



Hillsborough Area Regional Transit Authority

Arterial Bus Rapid Transit (BRT) Project

Presenters

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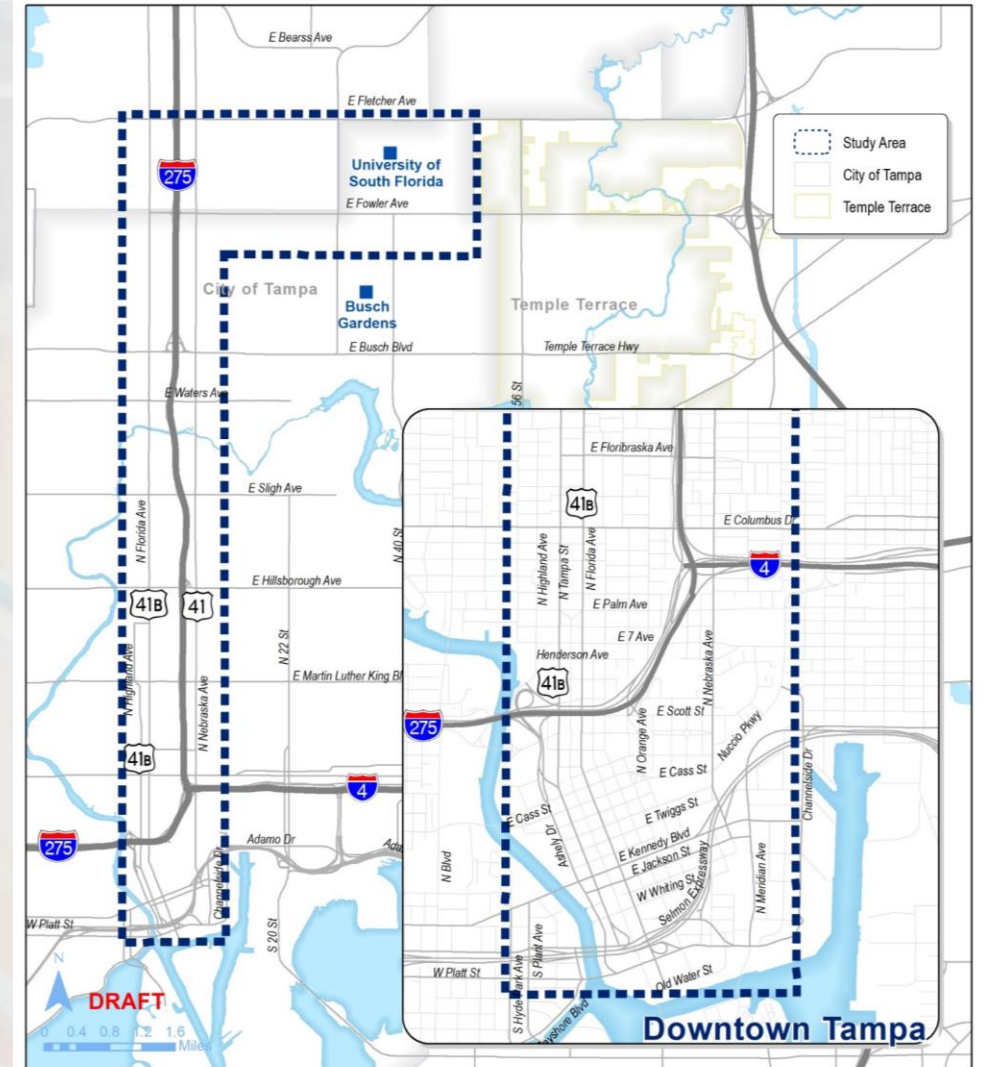
Board of Directors Workshop

