# Planning Mission & Goals

PLAN: Newmarket is a guide for predictable and inclusive growth, prioritizing the preservation and enhancement of employment and business opportunities, while creating the framework for 21st Century industry to thrive alongside essential urban industrial businesses.

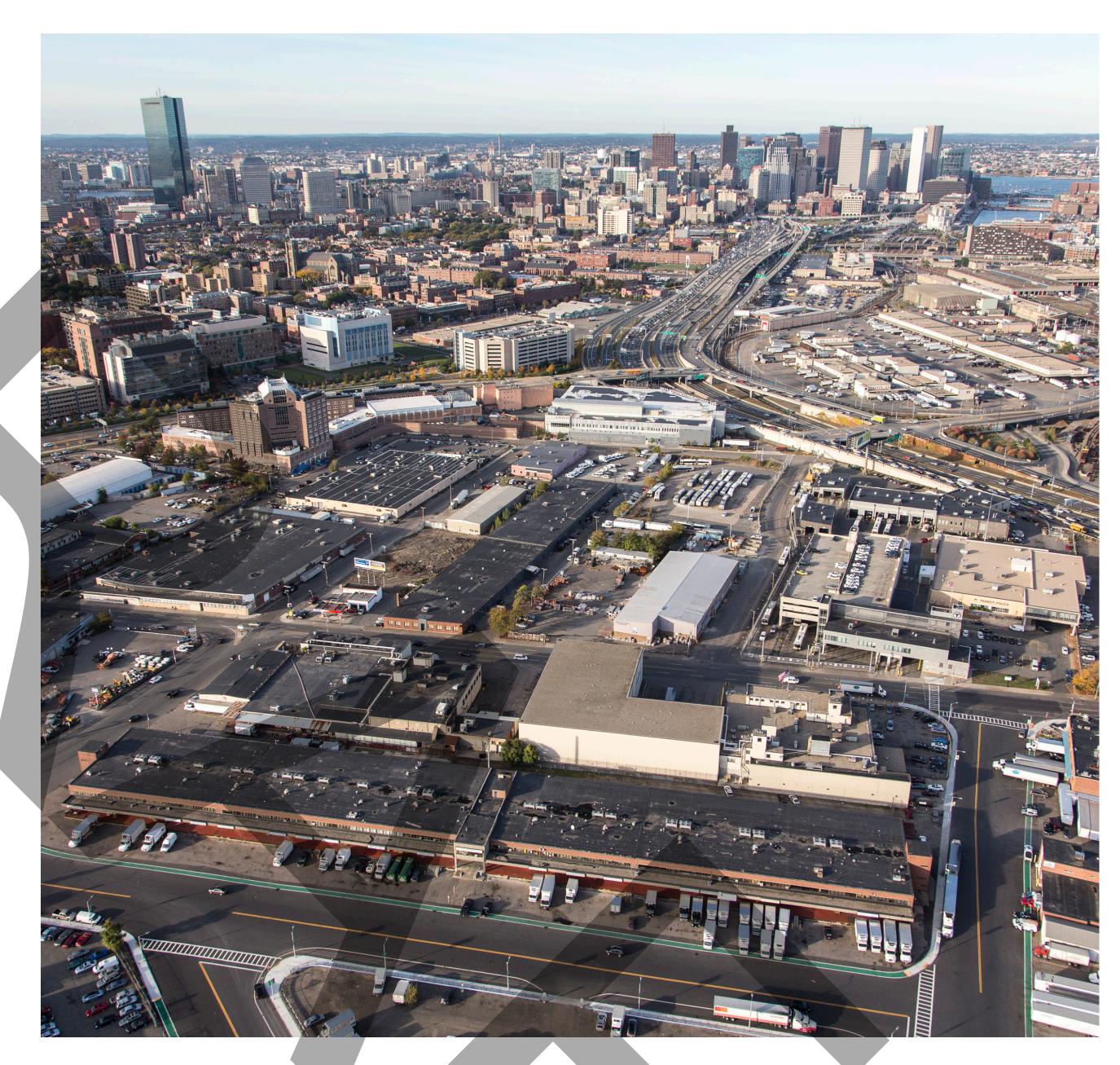
PLAN: Newmarket lays out the vision and the tools for Newmarket to continue to serve as a key center of employment for Boston residents as well as prime the area to attract investment in the industries of tomorrow.

From the challenges of urban disinvestment in past generations to today's need to remove barriers to a more equitable, affordable, and resilient future, Boston must utilize novel approaches to land use to solve urgent planning challenges in Newmarket. PLAN: Newmarket guides where legacy uses should be retained and enhanced, for the greater good of the regional economy.

## **PLAN: Newmarket Goals**

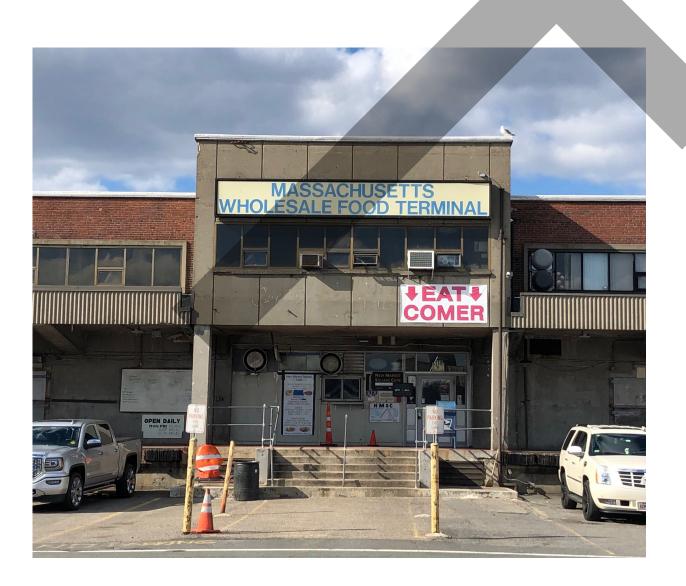
- Preserve Newmarket as a center for traditional industrial jobs
- Attract industries of tomorrow by identifying uses that leverage the area's unique locational advantages
- Identify a land use framework, public realm improvements, and infrastructure changes necessary to support 21st
   Century industry
- **Improve access** to jobs and services across all modes of travel
- Prevent displacement and support
  the continued growth and success of
  artists and creative economy-related
  uses, such as maker spaces or shared
  production facilities

PLAN: Newmarket uses tools from the disciplines of land use regulation, urban design, transportation, and climate resilience planning to support essential urban industrial uses in a spaceconstrained and high cost environment adjacent to the urban core.



