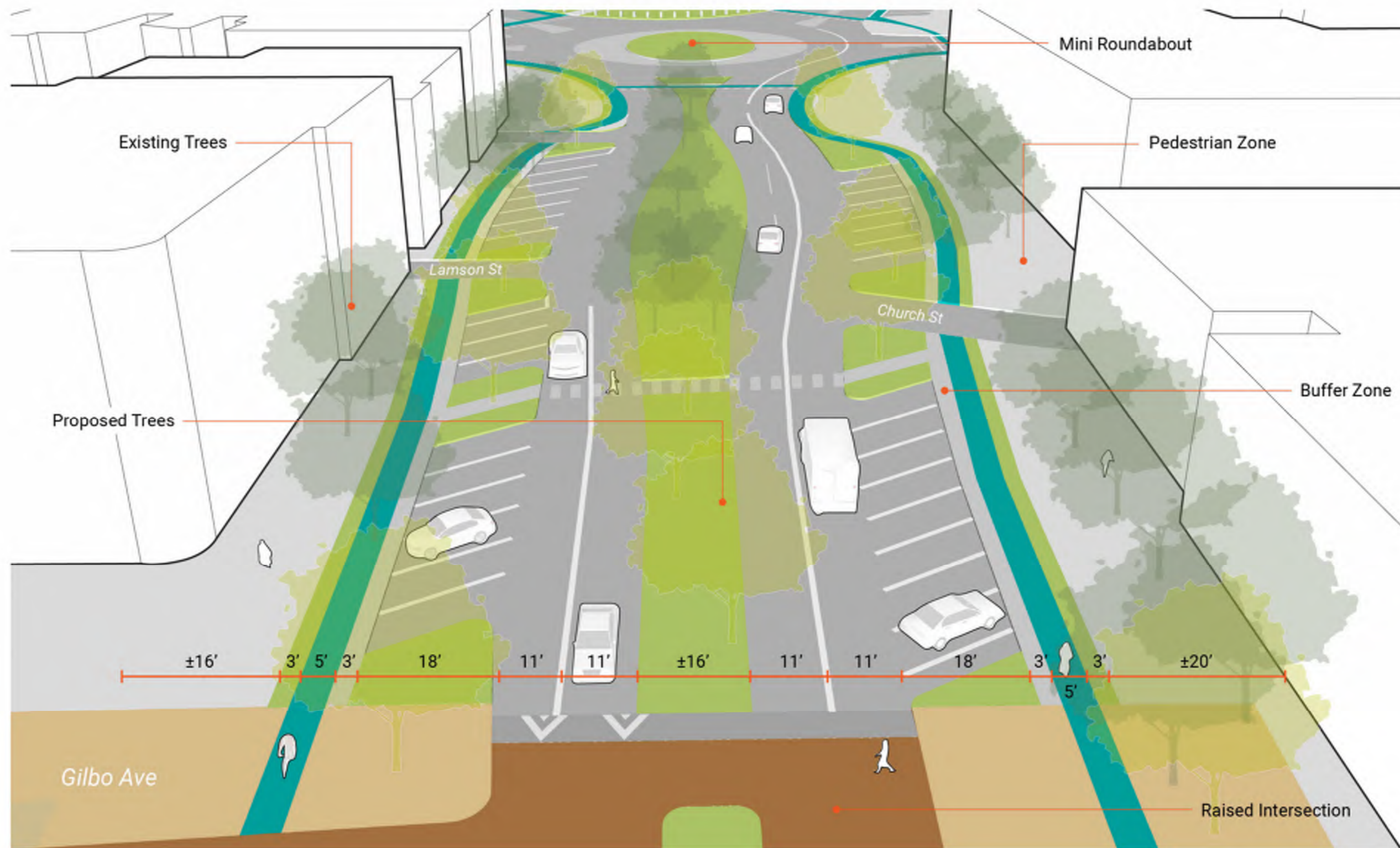
CHARACTER AREA | MAIN STREET *Vibrant / Charming / Inclusive / Welcoming/ Multi-Modal*



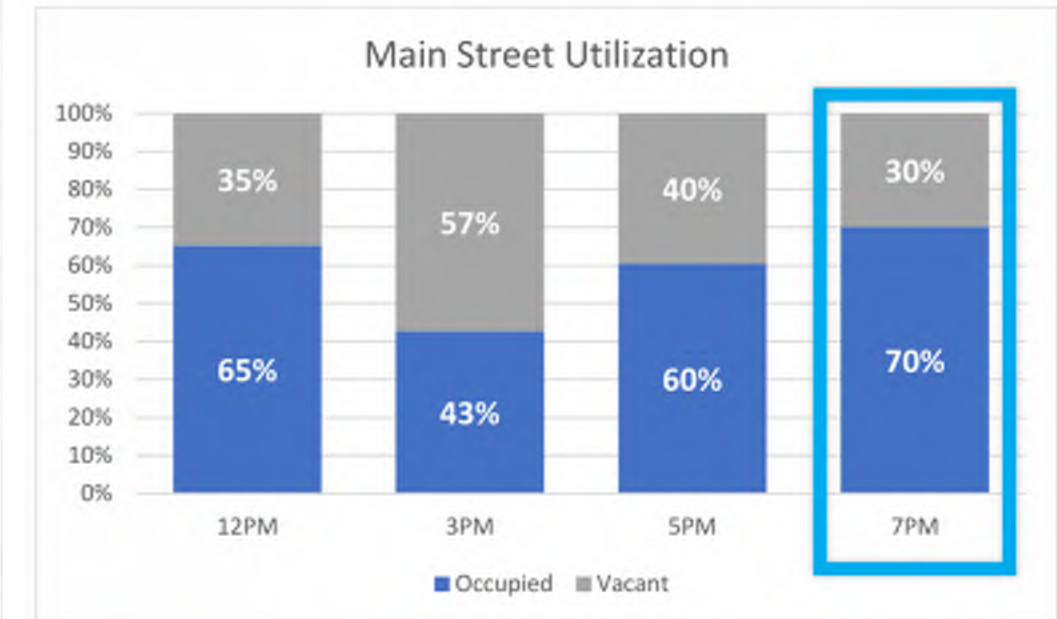
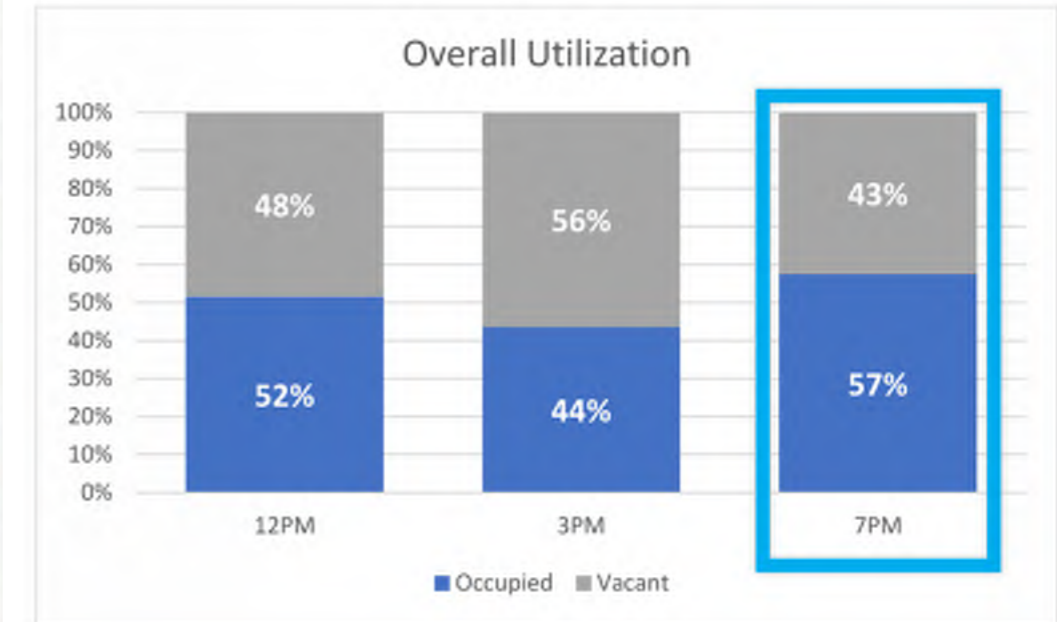
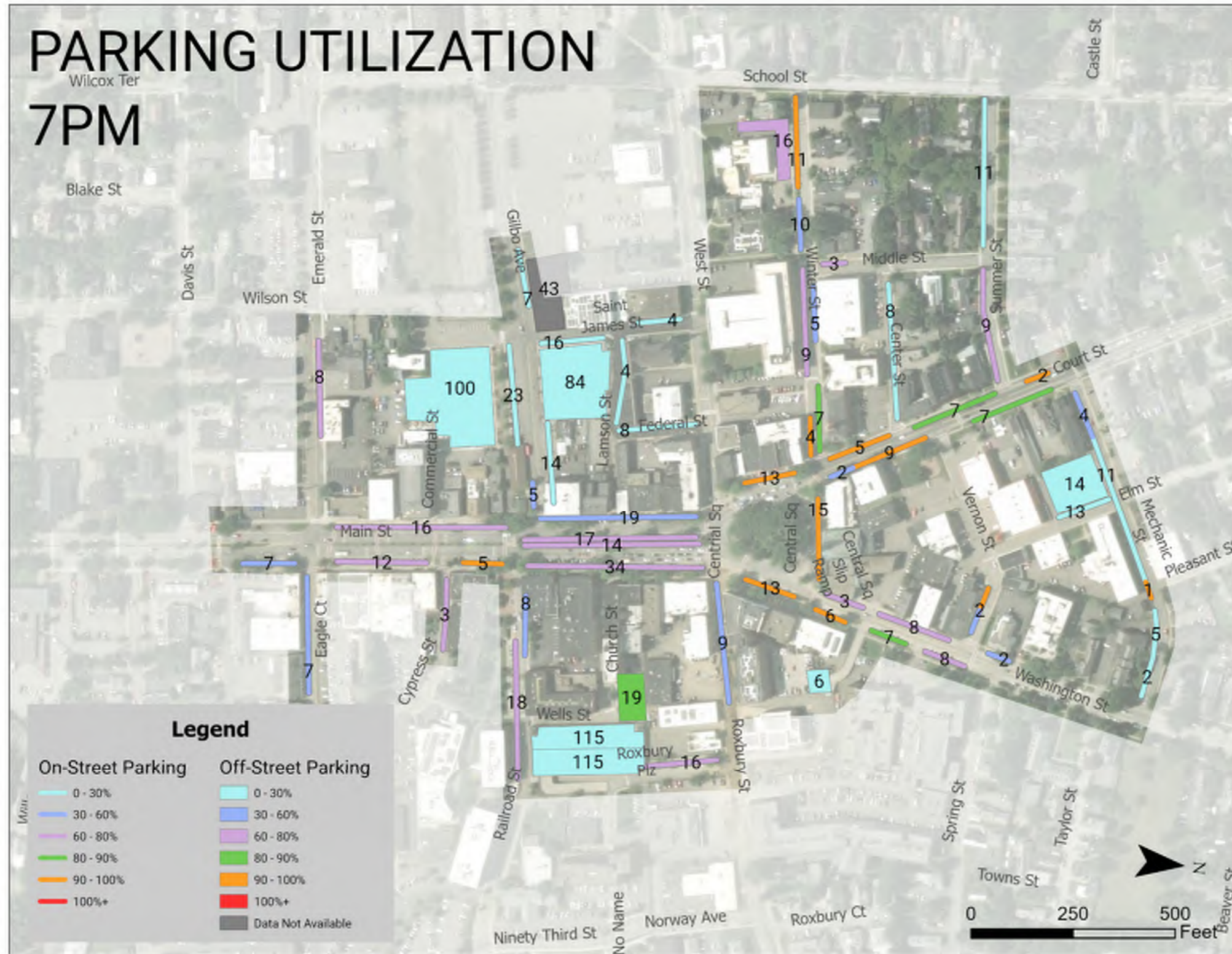
KEENE DOWNTOWN IMPROVEMENTS EXISTING PERSPECTIVE SECTION | MAIN STREET



KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | MAIN STREET



KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | MAIN STREET PARKING



Counts conducted on 10/06/2022; includes spaces reserved for handicapped users. Full utilization counts not available for 5PM.

KEENE DOWNTOWN IMPROVEMENTS

PRELIMINARY DESIGN | DOWNTOWN PARKING

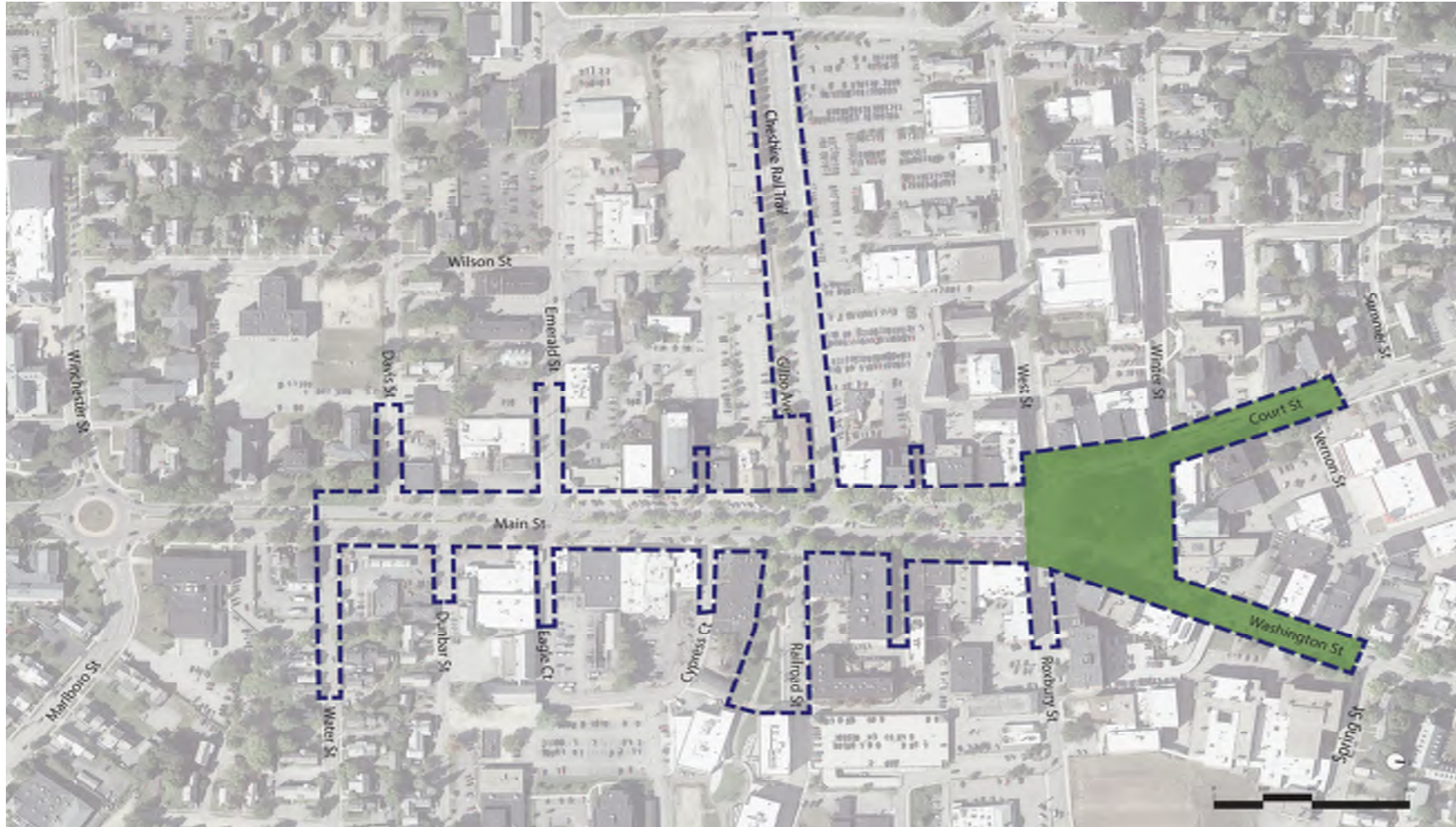
	EXISTING CONDITION			PROPOSED ROUNDABOUT			Field Counts	12PM Counts	7PM Counts	12PM Util	7PM Util
	# of Parking Spaces Standard	HC	Sidewalk Width (Ft)	# of Parking Spaces Standard	HC	Sidewalk Width (Ft)					
MAIN ST - NORTHBOUND											
Median	14	0					14	3	10	21%	71%
Water St to Dunbar St	0	0	8	0	0	8	0	0	0		
Dunbar St to Eagle Ct	7	0	8.5	14	0	8.5	7	6	3	86%	43%
Eagle Ct to Cypress St	10	2	16-18	19	2	16-18	12	11	9	92%	75%
Cypress St to Railroad St	4	1	16-22	8	1	16-22	5	4	5	80%	100%
Railroad St to Church St	12	1	21-28	12	1	11-17	33	18	25	55%	76%
Church St to Roxbury St	20	0	25-26	8	0	32-54					
NB TOTAL:	67	4		61	4		71	42	52	59%	73%
MAIN ST - SOUTHBOUND											
Median	17	0					17	12	13	71%	76%
Davis St to Emerald St	0	0	8-9	0	0	23-24	0	0	0		
Emerald St to Commercial St	9	2	17-20	19	2	12-14	16	12	12	75%	75%
Commercial St to Gilbo Ave	4	1	15-24	9	1	15-27					
Gilbo Ave to Lamson St	8	1	20-21	8	1	19-21	20	15	10	75%	50%
Lamson St to Drive	5	1	19-21	6	1	16-26					
Drive to West St	5	0	20-21	0	0	33					
SB TOTAL:	48	5		42	5		53	39	35	74%	66%
CENTRAL SQUARE	41	2		38	2		43	38	40	88%	93%
CS TOTAL:	41	2		38	2						
TOTAL:	156	11		141	11		167	119	127	71%	76%
				-15	*		**	71%	76%		