August 26, 2020

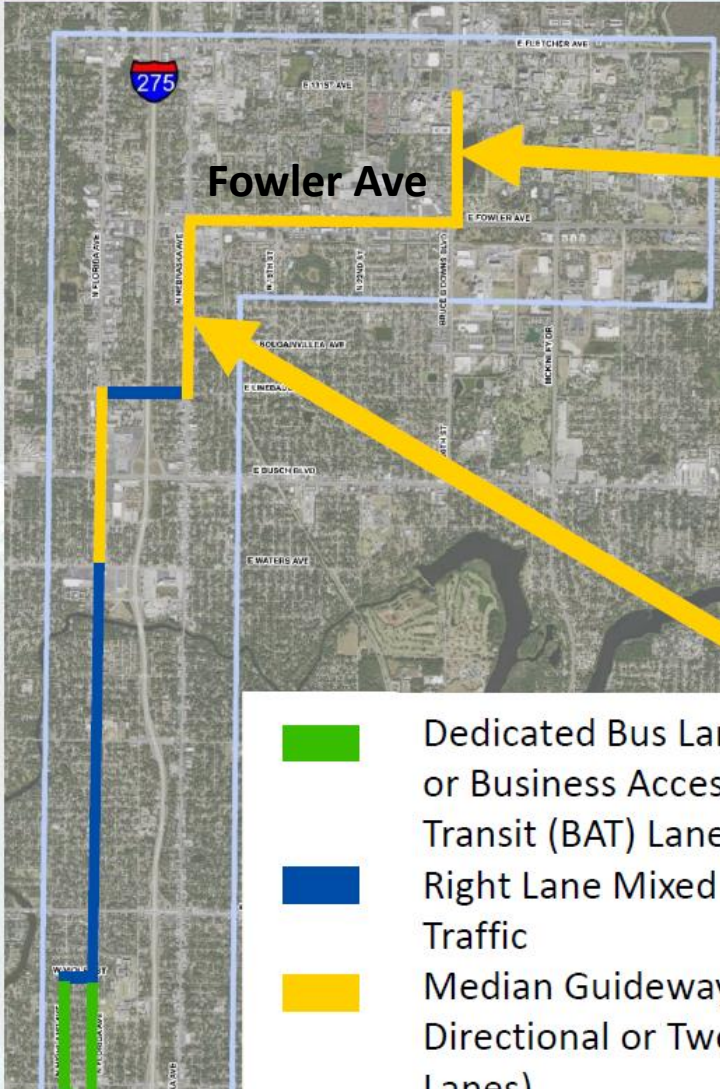
BRT Study Introduction

Justin Willits, AICP

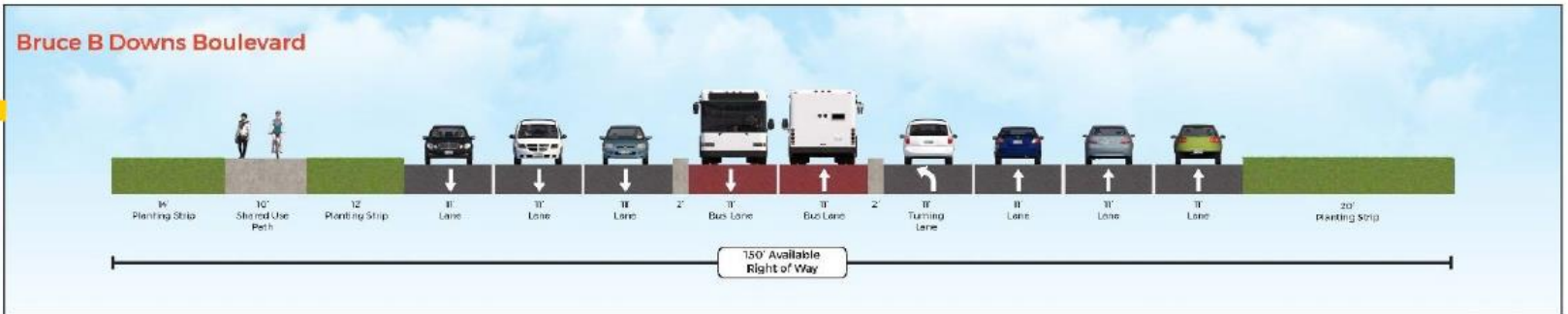
- **Purpose:** Identify a corridor, using some combination of Florida, Nebraska and/or Fowler avenues to connect Downtown Tampa to the USF Tampa Campus



Recommended BRT Guideways

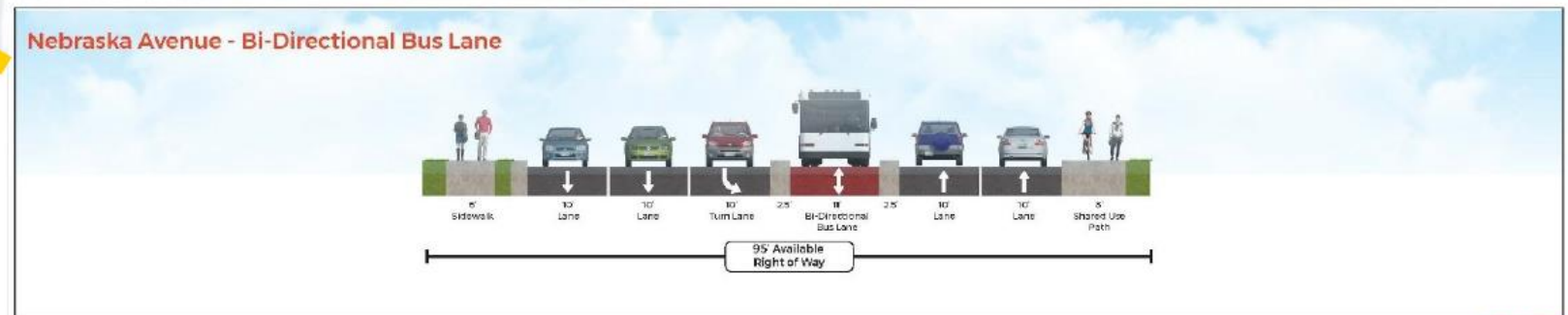


Fowler Ave



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- Dedicated Bus Lane or Business Access Transit (BAT) Lane
- Right Lane Mixed Traffic
- Median Guideway (Bi-Directional or Two Lanes)