Newmarket is unique among Boston neighborhoods because it hosts a variety of jobs that are accessible to individuals with a wide range of educational and experiential backgrounds. 63% of Newmarket workers live less than 10 miles away from Newmarket, often commuting from neighboring areas like Dorchester and Roxbury.





Today, creative economy uses are beginning to find a home in Newmarket, alongside traditional industrial uses. PLAN: Newmarket explores methods of land use, planning, and design recommendations that can allow core industrial uses, artist/creative uses, and hybrid-industrial uses to successfully co-exist and thrive.



# Defining 21st Century Industry

# A 21st Century Industrial Neighborhood

Over the past several decades, an extensive structural shift in the urban economy has occurred. Technology, urban development, and globalization have dramatically reshaped urban industry, and the line between industry and other sectors is increasingly blurred.

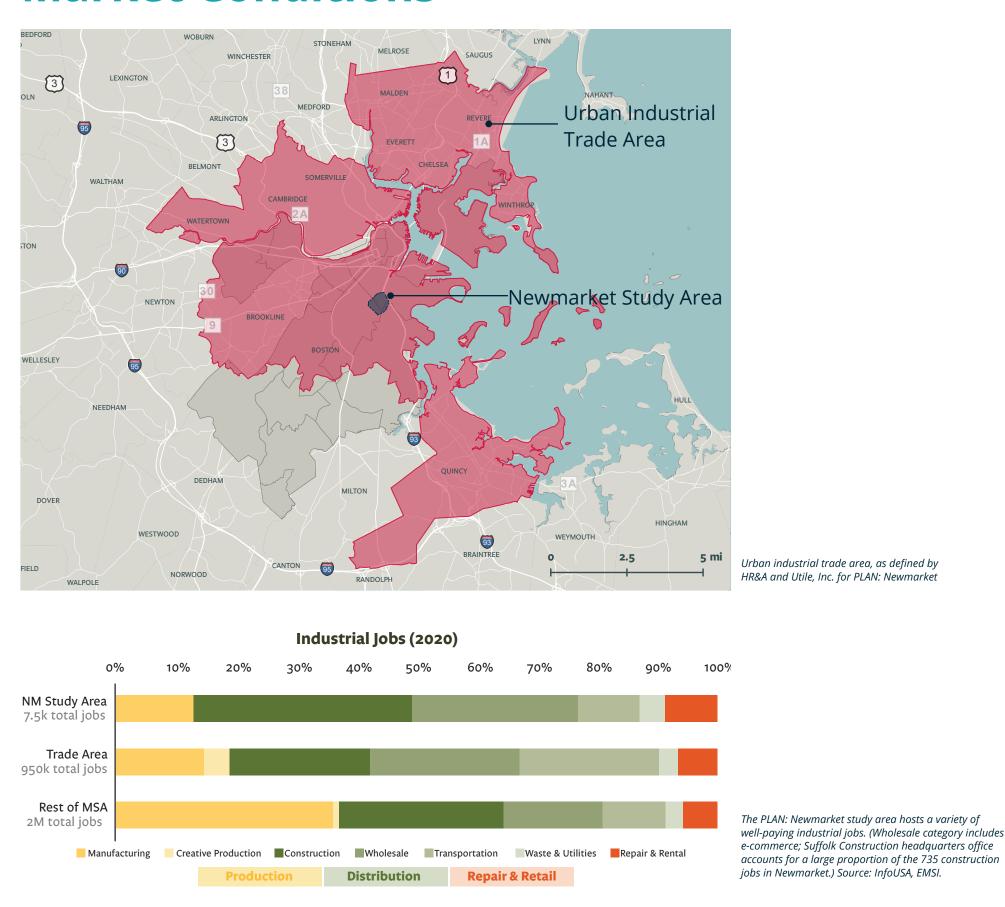
The 21st Century industrial neighborhood envisioned by PLAN: Newmarket is a place where people from various professional and educational backgrounds will continue to find employment in a variety of existing and new businesses. The regulations put forward by PLAN: Newmarket are designed to attract new commercial uses while supporting the retention of existing businesses, industries, and creative economy uses that cannot easily relocate to other Boston neighborhoods.

Industry in Boston and in urban economies across the United States has evolved rapidly since the time when manufacturing was the backbone of the country's economy. Urban manufacturing is increasingly smaller and cleaner, with boundaries increasingly blurred between manufacturing, creative, tech, and research and development uses.

A large-footprint of "goods movement" industrial uses including whole-sale, construction, warehousing, and last-mile distribution also remain critical to urban economies and seek to locate in targeted locations within cities near the customers and work sites they serve. Between 2011 and 2017, the fastest-growing industrial sectors in Boston were construction, transportation, and warehousing—industrial sectors that must grow as the city grows.

As Boston's economy has grown and diversified, industrial areas of Boston no longer contain just industry. Several contain a dynamic mix of arts, design, tech, and other professional services businesses. Planning for the future of Newmarket's industrial area must strike a balance between increasing job density and diversifying the mix of uses, while protecting light manufacturing and the essential heavy industrial uses that keep Boston running.

### **Market Conditions**



### **Urban Industrial Land Use**

A variety of essential industrial uses thrive in urban settings:

Niche / Creative Manufacturing Manufacturing businesses locating in urban settings tend to be in specialized, high-end, low-impact, and/or small-scale sectors like food and consumer goods, and often include accessory retail.



ity Fresh Foods, Shirley Street

**Tech Driven Production** Some urban manufacturing is driven by technology and proximity to researchers. Industries such as advanced manufacturing and prototyping support the start-up phase of production, and urban agriculture.

