

Madison East-West Bus Rapid Transit (BRT) Planning Study

Downtown Route Options – February 3, 2020

MADISON DEPARTMENT



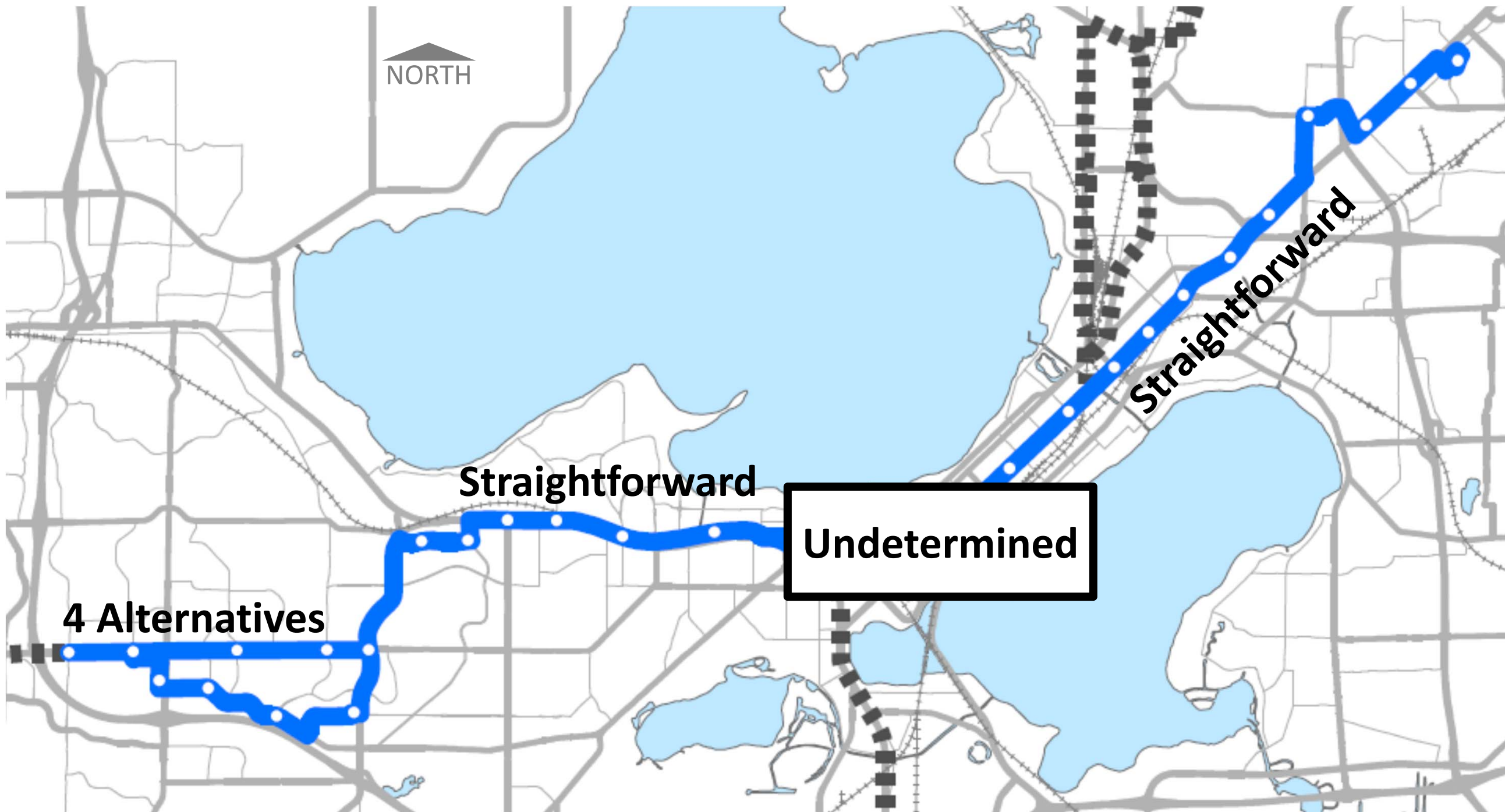
OF TRANSPORTATION

Downtown Routing Goals and Objectives

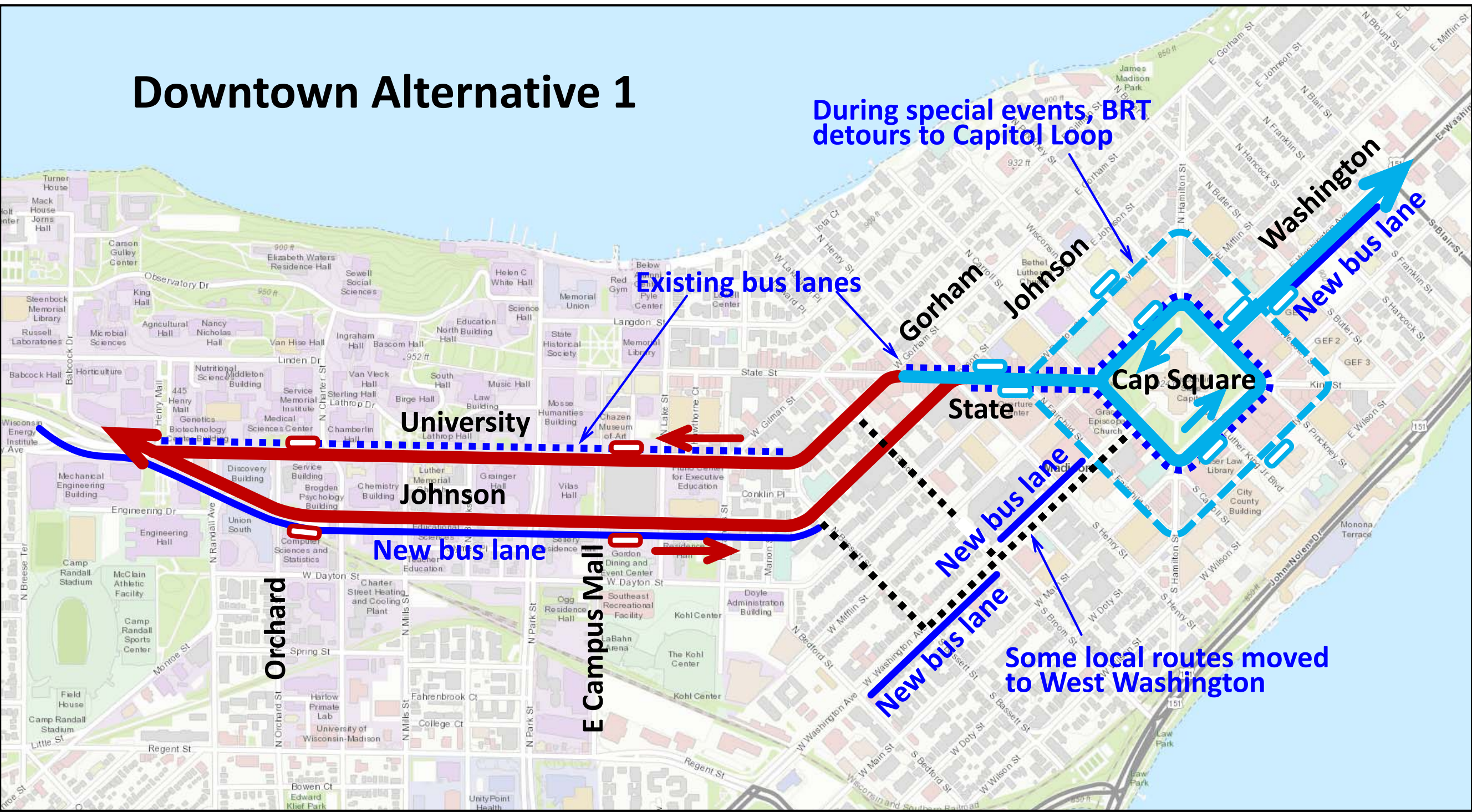
- Serve important regional destinations (State Street, Capitol Square, Monona Terrace, government offices)
- Provide dedicated running way (bus lanes)
- Provide good BRT station locations. These locations:
- Minimize and/or accommodate detours.
- Provide convenient transfers from BRT to local Metro routes.

