



Vision and Guiding Principles for the Duke Street *in Motion* Alternatives Analysis

This project will provide an efficient and desirable bus rapid transit (BRT) option along Duke Street by improving the transit experience for current and potential riders. With multimodal enhancements to the corridor, Duke Street will become a safe, efficient, and desirable community connector for people riding the bus, walking, biking, and driving.

Through improvements to the overall transportation system, but specifically to bus rapid transit (BRT) infrastructure and operations, choosing to ride the bus becomes a **desirable option** for Duke Street travelers, maintaining and enhancing Duke Street's role as a vibrant community connector for residents and businesses. Improvements to the bus system and multimodal infrastructure will support greater connectivity and efficiency for other travel modes along the corridor. The BRT will be tailored to fit the differing requirements of each segment of the corridor. Corridor improvements will be based on community engagement, needs, and opinions, and will maintain or positively impact residents' quality of life and the character and integrity of the corridor's neighborhoods and businesses.

Guiding Principles

To achieve our Vision, we must consider the following Guiding Principles in the development of capital investments and operational alternatives for the corridor:

(Note: The Guiding Principles and related Objectives will be tied to measurable characteristics of the design alternatives.)

Convenient: Make bus travel more predictable, frequent, and comfortable.

Objectives:

- *Increased bus frequency.*
- *Presence of real-time arrival information at bus stations.*
- *Improved transit reliability.*
- *Improved boarding/alighting and onboard experience.*
- *Improved ease-of-use and understanding of bus system/service.*
- *Improved bus shelters and amenities at BRT stations and local stops.*

Efficient: Improve mobility for all Duke Street travelers.

Objectives:

- *Improved bus travel times and efficiency.*
- *Improved bicycle and pedestrian access to bus stations.*
- *Improved first and last mile travel options with additional shared mobility devices.*
- *Improved digital convenience for fare collection and service information/updates.*
- *Limited or no negative travel time impacts to non-transit vehicles.*

- *Improved signal operations for transit vehicles and general traffic on the Duke Street corridor.*

Equitable: Use enhanced bus transit to support equitable access for a diversity of people and places.

Objectives:

- *Bus stations located near high ridership/high need communities.*
- *Improved station and bus vehicle amenities that respond to community needs, including improved technology for buses.*
- *Improved ADA access to stations and crosswalks.*
- *Additional and improved sidewalks that serve the corridor and connect to stations.*
- *Improved and safe connectivity to existing bike lanes or trails.*
- *Improved access to businesses and services that frequently serve transit dependent residents.*

Safe: Ensure safety and accessibility for all corridor users, including those connecting to and riding inside the bus.

Objectives:

- *Additional pedestrian and bicycle crossing locations and improved traffic signal capabilities, including crosswalk timings.*
- *Improved pedestrian safety on sidewalks through sidewalk widening, introduction of buffers, or relocation of utilities.*
- *Improved corridor and intersection safety while maintaining access to neighborhoods and businesses.*
- *Reduced person-vehicle interaction/conflict locations (e.g., driveways, uncontrolled access).*
- *Mitigation of cut-through traffic in neighborhoods.*
- *Increased visibility of passengers at bus stations.*

Vibrant: Support and enhance thriving and future corridor destinations that improve resident quality of life and boost the local economy.

Objectives:

- *Preserve and positively impact quality of life for neighborhoods, residents, and businesses.*
- *Siting of bus stations within walking distance to area attractions/services, as well as future development areas.*
- *Improved access to jobs.*
- *Improved access to retail, parks, and recreation.*
- *Improved Duke Street streetscapes and green space.*
- *Coordinated planning efforts with land use development activities that are consistent with corridor vision and guiding principles.*

Sustainable: Contribute positively to the environment, now and in the future.

Objectives:

- *Reduced vehicle emissions (including those related to the bus transit vehicle while traveling and idling).*
- *Prepare the corridor for accommodation of electric bus fleet (or other sustainable zero emission alternative).*
- *Improved stormwater management.*
- *Increased tree canopy volume.*