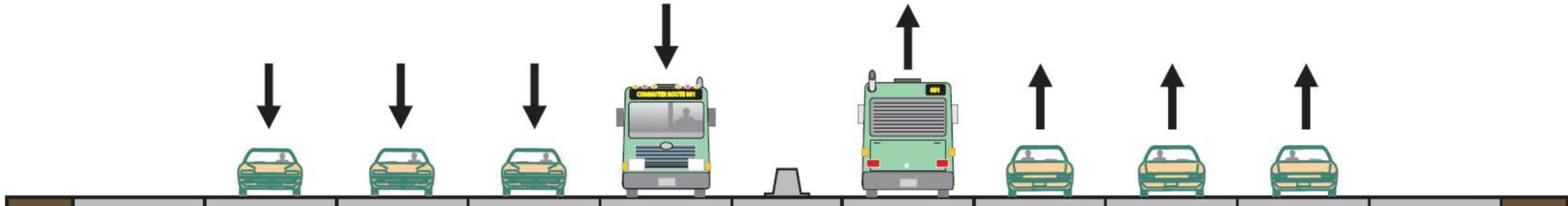


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Recommended Typical Sections

Justin Willits, AICP

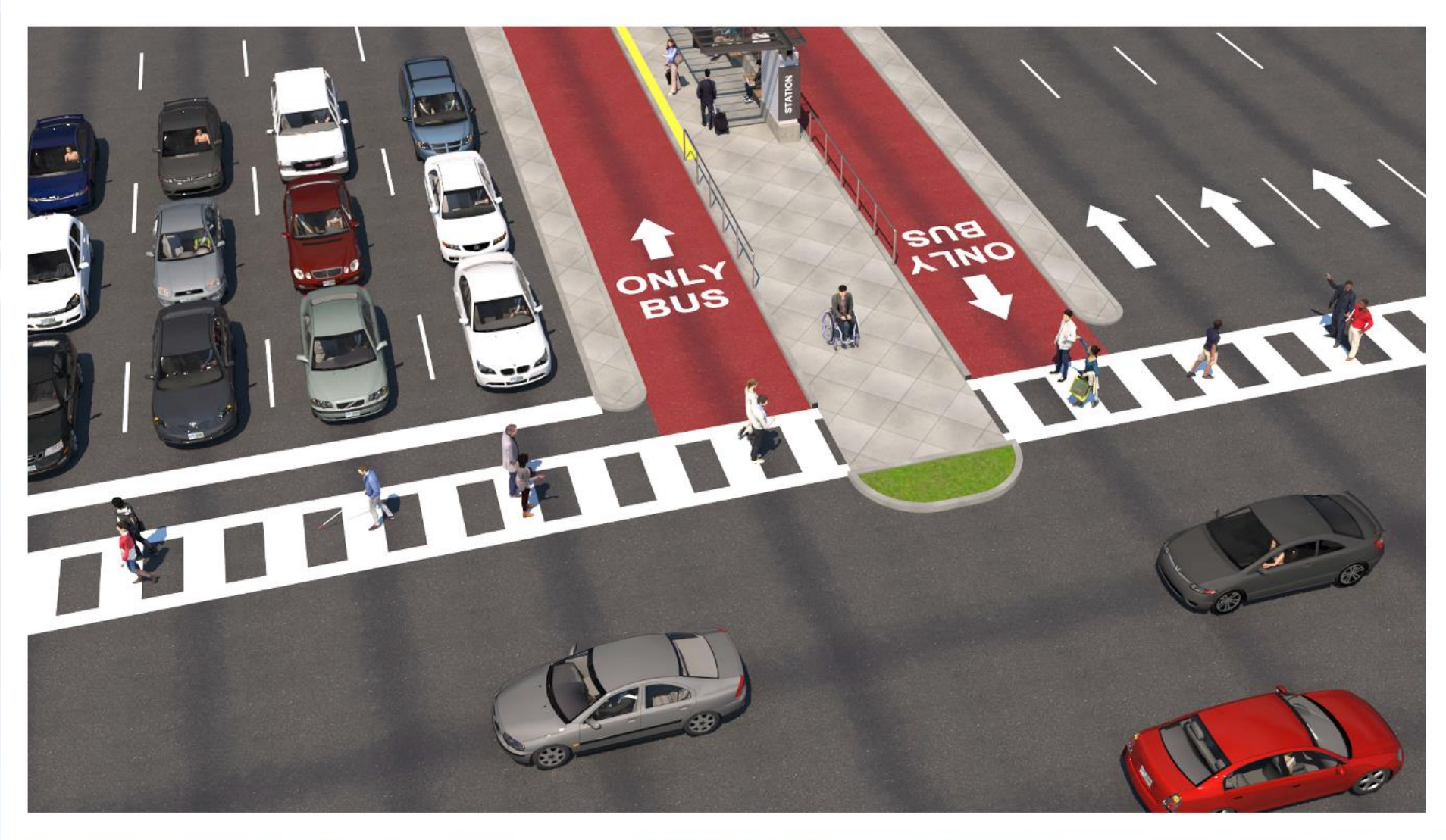
Fowler & Florida Ave (Various segments): MEDIAN RUNNINGWAY