Downtown Routing Goals and Objectives

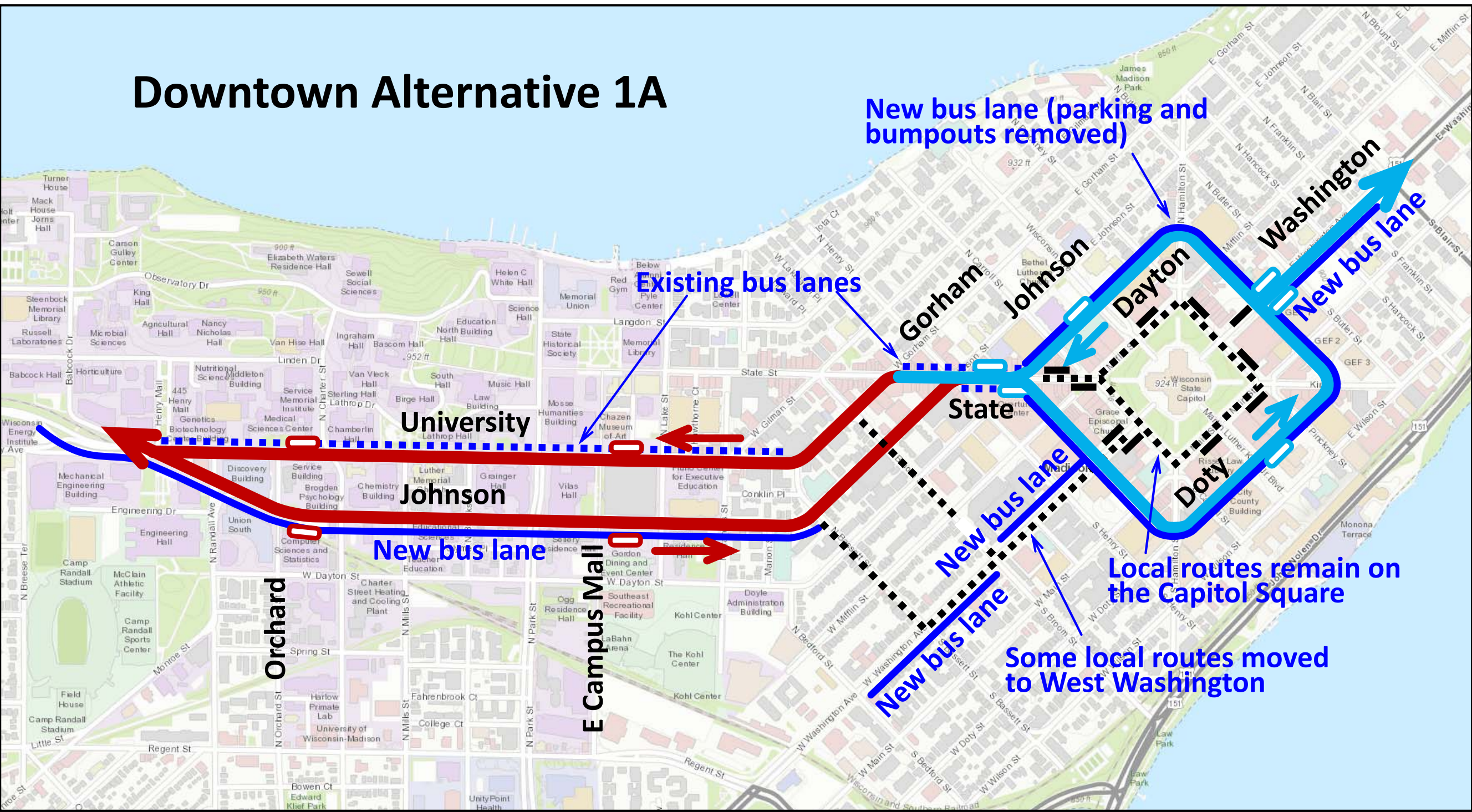
- Minimize BRT travel times
- Minimize traffic impacts
- Accommodate local bus integration
- Minimize impacts to on-street parking and parking revenue lost
- Accommodate and address bike traffic