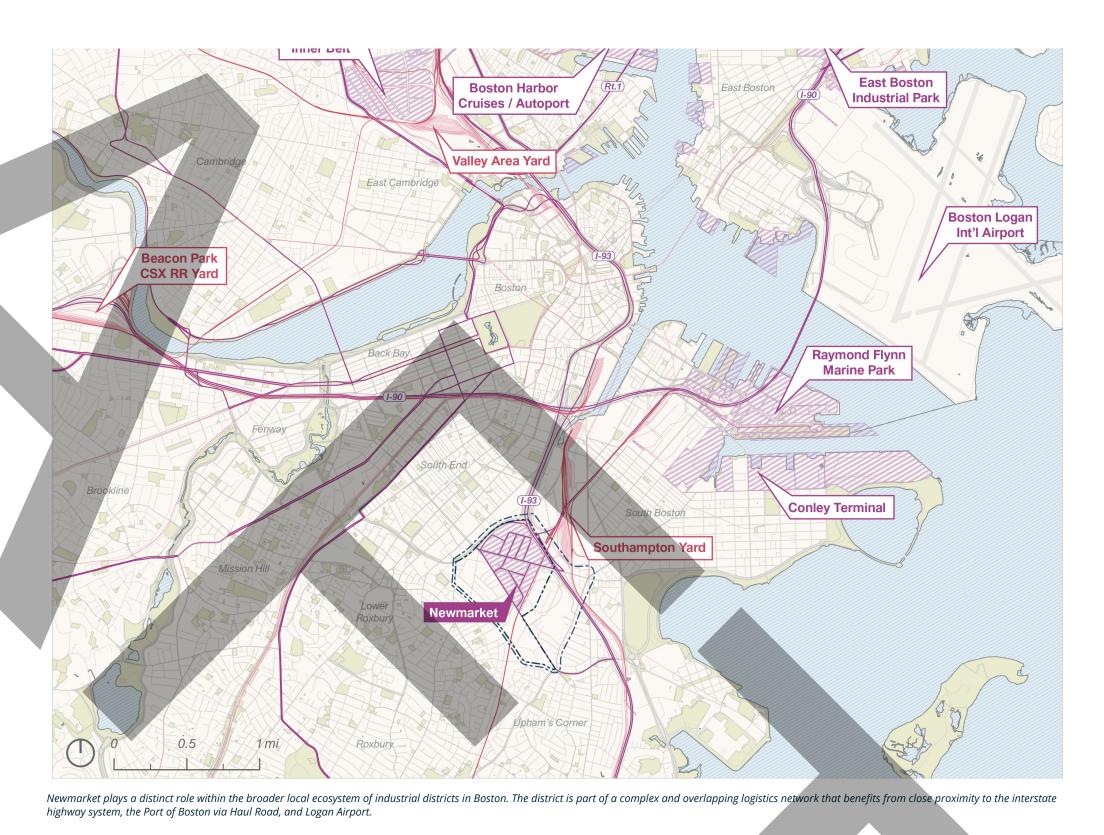


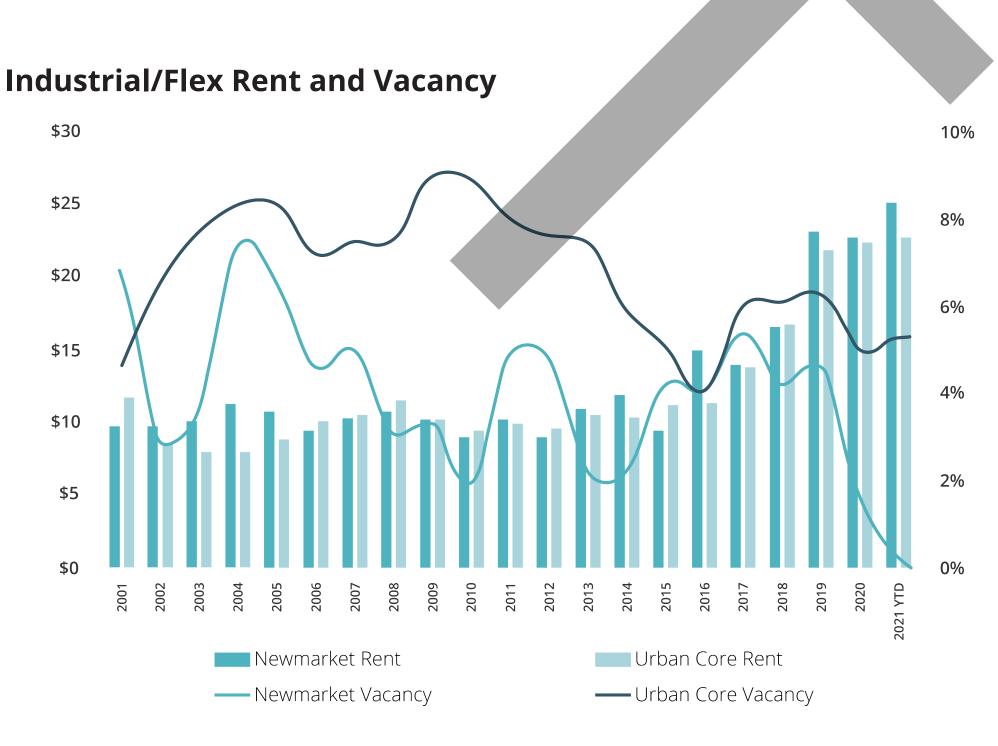
Amazon prototype drone, Cambridge U

**E-Commerce** COVID-19 accelerated the growth of e-commerce and its impact on urban industry. These distribution hubs seek proximity to urban populations and transportation infrastructure.



E-Commerce warehouse, Los Angeles





Strong demand and decreasing vacancy drive increasing rents for industrial space in the region, and in the PLAN: Newmarket study area. Source: CoStar



# Climate Resilience

### A "Cooler" Future

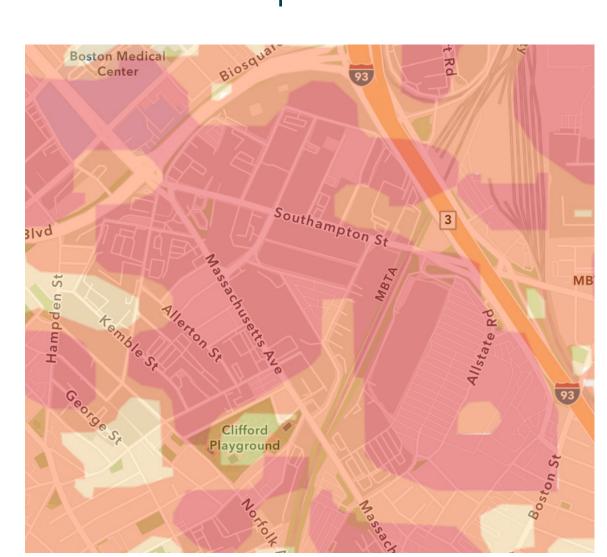
Smart surface strategies for Newmarket

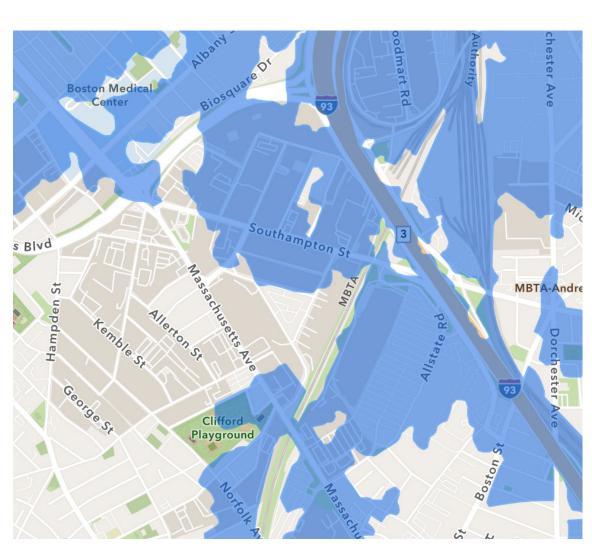


Image Credit: Smart Surface Guide- Li Z, Loftness V, Ge S, Zhou Y, Sui J, Zhang Z, Kim J, 2022, "Smart Surfaces Guide"