- **Exclusive guideway:** fast, reliable, but requires space for lane or lane conversion
- **Stations:** can use either a right-side boarding or left-side boarding stop configurations
- **Operations:** may need signal system
- **Requires physical separation**
- **Access management:** would restrict access

Median Station Access

Justin Willits, AICP

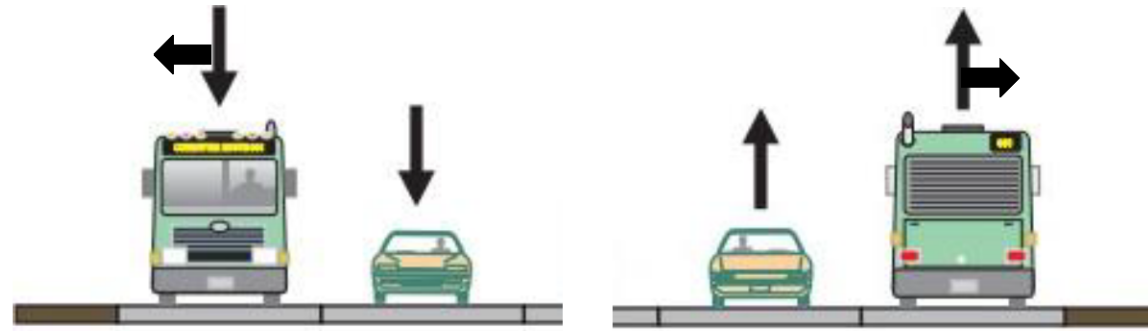


Recommended Typical Sections

Justin Willits, AICP

Florida and Fowler Ave. (Various segments):

BAT LANE OR MIXED TRAFFIC



- **Semi-exclusive BAT lane:** turning autos may impact transit travel times
- **Operations:** may impact traffic LOS
- **No physical separation**

- **Access management:** would not restrict access
- **No transition needed from prior segment** (outside running)


Modern BRT Station Concept


- A** Shelters with lighting
- B** Pre-board ticketing machines
- C** Security and lighting fixtures
- D** Real-time/ accessible displays
- E** Level boarding and detectable edges
- F** Benches
- G** Trash and recycling containers
- H** Bicycle parking/sharing



Comparative Travel Times

 Heavy Congestion Route 1 Travel Time (PM peak)

 Scheduled Route 1 Travel Time (PM peak)

 Estimated BRT Travel Time (PM peak)

Recommended BRT Alternative Operational Characteristics

Span of Service

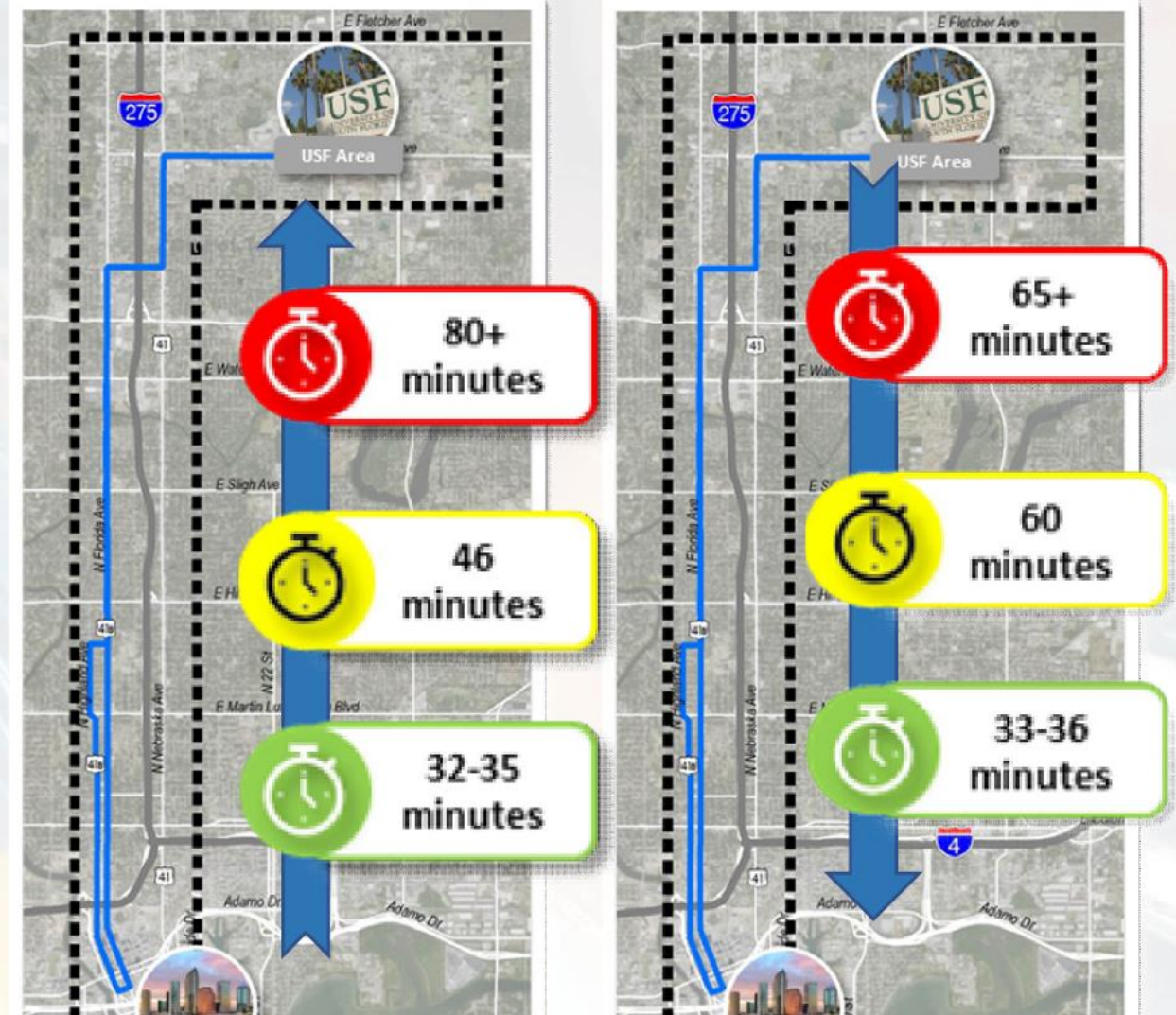
- Monday – Thursday: 5:30 AM to 12:00 AM
- Friday: 5:30 AM to 1:00 AM
- Saturday: 6:00 AM to 1:00 AM
- Sunday: 7:00 AM to 11:00 PM