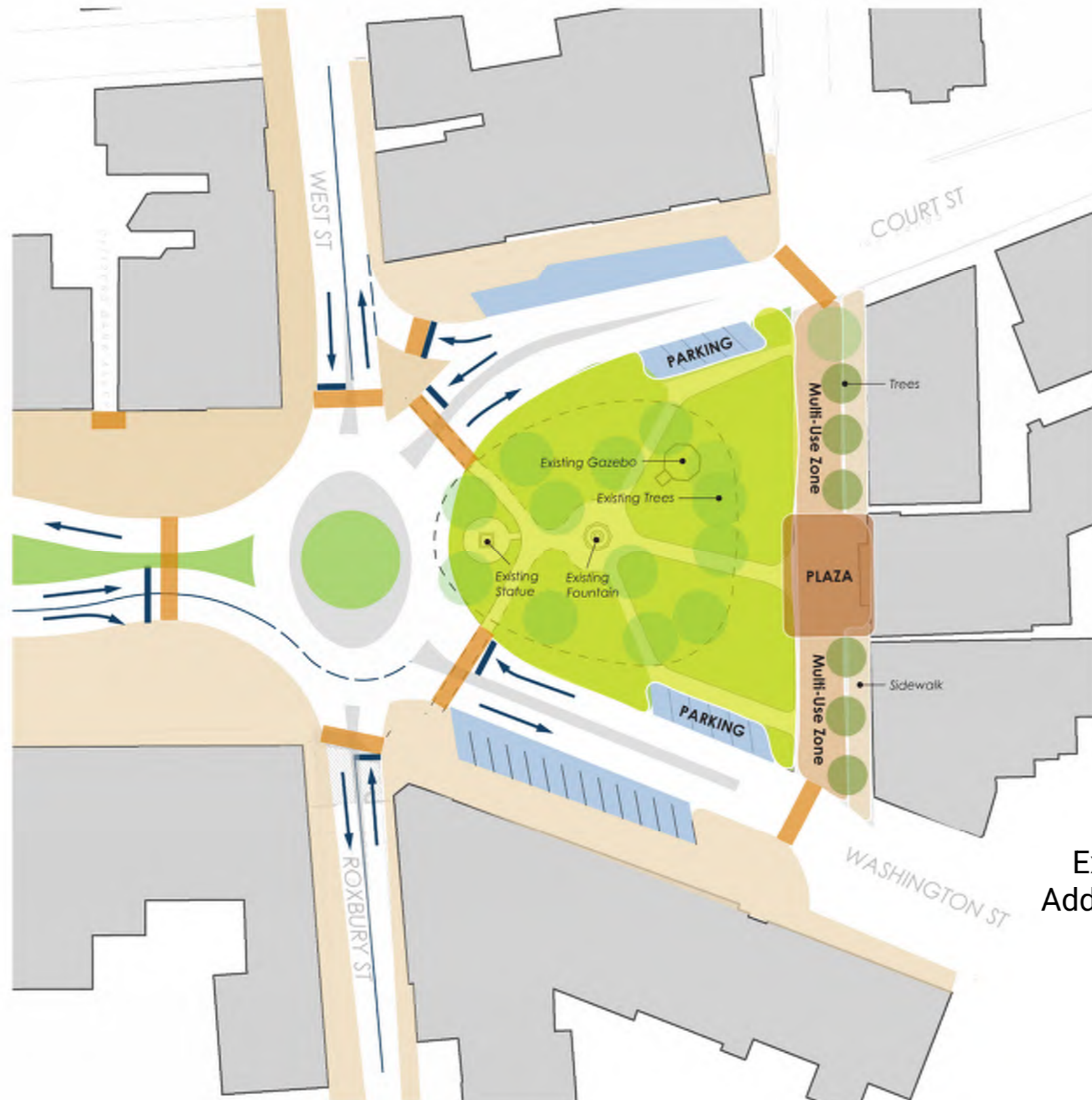
* Proposed Parking Count does not include opportunities to add parking to locations outside of the project area

** Total spaces include HC spaces

CHARACTER AREA | **CENTRAL SQUARE** *Civic / Formal / Village Center*



KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | CENTRAL SQUARE PLAN



Existing Open Space – 17,450 SF
Additional Open Space – 13,950 SF
TOTAL – 31,400 SF

KEENE DOWNTOWN IMPROVEMENTS

PRELIMINARY DESIGN | CENTRAL SQUARE SECTIONS

Existing



Proposed



-Maintain Statue, Gazebo, Water Feature and Open Space

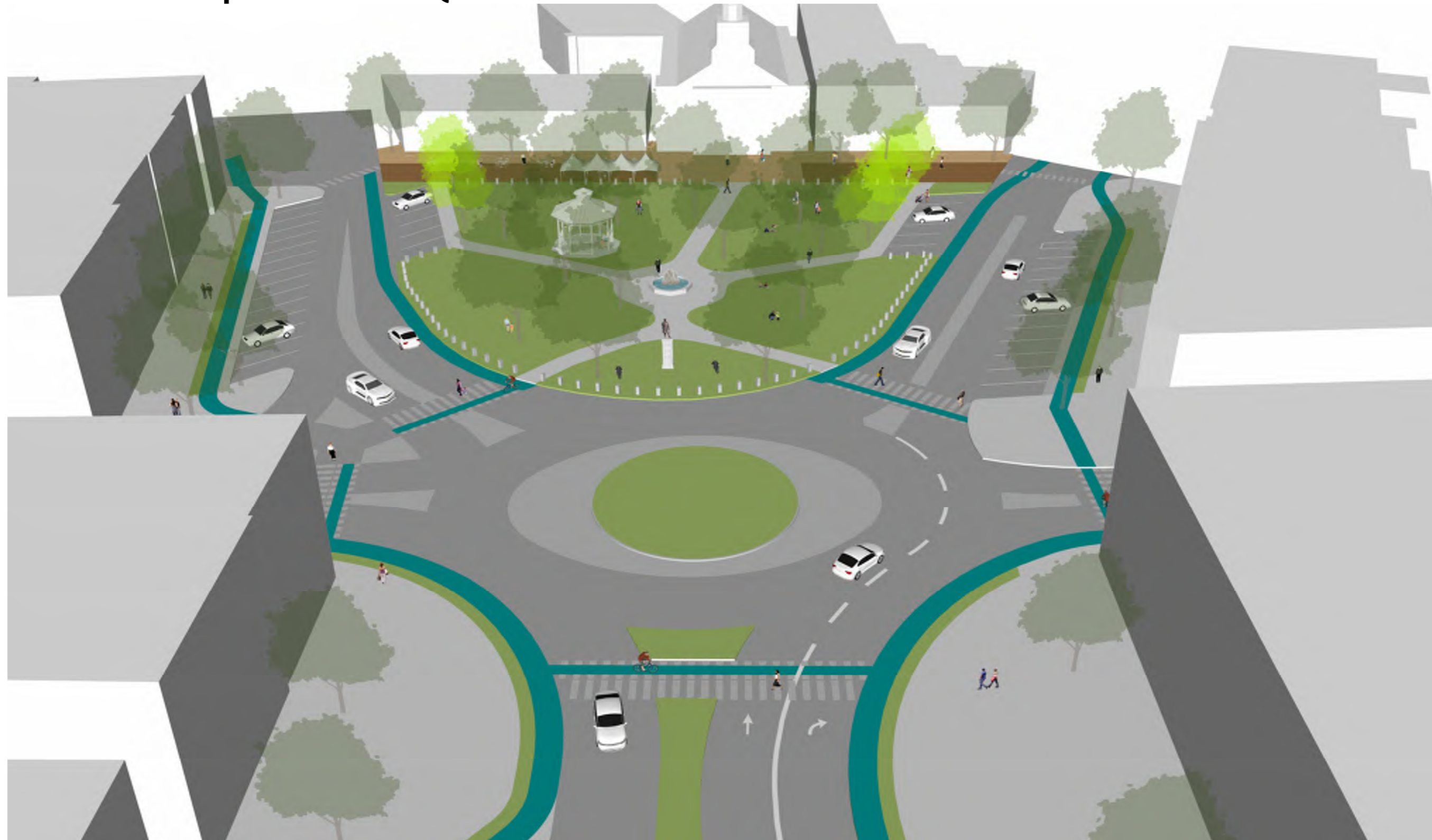
Programming
- Outdoor dining
- Farmer's / Holiday Market