## **Heat and Coastal Flooding**

### Newmarket's Impact

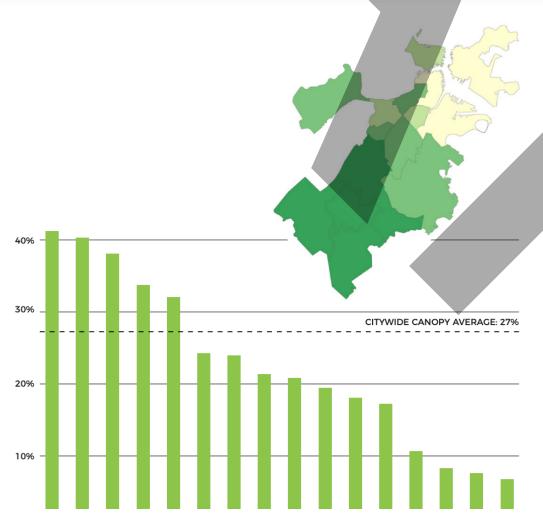




Images: Top left - Climate Ready Map Explorer Urban Heat Island surface and heat duration impact - Bottom left Climate Ready Map Explorer Coastal Flood Resilience Overlay - 2070 flood mapping 40 inches SLR

### **Trees and Stormwater**

### Newmarket's Impact





Images: Top Right - City of Boston Parks Dept. Tree Canopy Assesment 2019 - Newmarket is 17% below 2019 average - Bottom Left Climate Ready Boston Map Explorer Stormwater Flood Model - long term

### **Climate Resilience**

The Newmarket area is subject to multiple climate change related hazards based upon the City's comprehensive climate vulnerability and preparedness study, Climate Ready Boston (2016). Newmarket's existing conditions include; high levels of impervious dark asphalt surfaces, large flat dark roofs and a lack of overall tree canopy.

Urban Heat Island mitigation and adaptation strategies are central to Newmarket's resilience.

### **Newmarket's Vision**

PLAN: Newmarket's vision for a 21st Century Industrial District supports Boston's goals for resilient climate-ready districts through the incorporation of green infrastructure, smart surfaces, high performance-carbon free buildings and advanced district energy systems. These core elements strengthen the corridor's resilience while promoting the preservation of existing commercial, manufacturing use(s) and address both short and

long-term social and economic benefits.

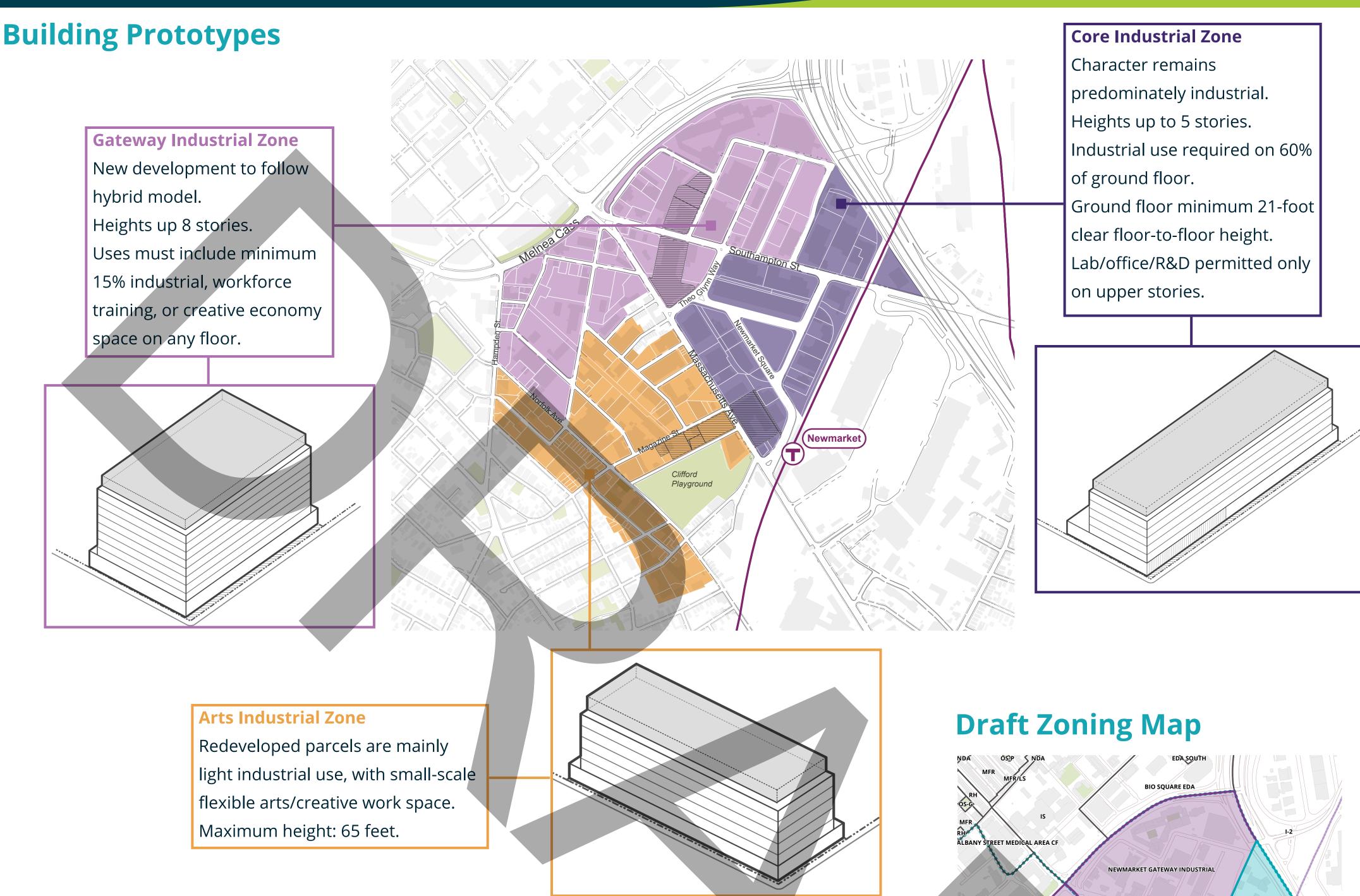
### **Mitigation Recommendations**

- Increase overall district tree canopy by >15%
- Require a 10 ft setback along Southampton Street to allow tree planting
- Projects on side streets with minimal canopy coverage must include a minimum of 3 smart surface strategies
- Surface Features; Bioretention Area;
   Stormwater Planter; Rain Garden
- Sub surface features; Stormwater Tree
   Pit; Tree Infiltration trench; Green roof
- Rainwater harvesting / Reuse; Cistern;
   Blue roof; Grey Water System; Rain Barrel(s); increase of min. 15% within the district
- Porous Paving Materials; Porous asphalt,
   Porous Concrete; Porous Paver Installation;
- Vegetated roof s
- Cool Wall facades
- Building shading devices and canopies decrease cooling loads / Solar Heat Gain
- Advanced Building Management Systems and demand response for peak load balancing
- Solar thermal and battery energy storage systems