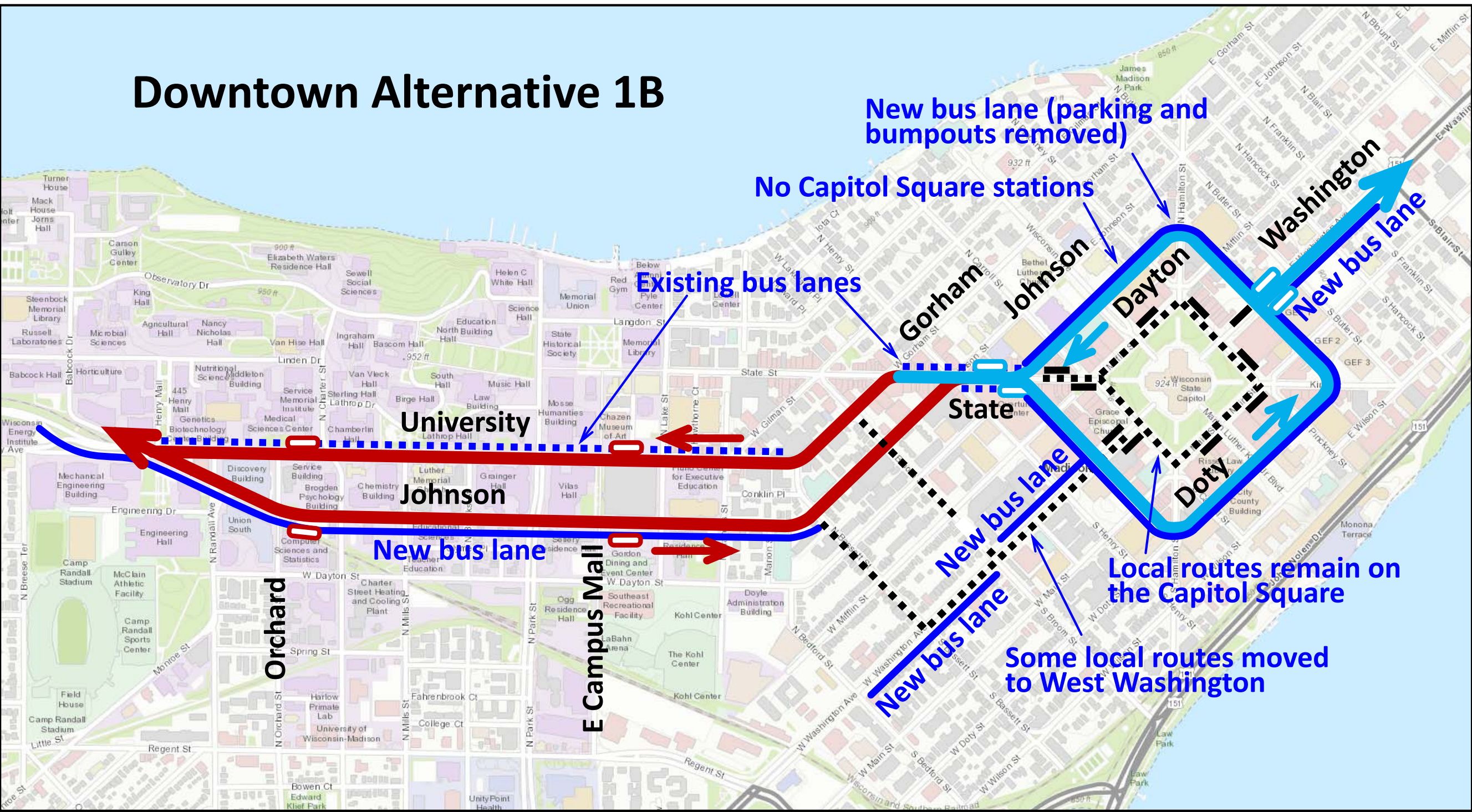
Downtown Alternative 1



Downtown Alternative 1A



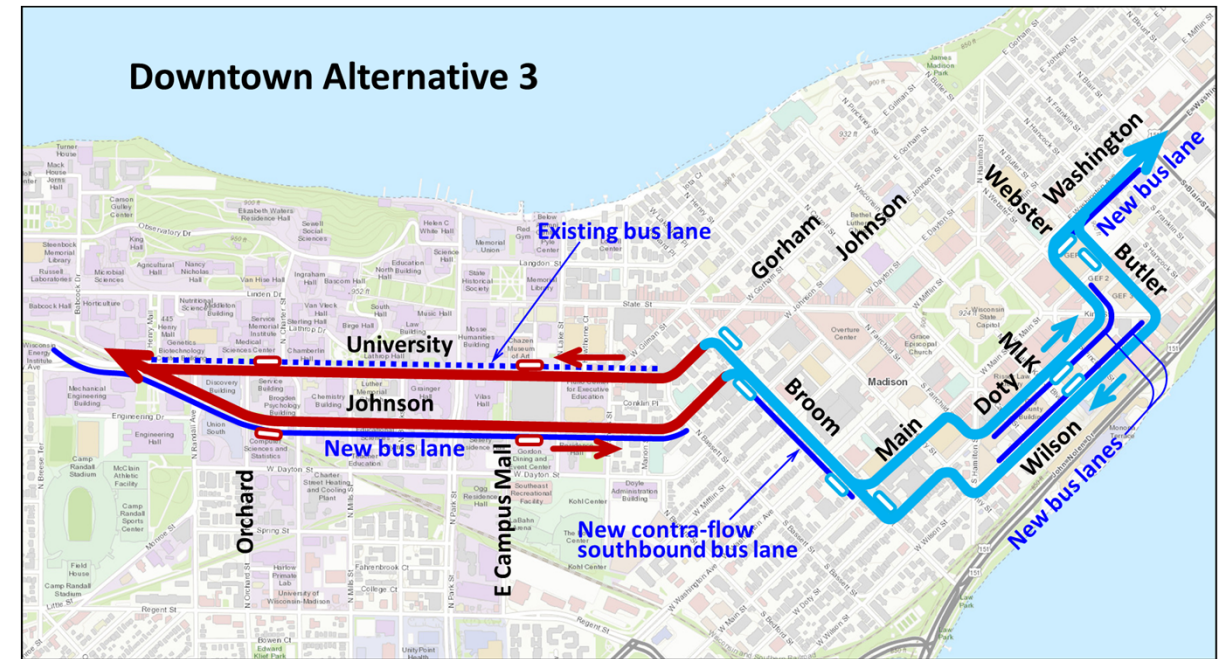
Downtown Alternative 1B



Dismissed Alternatives

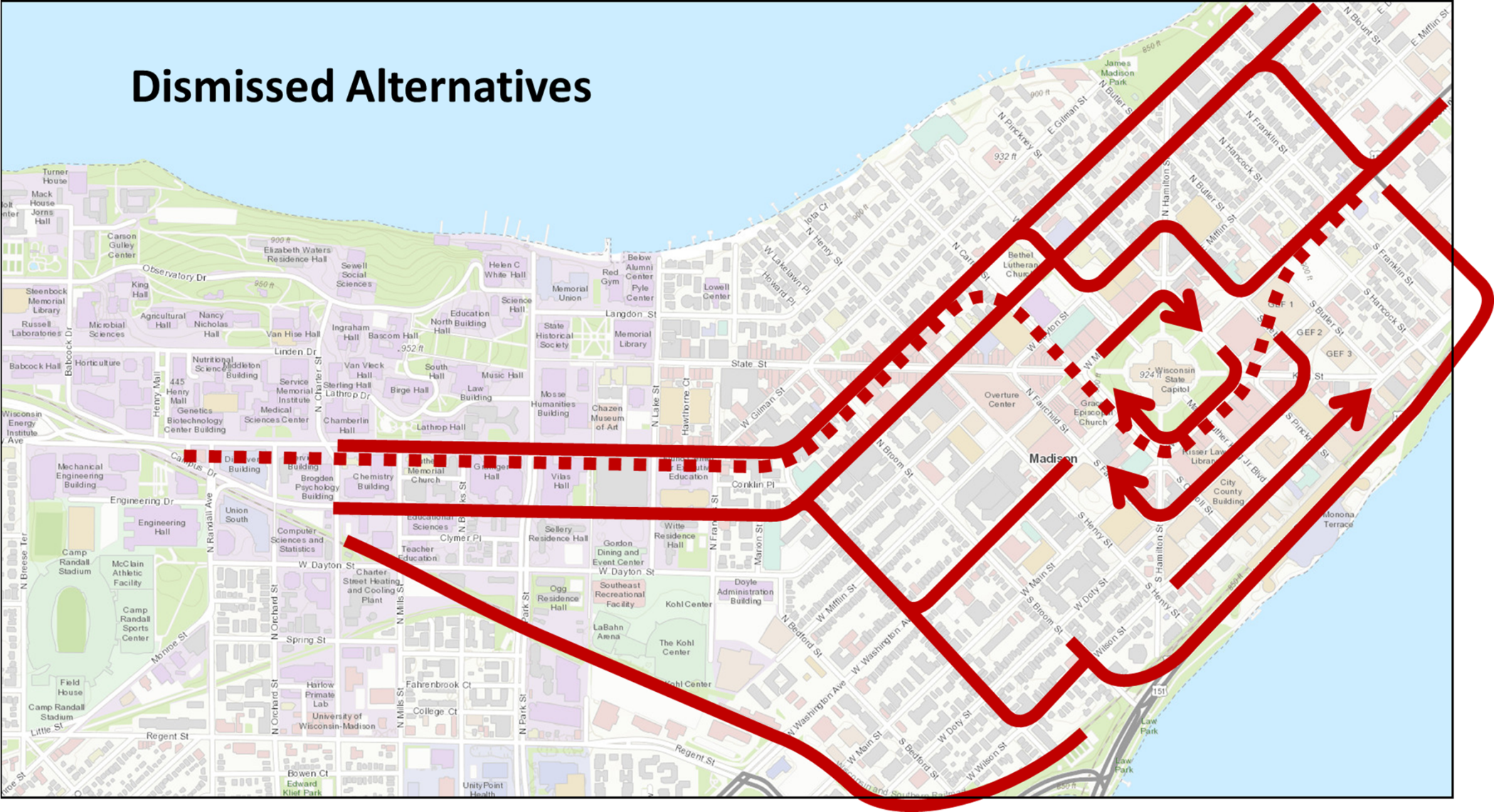


- Alt 2 – Broom/Henry