Frequency

- Peak Frequency: 10-minutes
- Off-peak Frequency: 15-minutes

Midpoint Travel Times

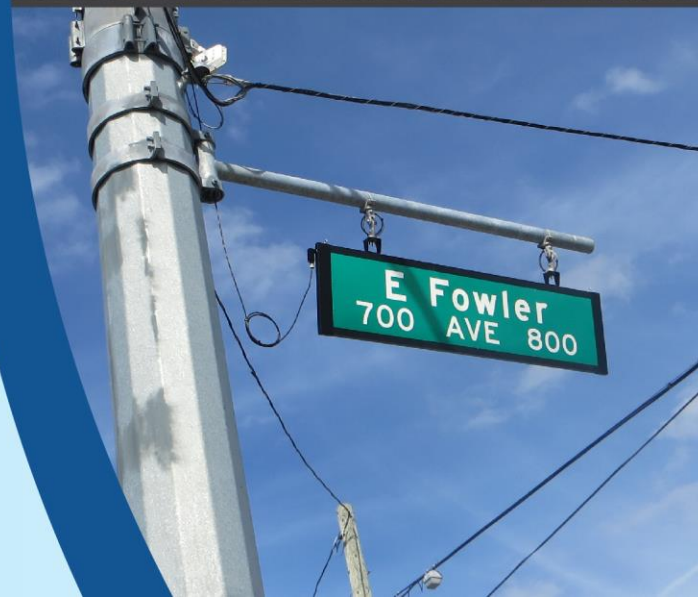
Northbound: Downtown to USF Southbound: USF to Downtown



University Area Multimodal Feasibility Study



Concept Plan Presentation
September 2020



Key Corridor Needs

Safety

- Improved pedestrian facilities, more crossing opportunities & use of LPIs
- Upgraded lighting for pedestrians, cyclists and drivers
- Reduced cyclist exposure to higher-speed vehicles
- Lower vehicle travel speeds in segments with more pedestrian and cyclist activity

Transit Flexibility

- Accommodate planned HART BRT and potential transit services

Intersection Efficiency

- 3MSF mixed use + 3,000 new residences already approved = increased future volumes
- Use “Innovative Intersection Designs” where feasible

Timeframe for Actions

Short-Term / within 5 years

- Minor construction actions without ROW needs
- Complete required planning/environmental approval process for Medium-Term actions
- Acquire ROW for Medium-Term actions

Medium-Term / within 10 years

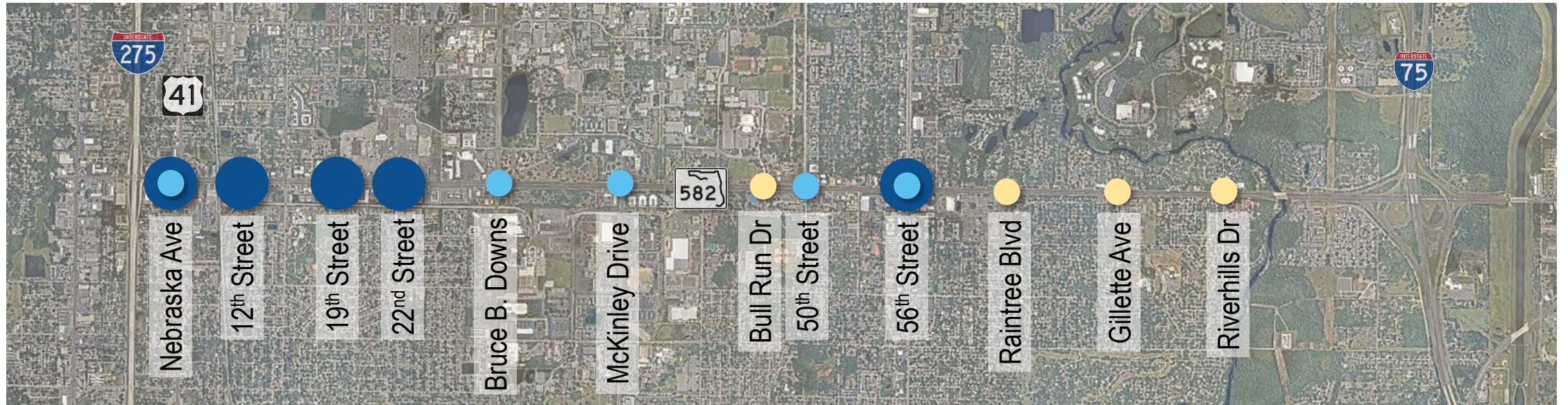
- Minor construction activities that require ROW and/or change property access
- Complete required planning/environmental approval process for Long-Term actions
- Acquire ROW for Long-Term actions