-Improve sidewalk accessibility

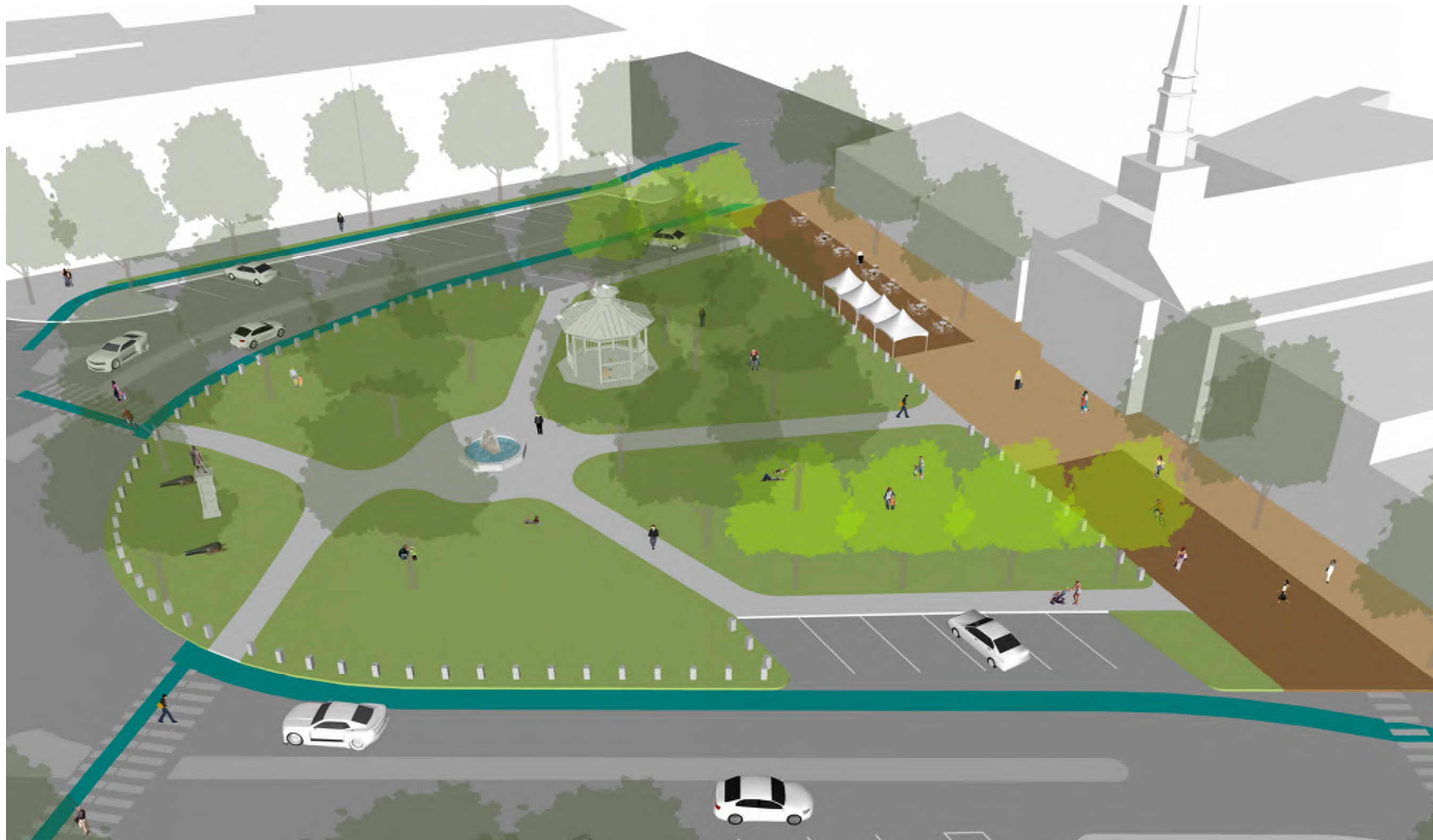
KEENE DOWNTOWN IMPROVEMENTS EXISTING PERSPECTIVE SECTION | CENTRAL SQUARE



KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | CENTRAL SQUARE



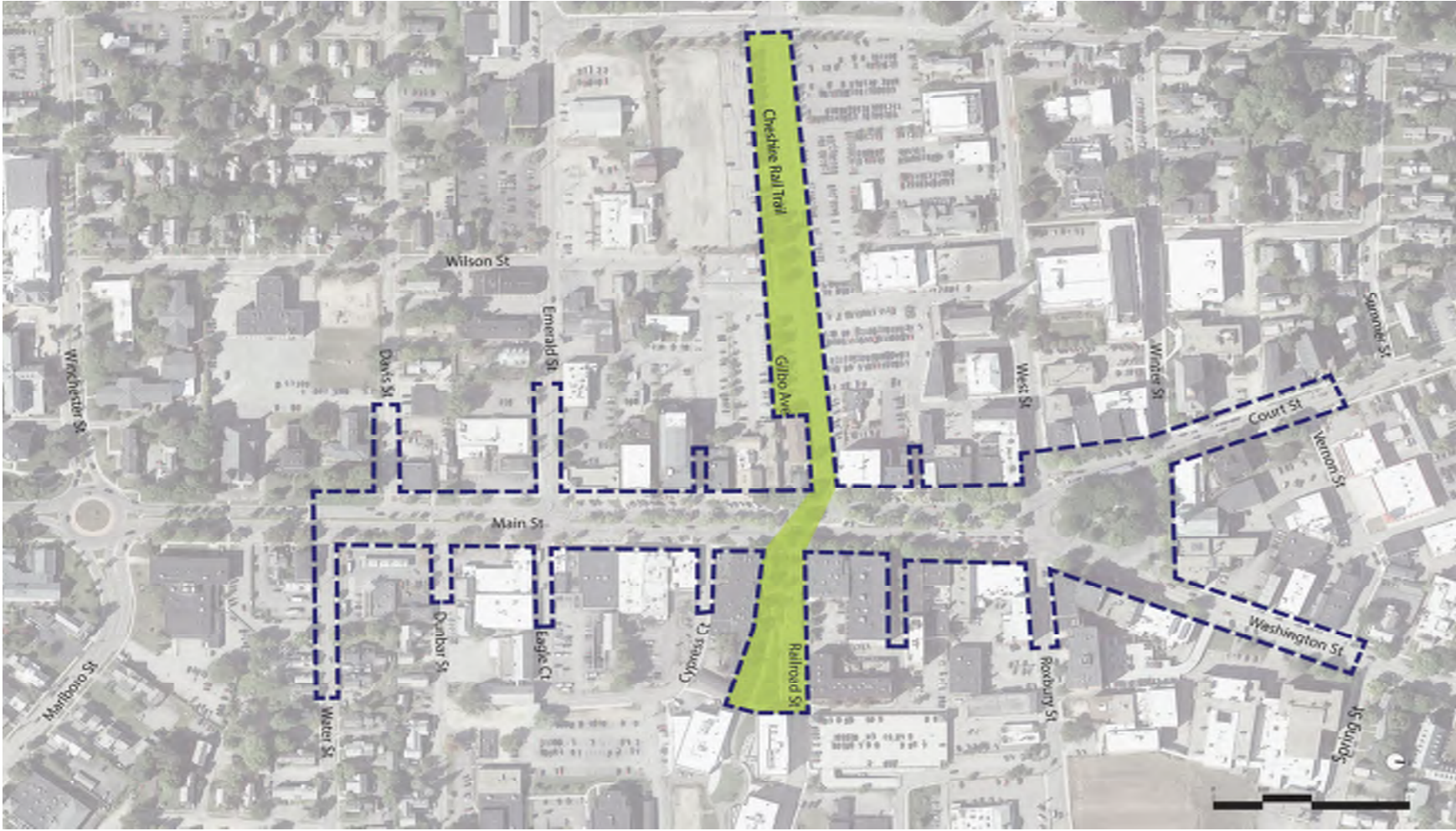
KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | CENTRAL SQUARE



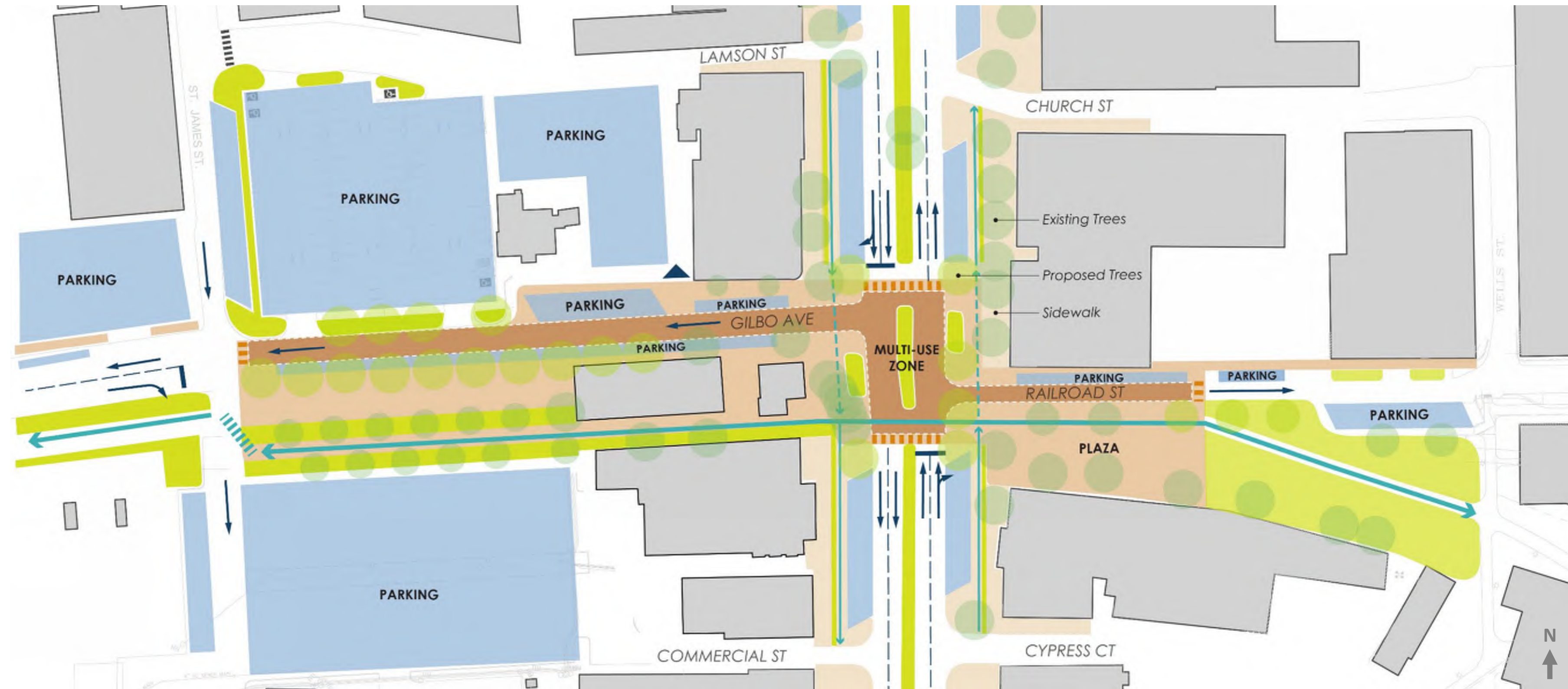
KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | CENTRAL SQUARE