Unreliable during Overture Center Events

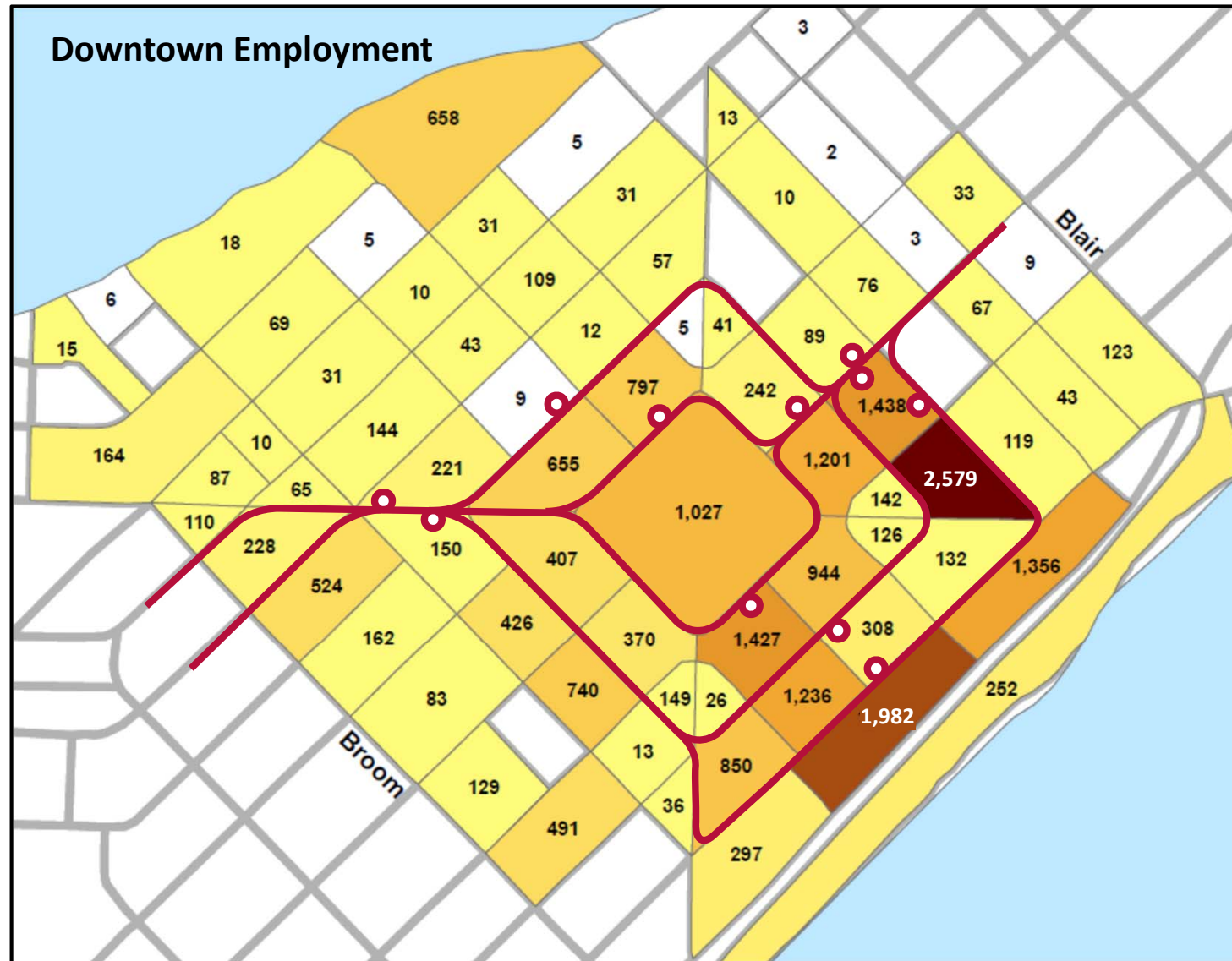


- Alt 3 – Two-way Broom
Insufficient access to State Street

Dismissed Alternatives



Employment



Legend:

- employment and services
- employment and retail
- residential and retail
- potential station

Map Labels:

- Children's Museum
- Bartell Theater
- Veteran's + Historical Museum
- Orpheum Theater
- Overture
- Library
- Madison Museum Of Contemporary Art
- Capitol
- CCB
- MMB
- Majestic Theater
- Monona Terrace