Long-Term / 10 or more years

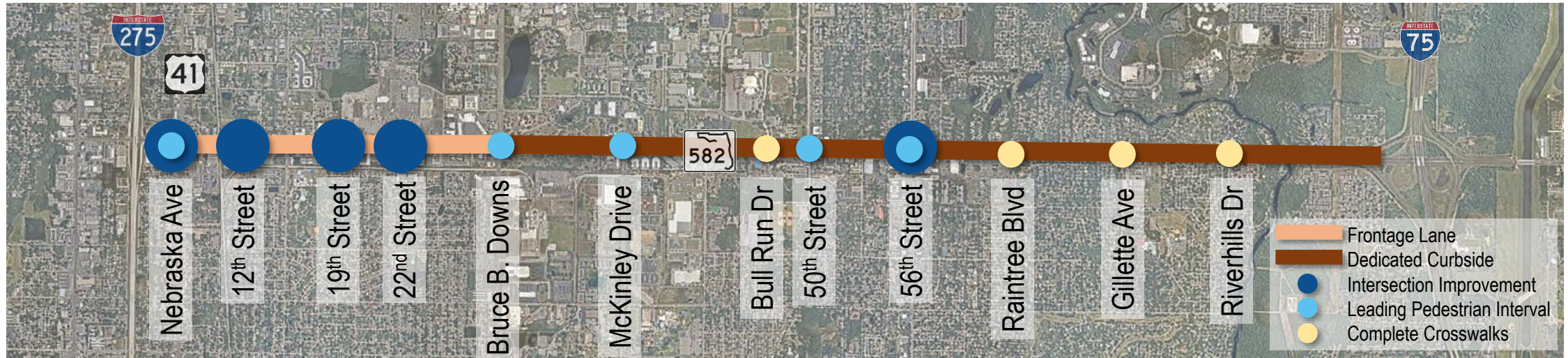
- Major construction activities that require ROW

Short-Term Actions / FY 2022 to 2024

- Intersection Improvement
- Leading Pedestrian Interval
- Complete Intersection Crosswalks



Proposed Implementation Schedule



Location/Project	Project Description	Total Estimated Budget	FY 21	FY 22	FY 23	FY 24	FY 25
Nebraska Avenue & Fowler Avenue	Tighten curb radii, landscaping	\$ 477,000					
12th Street & Fowler Avenue	Signalized pedestrian crossing, landscaping	\$ 1,065,000					
19th Street & Fowler Avenue	Signalized intersection, landscaping	\$ 1,170,500					
22nd Street & Fowler Avenue	New signal heads, extend median nose, tighten curb radii, landscaping	\$ 182,500					
56th Street & Fowler Avenue	Urban smart channel, landscaping	\$ 494,000					
Fowler Avenue Leading Pedestrian Interval Implementation	Implement LPI at signalized intersections	TBD	Ongoing				
Fowler Avenue Crosswalk Completion	Complete crosswalks at signalized intersections	TBD					
Fowler Avenue Multimodal Improvements (Nebraska to Bruce B Downs)	Implement transit, bike, and pedestrian improvements	TBD					
Fowler Avenue Multimodal Improvements (Bruce B Downs to I-75)	Implement transit, bike, and pedestrian improvements	TBD					
HART Arterial BRT	Transit guideway	TBD					

Legend: PD&E Design Const.

Fowler Avenue Conceptual Designs*

BAT Lane

- Business Access & Transit Lane allowing non-transit right turns
- Minor to Major Construction / Medium-Term Action

Frontage Lane

- Access lane separated from main roadway with curbside Bus Only lane
- Minor to Major Construction / Medium-Term Action

Median Transitway

- BRT lanes (or LRT guideway) and stations in center separated from roadway
- Major Construction / Long-Term Action