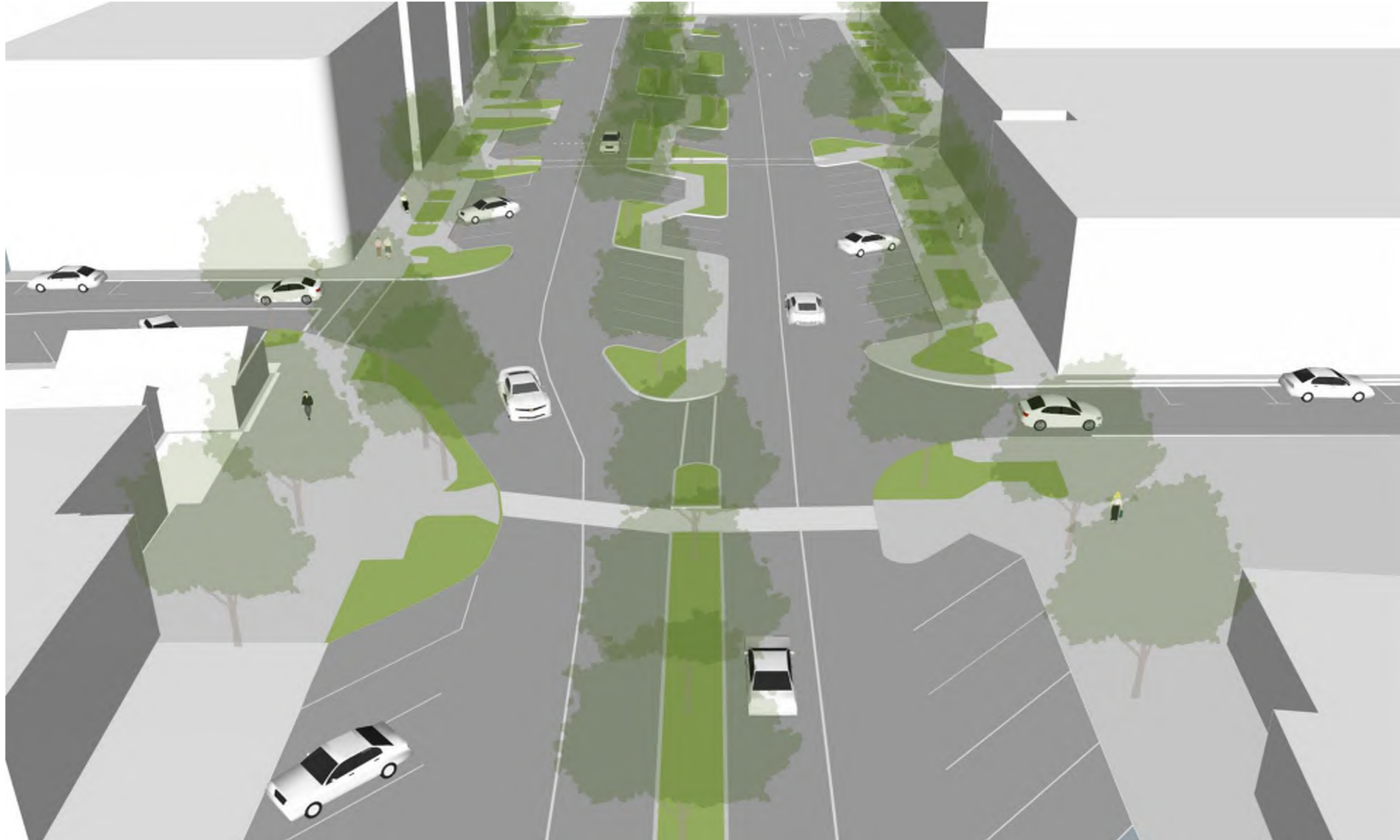
CHARACTER AREA | GILBO+RAILROAD *Artistic / Festive / Flexible / Historic*



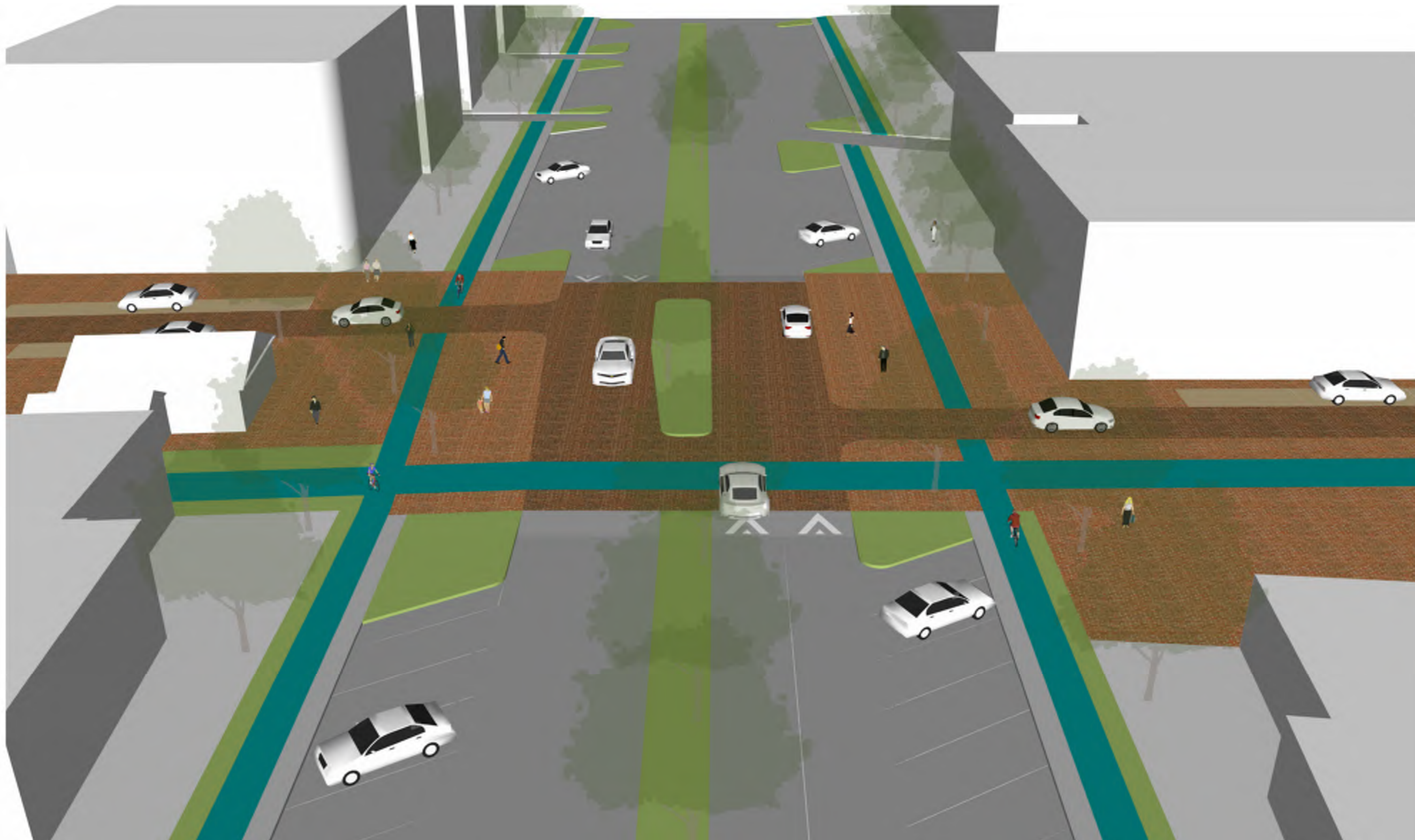
KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | GILBO AVE / RAILROAD ST