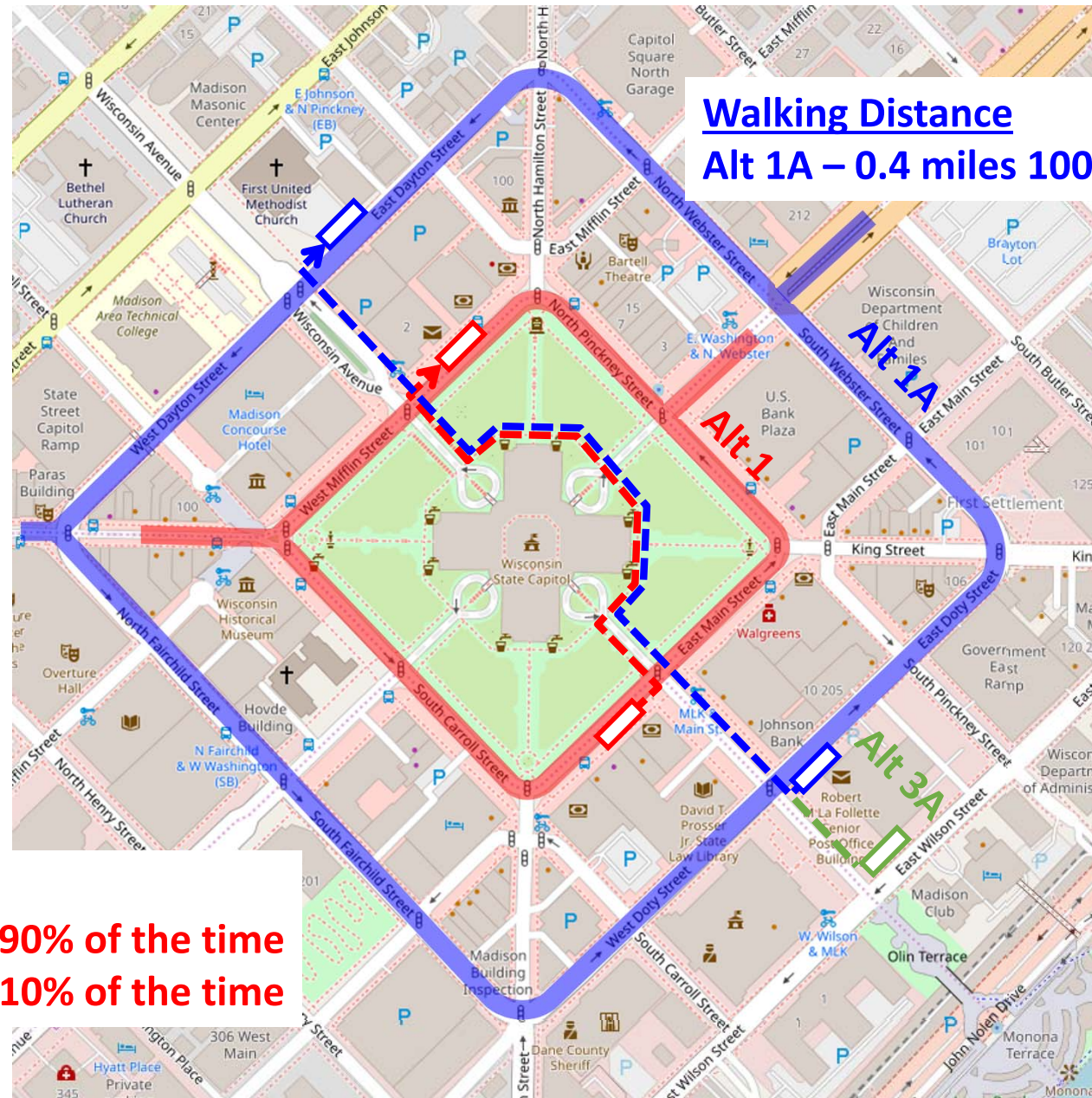
BRT Alternative and Potential Station

Dedicated Runningway

	Alternative			
	1	1A	1B	3A
Percent Bus Lanes	70	76	76	59
Miles of Bus Lanes	1.3	1.6	1.6	1.6

Between Broom Street and Blair Street

Station Pairs and Transfers



Walking Distance

Alt 1A – 0.4 miles 100% of the time

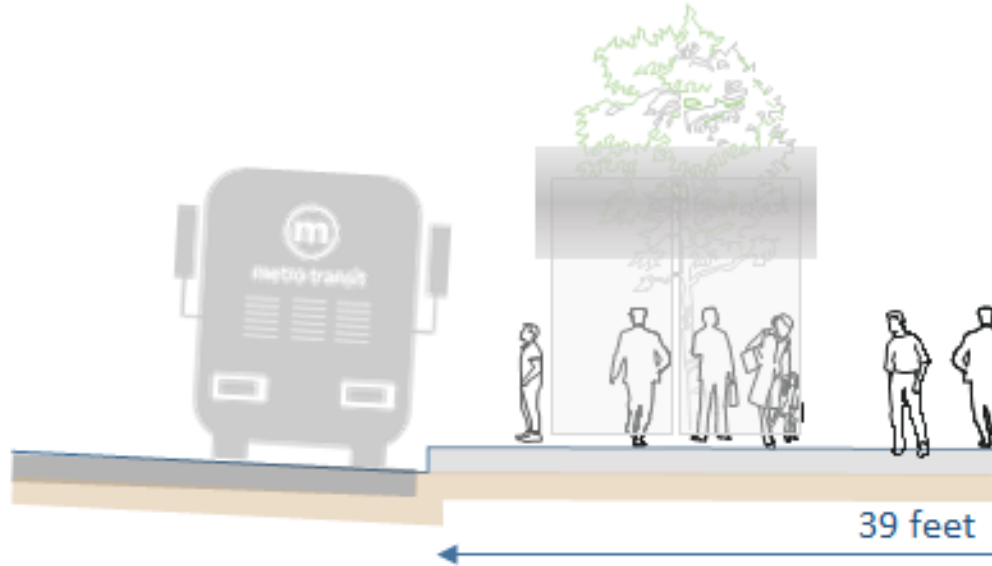
Walking Distance

Alt 1 – 0.25 miles 90% of the time

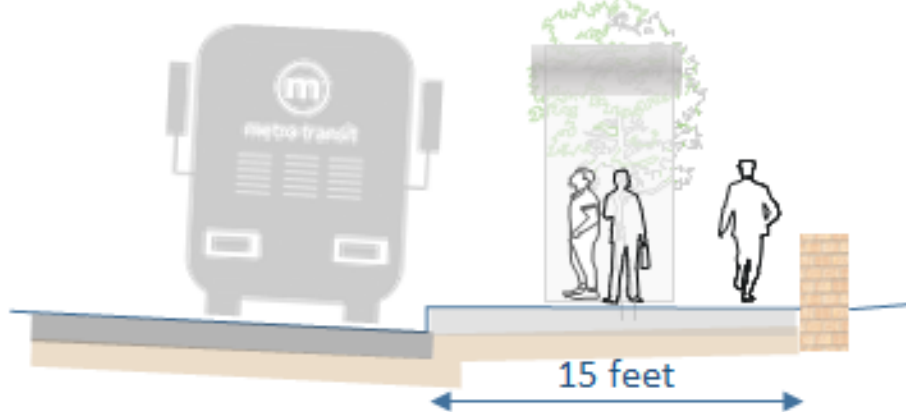
0.4 miles 10% of the time

Station Areas

Typical Space Available – Square – Alt 1



Typical Space Available – Outer Loop – Alt 1



Parking

	1	1A, 1B	3A
Total Parking Spaces Removed	4	85	68-104 *
Annual Revenue Lost **	\$8 K	\$170 K	\$136-208 K