# PLAN: Newmarket

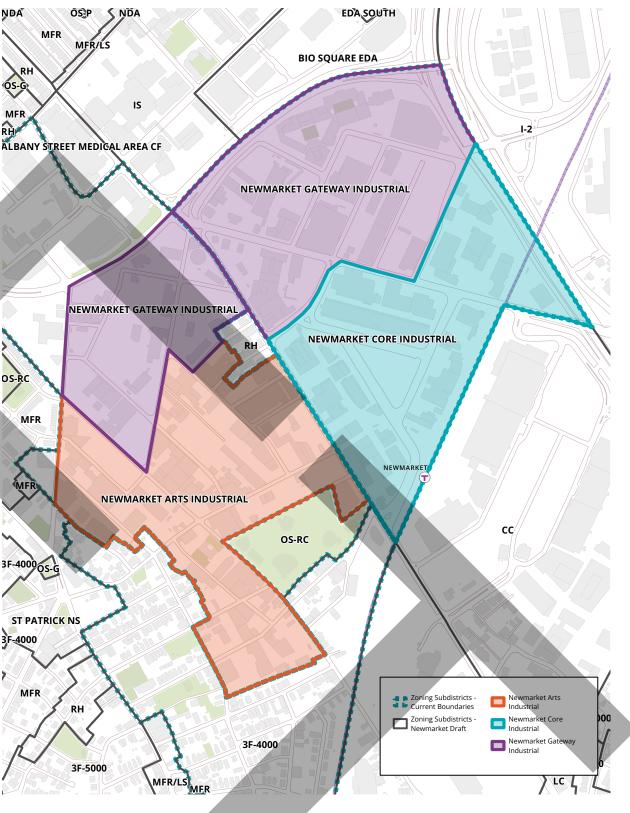
# Land Use & Urban Design



### **Industrial Mixed-Use**

Process participants led staff in developing a plan that prioritizes retention of essential industries, while attracting new investment. New development is required to provide space to traditional industrial uses (production/distribution/repair) on the ground floor, with higher-value market based commercial uses located above.

Analogous to planning and zoning requirements for ground floor restaurant or retail space in most mixed-use neighborhoods, PLAN: Newmarket's ground floor regulations fulfill a primary planning goal of preventing the displacement of space for traditional industrial businesses. The retention of these businesses, and the employment they provide, is essential to Boston's economic vitality.



### **Three Character Areas**

### **Gateway Industrial Zone**

Businesses that are new to the neighborhood are expected to locate here in mixed use developments featuring the types of businesses currently found in Newmarket, combined with research, lab, R&D, prototyping, advanced manufacturing, or office space. Market activity during the planning process suggests this may be the first area to see significant new investment, which these guidelines seek to facilitate. Heights up to 8 stories step down from adjacent portions of the South End.

### **Core Industrial Zone**

This area will host businesses and infrastructure critical to the regional economy, including MBTA maintenance facilities and current food-oriented businesses. Given the essential nature of these operations, this area is expected to largely retain its industrial character. Increasing density from a maximum floor area ratio of 2.0 to a maximum height of 5 stories facilitates redevelopment opportunities, without jeopardizing the character of the area's business ecosystem.

### **Arts Industrial Zone**

This area will be a hub for creative economy uses, arts, and small manufacturing. Many buildings are excellent examples of adaptive reuse. Planning guidelines seek to reinforce this pattern, while ensuring compatibility with adjacent residential areas. Maximum height: 65 feet.

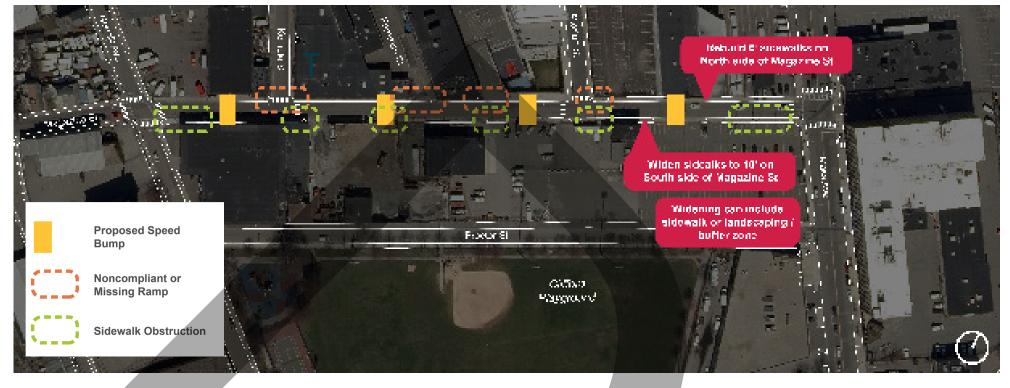


# PLAN: Newmarket

# Transportation & Mobility

### **Near & Medium Term Recommendations**

### **Traffic Calming & Sidewalk Widening**



Magazine Street provides an opportunity for improved pedestrian conditions through the reduction of speeding traffic, enabling of wider sidewalks through setbacks, and improved vegetation. See the Public Realm board for more detail.