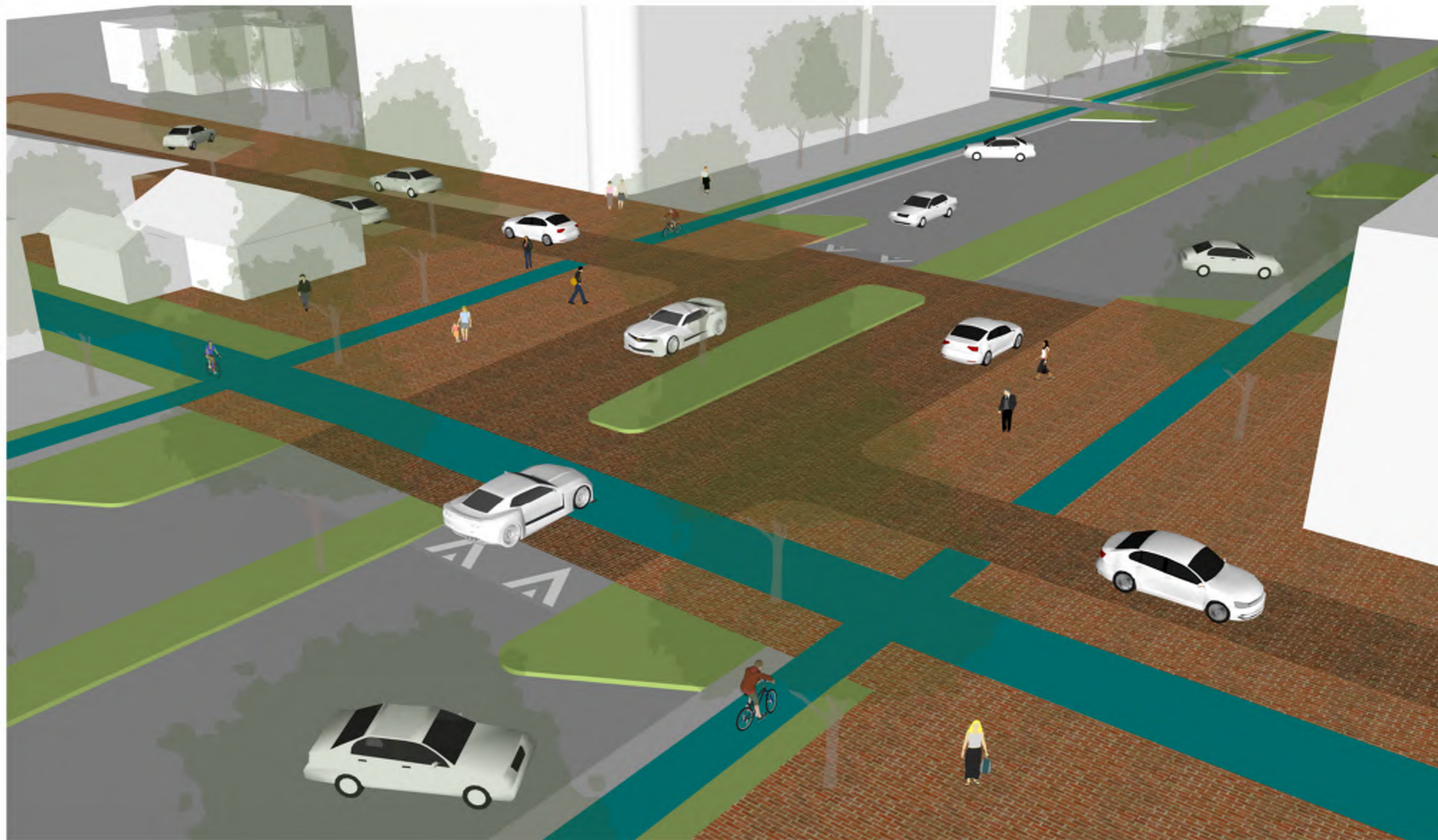
KEENE DOWNTOWN IMPROVEMENTS EXISTING PERSPECTIVE VIEW | GILBO AVE / RAILROAD ST



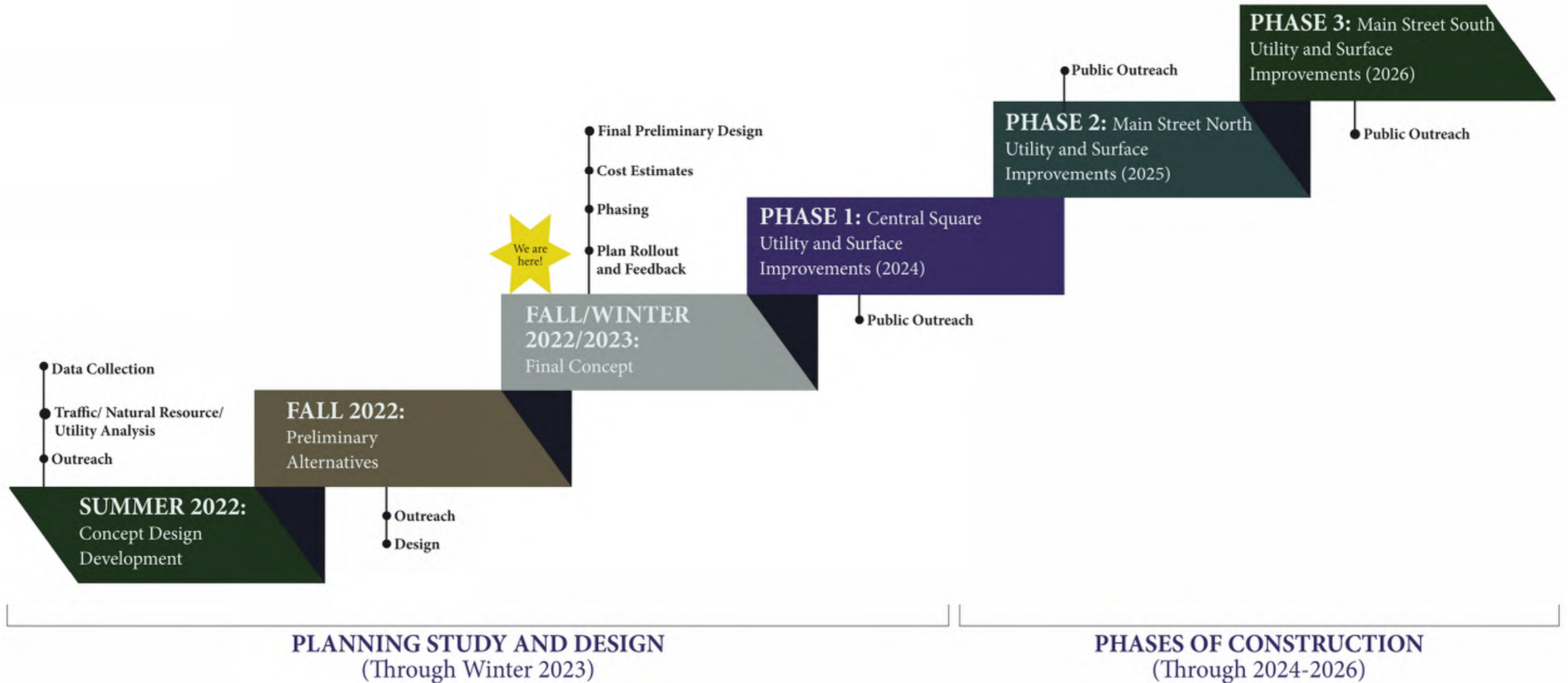
KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | GILBO AVE / RAILROAD ST



KEENE DOWNTOWN IMPROVEMENTS PRELIMINARY DESIGN | GILBO AVE / RAILROAD ST



KEENE DOWNTOWN IMPROVEMENTS PROJECT SCHEDULE



KEENE DOWNTOWN IMPROVEMENTS INFORMATIONAL MEETING FEEDBACK

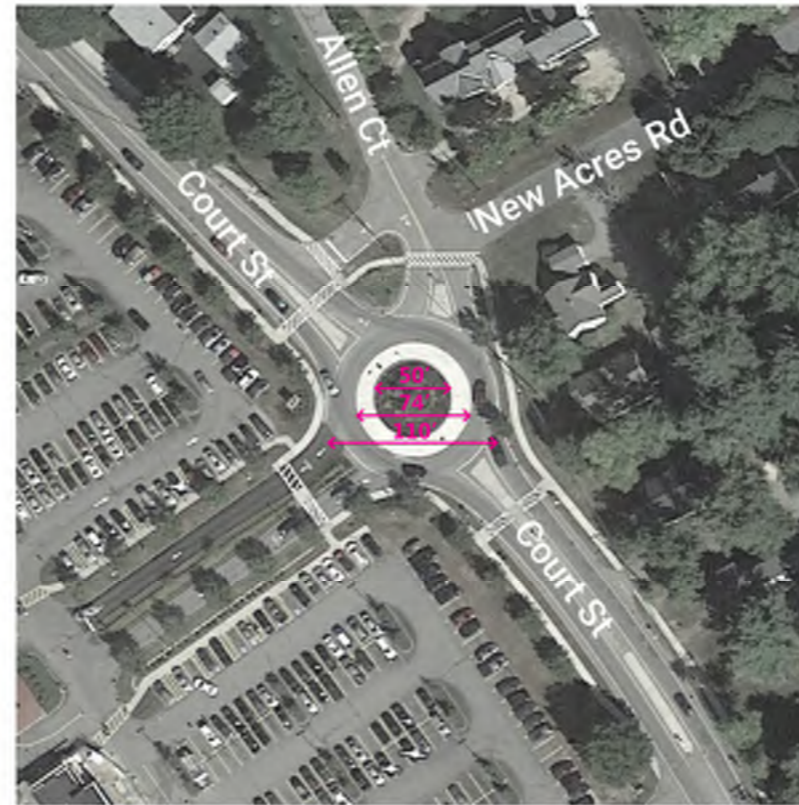
- Pedestrian Safety in Roundabouts
- Emergency Vehicles in Roundabouts
- Bike Safety/Use on Sidewalks
- Project Constructability



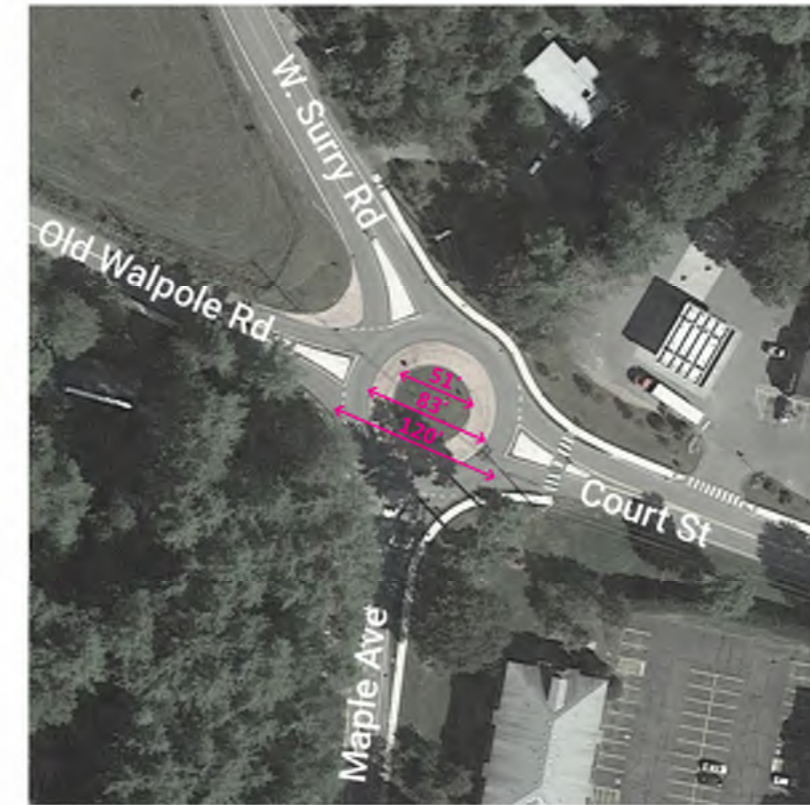
KEENE DOWNTOWN IMPROVEMENTS INFORMATIONAL MEETING FEEDBACK



Main Street and Winchester St / Marlboro St

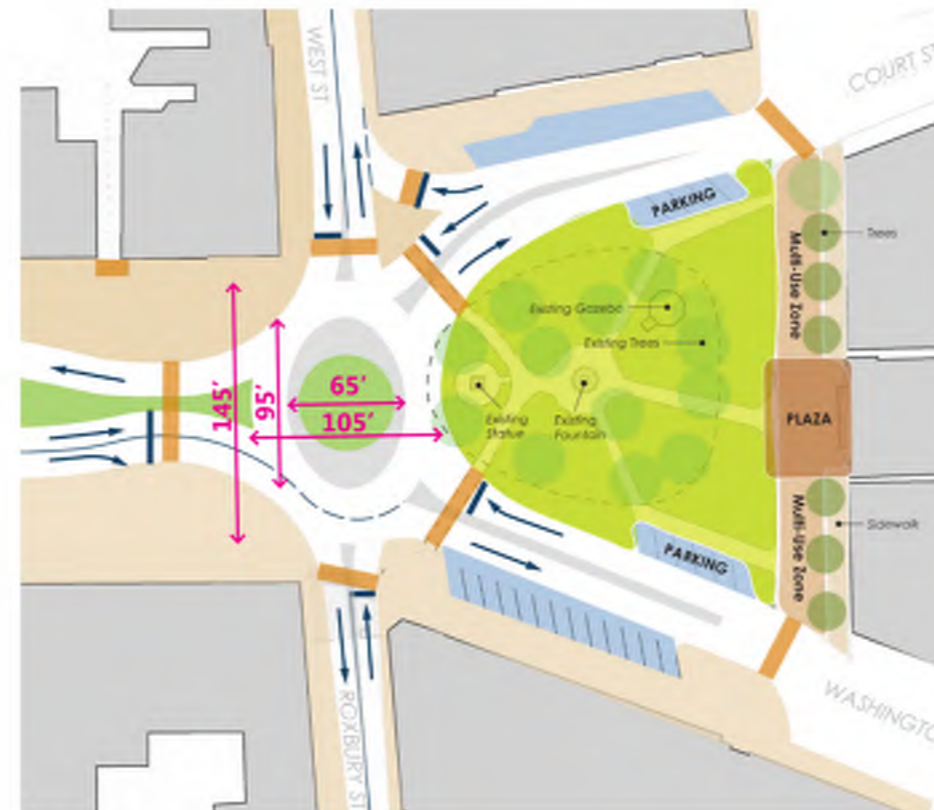


Court Street and New Acres Road



Court Street and Maple Ave

- Roundabout Safety Concerns
 - Size compared to others
 - Geometric shape
 - Pedestrian safety
 - Emergency vehicle access