* These concepts will be analyzed in the PD&E Study and others may be developed

1 Business Access & Transit (BAT) Lane

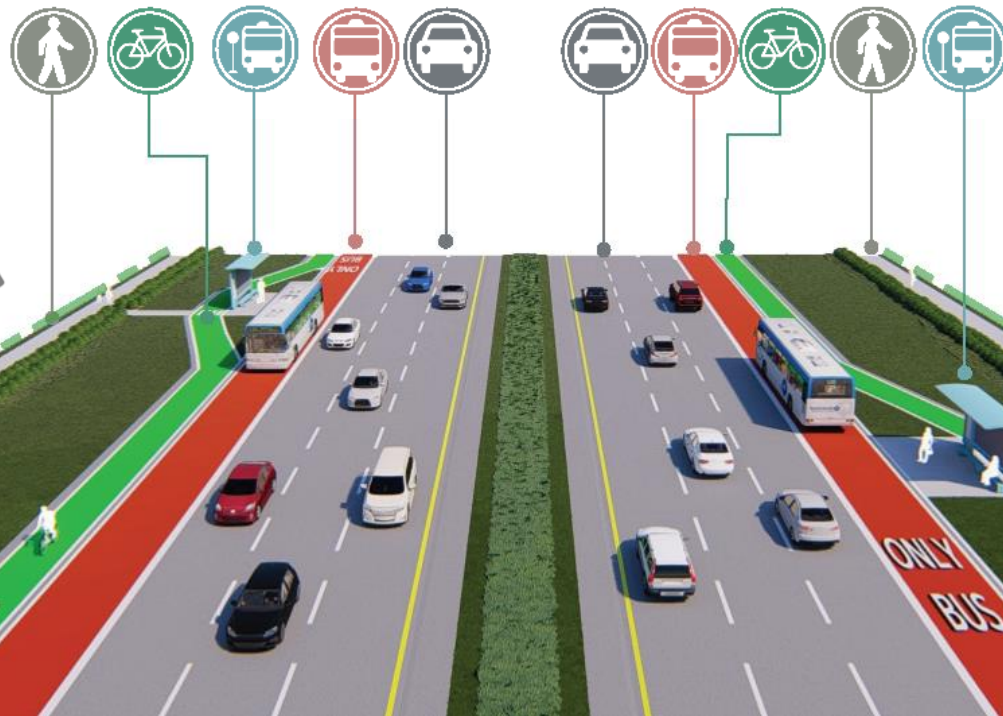


San Francisco, California



Minneapolis, Minnesota

Conceptual Design



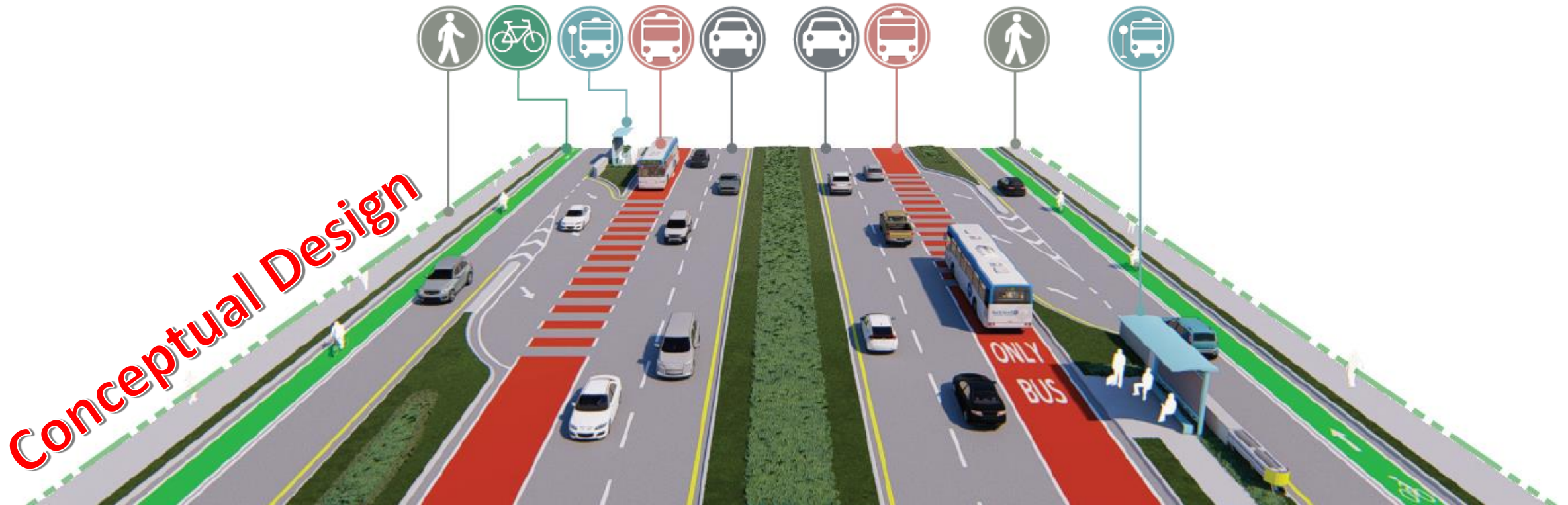
2 Frontage Lane



Montgomery County, Maryland (Proposed)