### Typical traffic calming elements include:



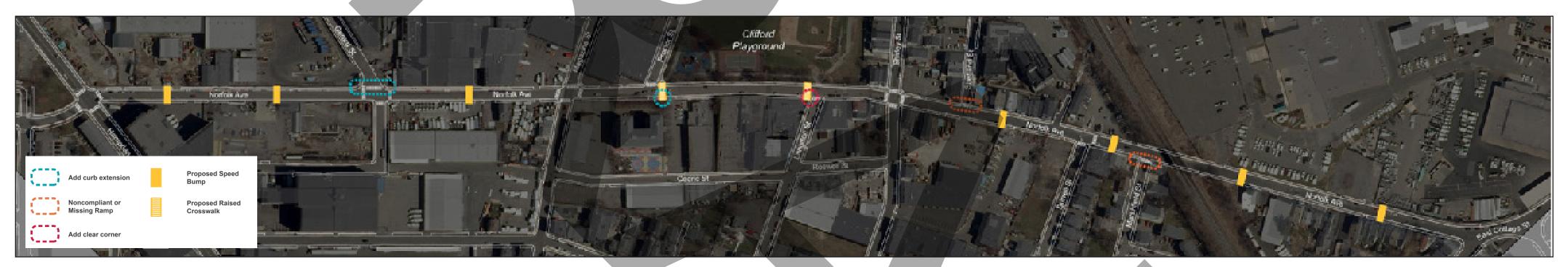
Curb Extensions

Daylighting at Intersections

Raised Crosswalks

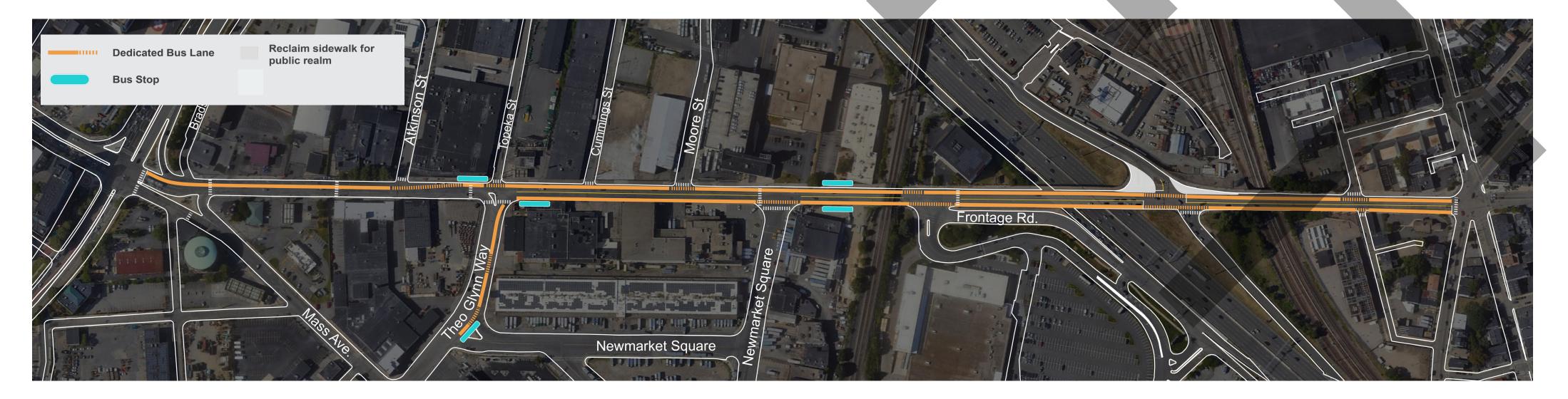
Speed Humps

### **Traffic Calming**

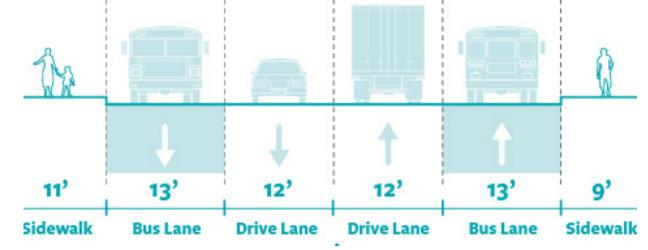


**Norfolk Ave** is a key street that links residential areas to the south to the business and commercial centers of Newmarket and is a vital multimodal east/west connector. Schools, parks, businesses, and residences all front and rely on this important street. To ensure pedestrian safety is primary without limiting the functionality that Norfolk Avenue sees today, traffic calming elements are recommended.

### **Dedicated Transit & Truck Lanes**



**Southampton Street** is a critical street for private automobiles, pedestrians, and transit vehicles. PLAN Newmarket recommends building upon the recommendations made in the PLAN: Dorchester Avenue Transportation Plan by working with BTD and the MBTA to advance and install design of a dedicated bus lane. This would also help advance the MBTA's Bus Network Redesign service goals, and better connect to Andrew Station.