KEENE DOWNTOWN IMPROVEMENTS INFORMATIONAL MEETING FEEDBACK

- Pedestrian Safety in Roundabouts
 - Reduced Conflict Points
 - Advantages/Disadvantages
 - Crossing Solutions

CROSSING SOLUTIONS

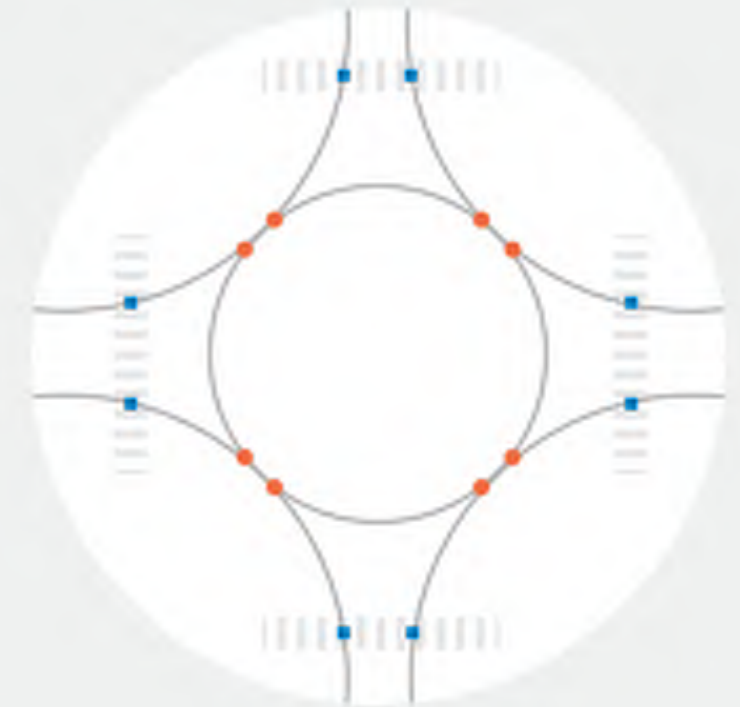
NCHRP Report 834, *Crossing Solutions at Roundabouts and Channelized Turn Lanes for Pedestrians with Vision Disabilities (5)* provides four major types of crosswalk treatments to limit the risk experienced by pedestrians with visual impairments: (A) standard pedestrian signal, (B) pedestrian hybrid beacon (PHB), pedestrian activated warning device, such as (C) rectangular rapid flashing beacon (RRFB), and (D) a raised crosswalk (RCW).



FIGURE 1-5: POTENTIAL CONFLICT POINTS WITHIN AN INTERSECTION

SINGLE-LANE ROUNDABOUT

- Vehicle-to-Vehicle Conflict Points
- Vehicle-to-Pedestrian Conflict Points



ADVANTAGES

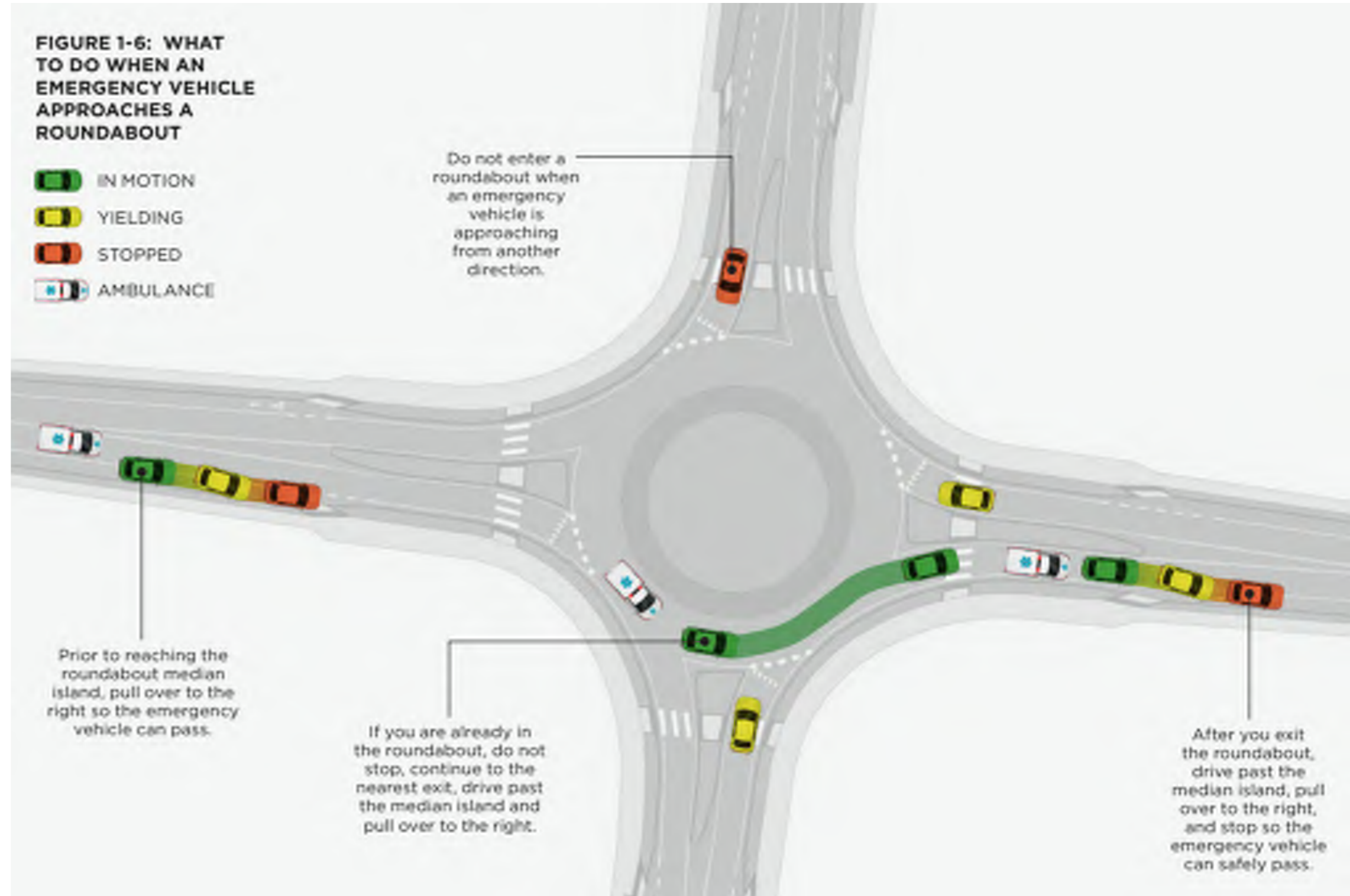
NON-MOTORIZED USERS

- People walking must cross only one direction of traffic at a time and are able to wait in the approach splitter island.
- People biking have the option to negotiate the roundabout in the travel lanes or on a shared-use path, depending on their comfort level.