Queens, New York



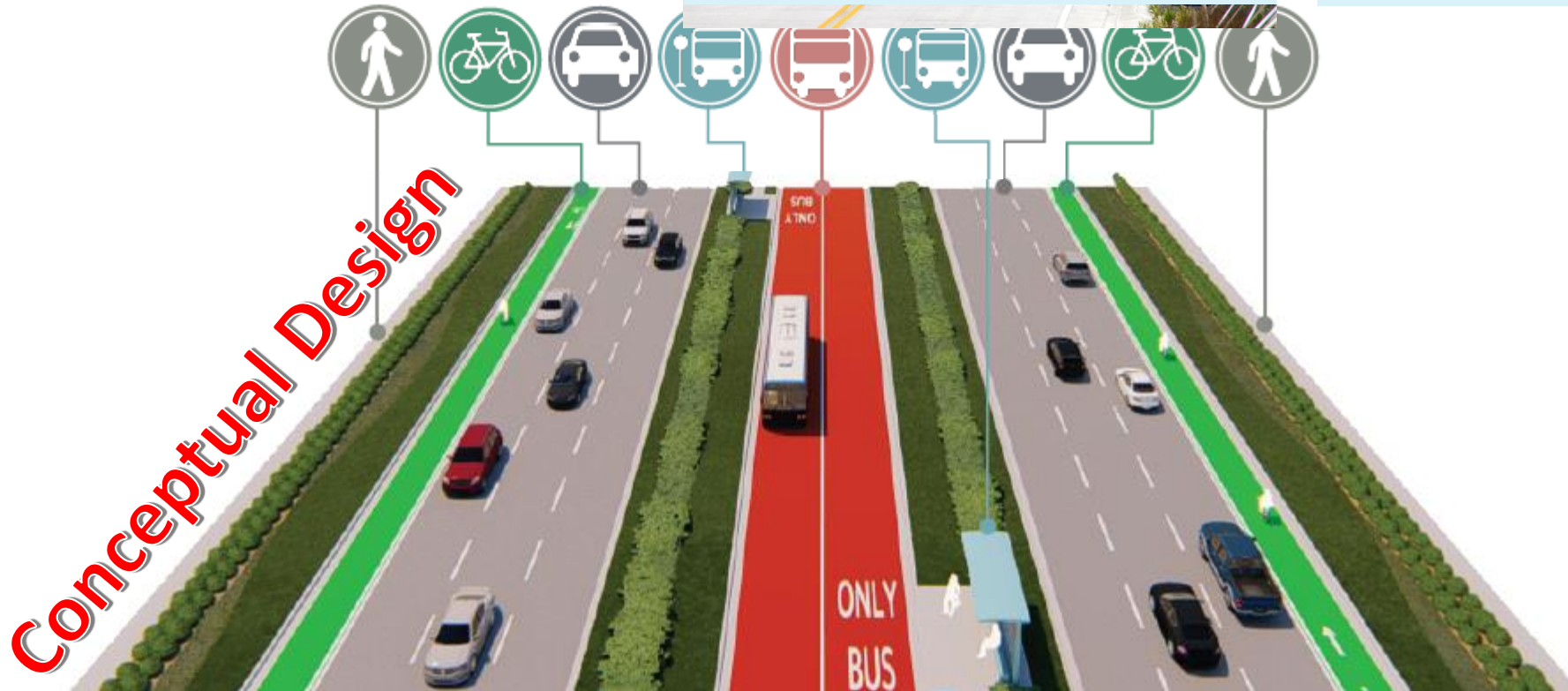
3 Median Transitway



Alexandria, Virginia

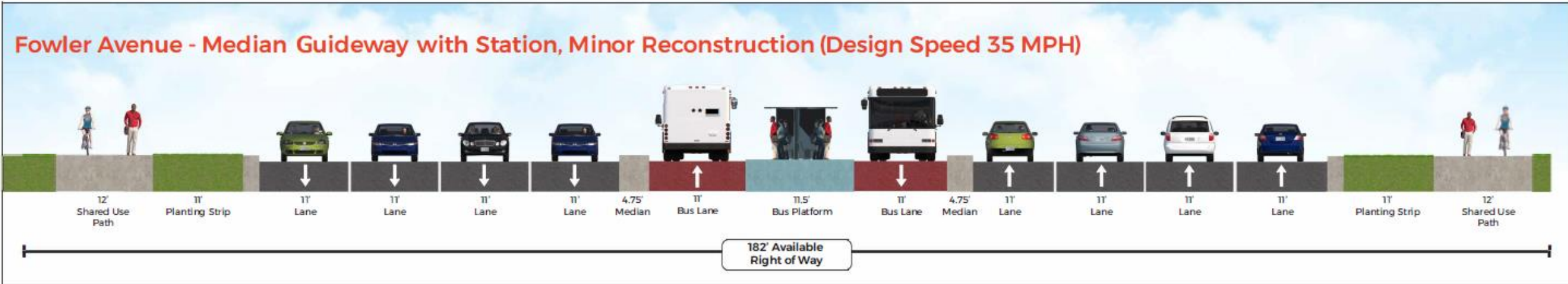


Quito, Ecuador



HART Arterial BRT Concept – Median Guideway

Fowler Avenue - Median Guideway with Station, Minor Reconstruction (Design Speed 35 MPH)



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THANK YOU !