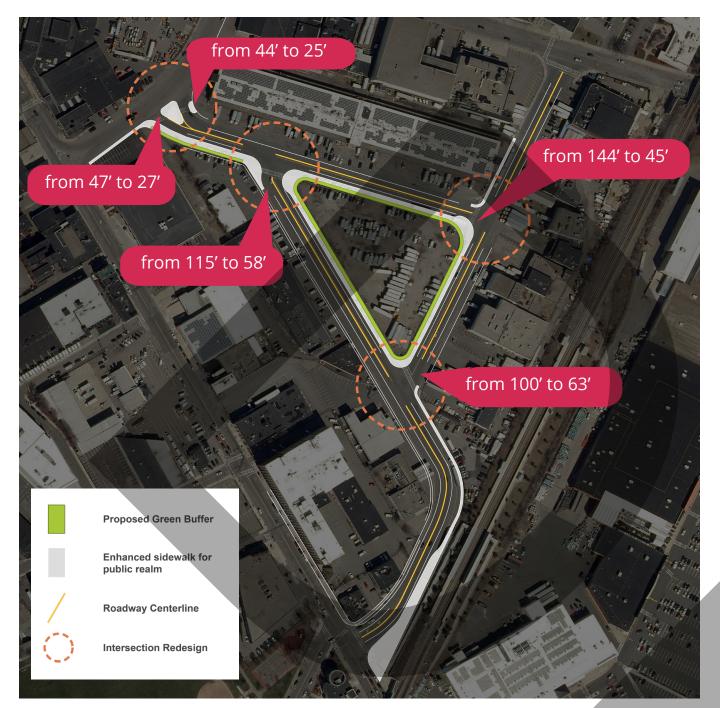




# Transportation & Public Realm

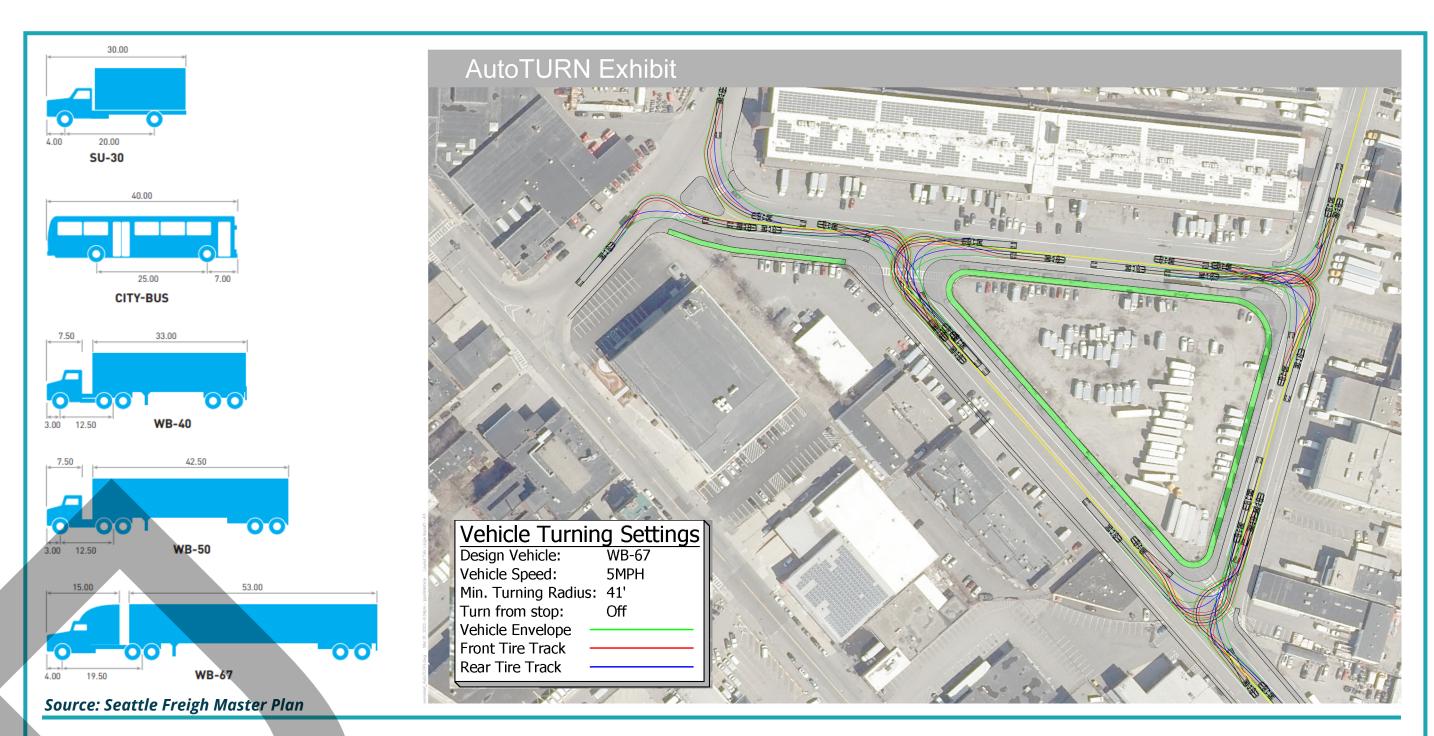
# **Medium & Long Term Recommendations**

**Intersection Rightsizing & Sidewalk Widening** 



## Newmarket Square

Intersections in Newmarket Square provide an opportunity for reduced intersection width which will enhance safety for all users, reduce speeding traffic, enable wider sidewalks, and will allow truck turns to remain unobstructed. See below for more detail.

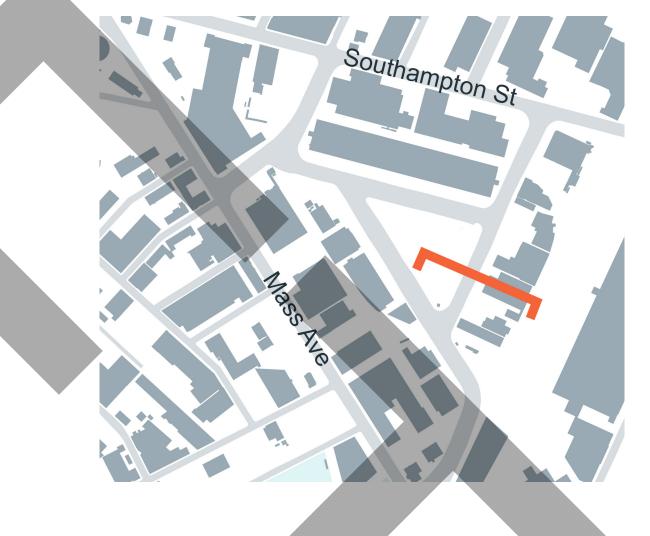


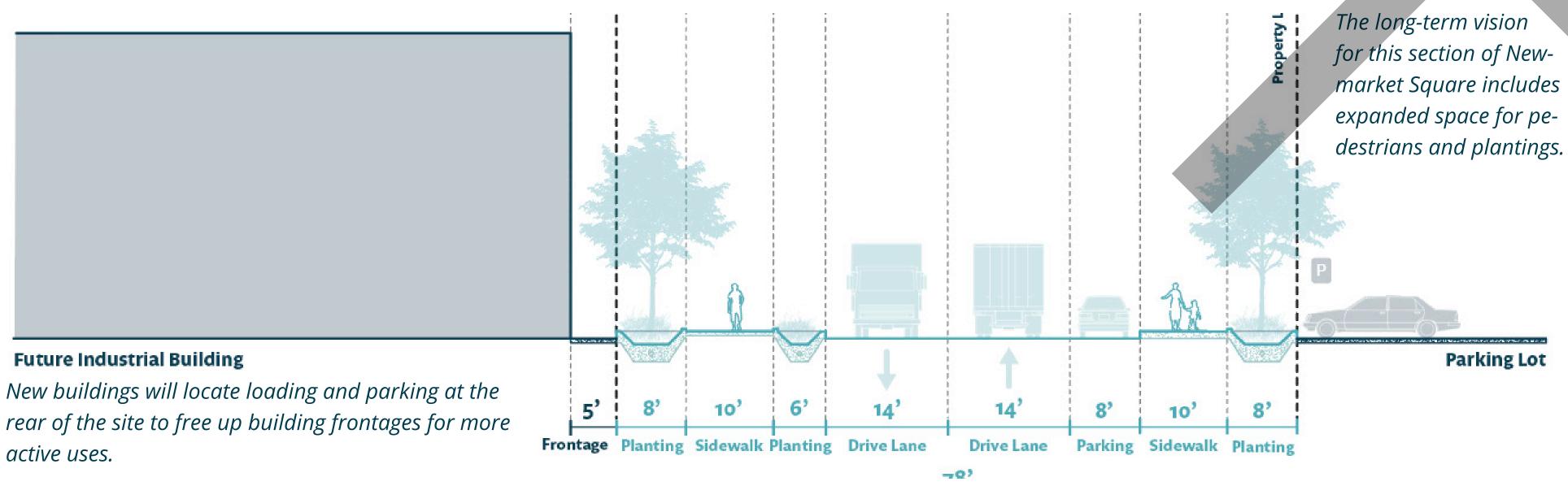
#### How are we thinking about large vehicles?