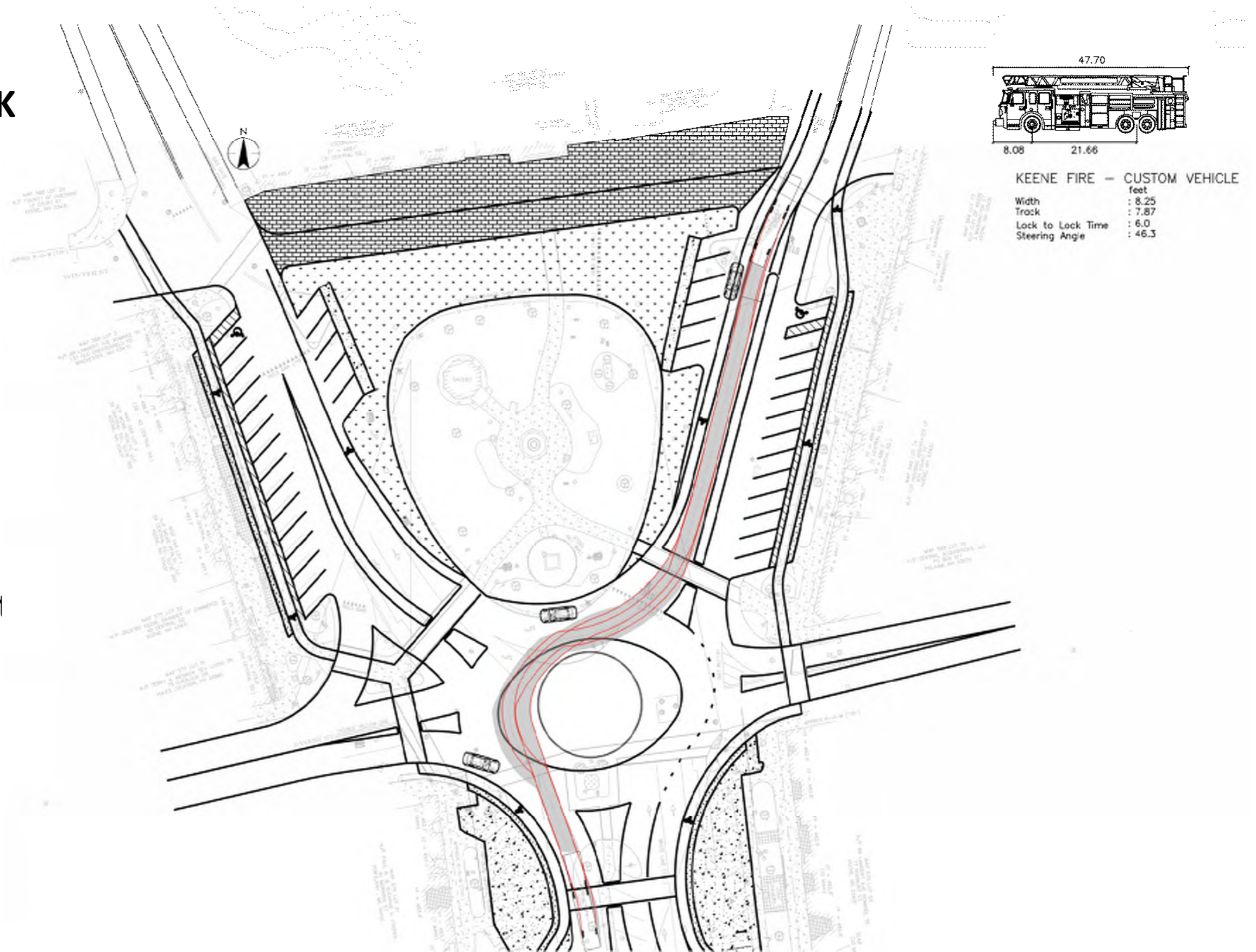
KEENE DOWNTOWN IMPROVEMENTS INFORMATIONAL MEETING FEEDBACK

- How to Yield to Emergency Vehicles in Roundabout
 - If you have not entered the roundabout, pull over to right
 - If you have entered the roundabout, continue to the nearest exist and pull over to right



KEENE DOWNTOWN IMPROVEMENTS INFORMATIONAL MEETING FEEDBACK

- How to Yield to Emergency Vehicles in Roundabout
 - If you have not entered the roundabout, pull over to right
 - If you have entered the roundabout, continue to the nearest exist and pull over to right



KEENE DOWNTOWN IMPROVEMENTS INFORMATIONAL MEETING FEEDBACK

- Bike Safety on Sidewalks
 - Vehicles yield to both pedestrians and bicycles at crosswalks and intersections
 - Pedestrians watch for bicycles when crossing separated bike lanes (from parking spaces)
 - Bikers watch for pedestrians crossing at crosswalks and marked pedestrian crossing areas



KEENE DOWNTOWN IMPROVEMENTS INFORMATIONAL MEETING FEEDBACK

- Pedestrians watch for bicycles when crossing separated bike lanes (from parking spaces)
- Bikers watch for pedestrians crossing at crosswalks and marked pedestrian crossing areas



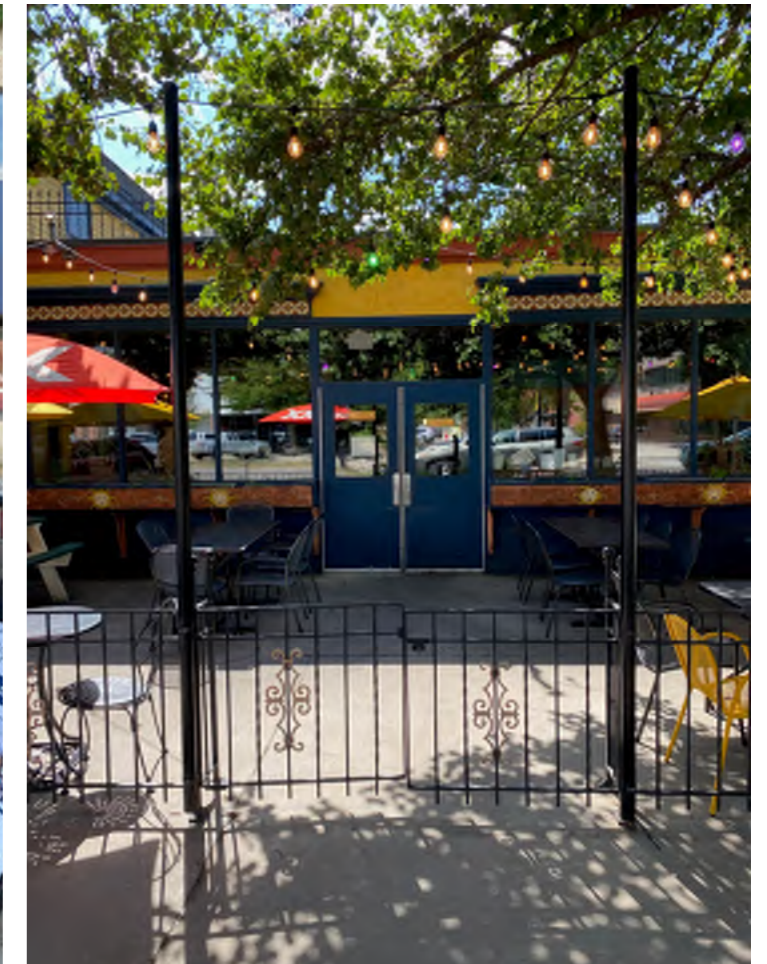
CNU: Public Square. Source: Steve Price



Seattle Bike Blog – 7th Avenue @ Denny Triangle

KEENE DOWNTOWN IMPROVEMENTS INFORMATIONAL MEETING FEEDBACK

- Use of Sidewalk Spaces
 - Current Licensed Use for Sidewalk Commerce
 - New opportunities?
- Universal accessibility
 - Parking
 - Crosswalks
 - Sidewalk Conditions
 - Access to Buildings/Storefronts

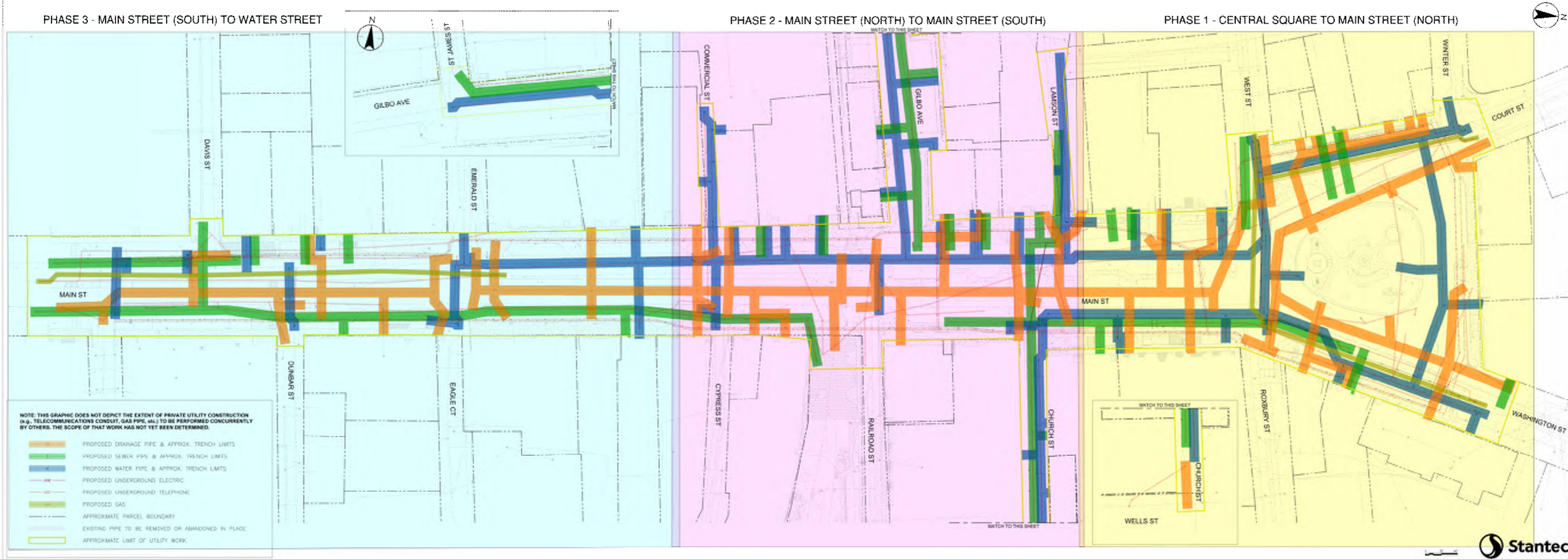


KEENE DOWNTOWN IMPROVEMENTS

INFORMATIONAL MEETING FEEDBACK

Project Phasing (Optional)

- Phase 1: Central Square
- Phase 2: Main Street (North)
- Phase 3: Main Street (South)



KEENE DOWNTOWN IMPROVEMENTS COMMUNITY FEEDBACK SUMMARY

Recurring Comments

Support for Downtown Street Improvements

“I support the traffic calming efforts in Downtown ”

“Support the increased community space at Gilbo Avenue and Railroad Square and the raised table connecting them”

“I am pleased with the pedestrian accessibility improvements”

“Support the increased community space in Central Square”

“Project successfully encourages multimodal transportation”

Concerns with Downtown Changes

“Rotary is too small – should just be a stoplight”

“Concerned that emergency vehicles cannot get through the rotary in a timely manner”

“Not enough parking (including accessible parking in front of businesses”

“Keep Gilbo and Railroad a two-way street”

“Project should only be infrastructure improvements”