Large vehicles such as trucks and buses are vital elements on Newmarket streets. Trucks and buses of all sizes must be able to safely and effectively travel within Newmarket. However, many streets are oversized and can be "right-sized" enabling more streets to use extra space for pedestrian and green infrastructure improvements. The intersection changes recommended in PLAN Newmarket are designed to accommodate one of the largest design vehicles - a WB-67 - typically found in industrial and urban environments.

## **Urban Industrial Shared Streets**

Due to the programmatic requirements of industrial and commercial buildings, many of the blocks in Newmarket are occupied by long and uninterrupted low rise buildings without public access. As a result, the total area dedicated to non-vehicular users in the public realm is unusually low and access to quality open space, accessible sidewalks, and safe cycling routes is limited. This poses an accessibility and safety issue for all users of Newmarket. Sorting out, designing and managing an urban realm that safely allows the coexistence of trucks, bicycles, and people is a central aspect of this plan.



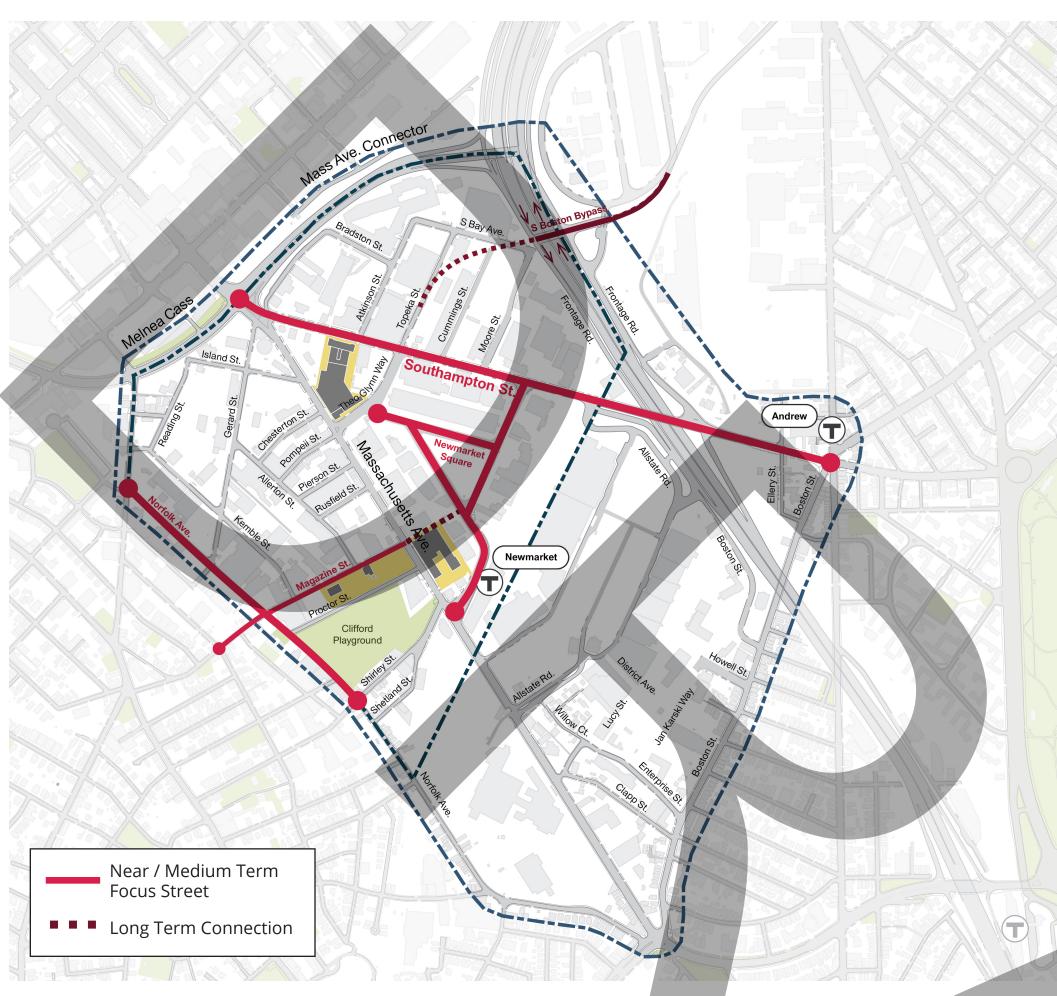




# Transportation & Mobility

## **Key Transportation Focus Areas**

Near and long-term recommendations



PLAN: Newmarket recommends both near / mid-term conceptual transportation and mobility improvements, as well as long-term network changes - such as the extension of Magazine Street and a connection up to the South Boston Bypass Rd. The concepts presented here advance the goals and priorities of the Newmarket community, as well as citywide / regional goals found in Go Boston 2030 and the MBTA Bus Network Redesign.

## **Rightsizing Intersections**

Newmarket Square



Each of the four Newmarket Square intersections can be reduced in width and right-sized while continuing to comfortably accommodate large tractor trailer operations. This will improve pedestrian safety, reduce speeding, and provide opportunities for green infrastructure.

## Need to Reduce Speeding

Norfolk ave



Norfolk Avenue is home to a wide variety of land uses - from industrial businesses to parks, schools, and residences. Norfolk is also a key pedestrian and biking route. Through the implementation of traffic calming measures, vehicular speeds can be reduced and pedestrian safety improved while continuing to support business operations.

### **About Our Recommendations**

In collaboration with the Boston Transportation Department, the Boston Public Works Department, the MBTA, and Mass-DOT, PLAN Newmarket makes mobility recommendations that range from localized, small scale improvements to long-term district wide tactics. While many of these recommendations require further analysis, engagement, and design, PLAN Newmarket helps set the stage for the advancement of these concepts.

### Goals

Safety for all road users and supporting the industrial and economic productivity is paramount:

- Ensure that Newmarket's street network is well-suited and ready for today and tomorrow's industrial uses and economic productivity
- Improve conditions for vehicles, transit users, pedestrians, and bicyclists for those that are traveling to, within, or through the area
- Ensure clarity on the street by providing safe and comfortable accommodations for all road users
- Over the long-term, create connections to the regional transportation network that support industry operations and improve upon Newmarket's street network

The Transportation and Mobility goals in PLAN Newmarket support the land use, public realm, and climate resiliency goals and recommendations. Additionally, these goals support ongoing work by other capital implementing departments, such as the Boston Transportation Department.

# **Key Priorities**

- Control vehicular speeds and reduce crashes of all types
- Improve sidewalk network and add plantings to increase separation between pedestrians and vehicles
- Implement traffic calming measures on key streets
- Right-size Newmarket Square intersections, sidewalks, and lane markings