* Depending on outcome of Wilson Street Study

** All spaces are metered

Bikes



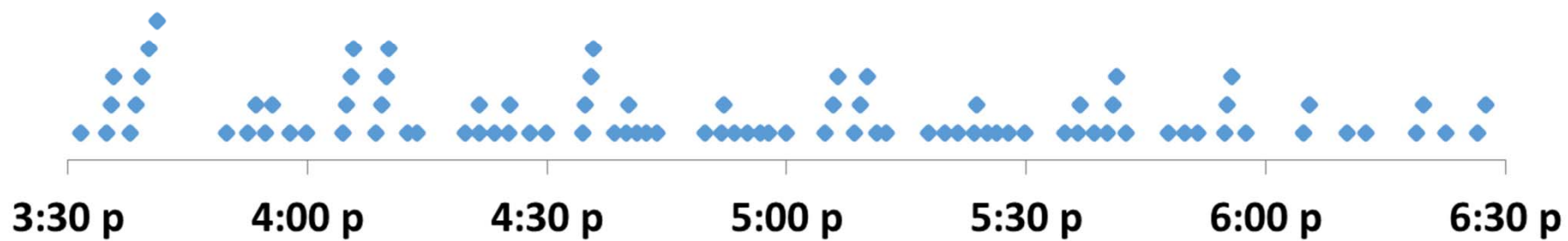
Pedestrians

- No significant changes to street infrastructure
- State Street – All alternatives reduce the daily total and greatly reduce the PM peak volumes
- Capitol Square – Alternative 1 replaces some local buses with electric BRT buses, reducing waiting and idling



State Street

2018 Afternoon Trip Distribution WB State at Johnson

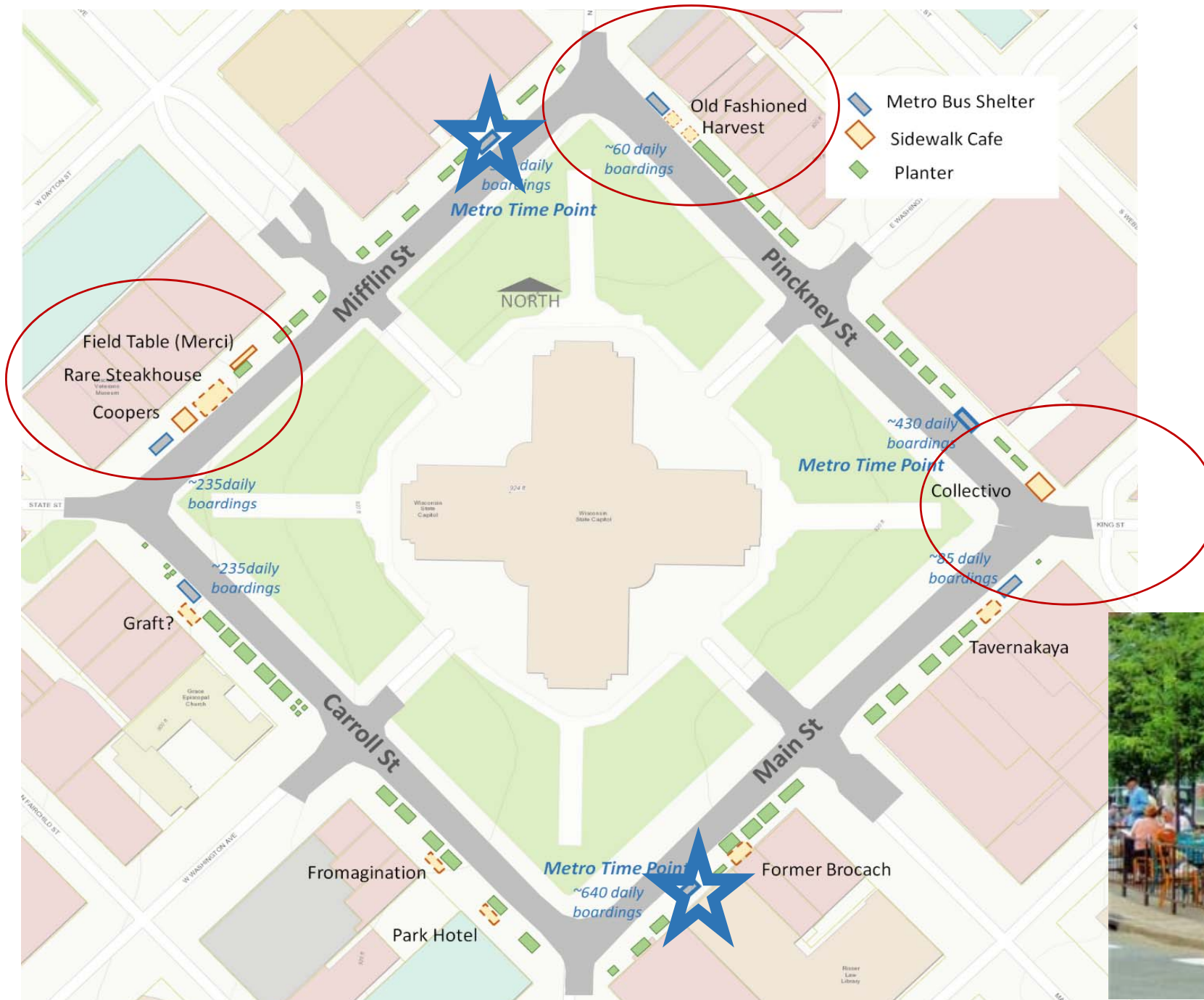


BRT Afternoon Trip Distribution WB State at Johnson



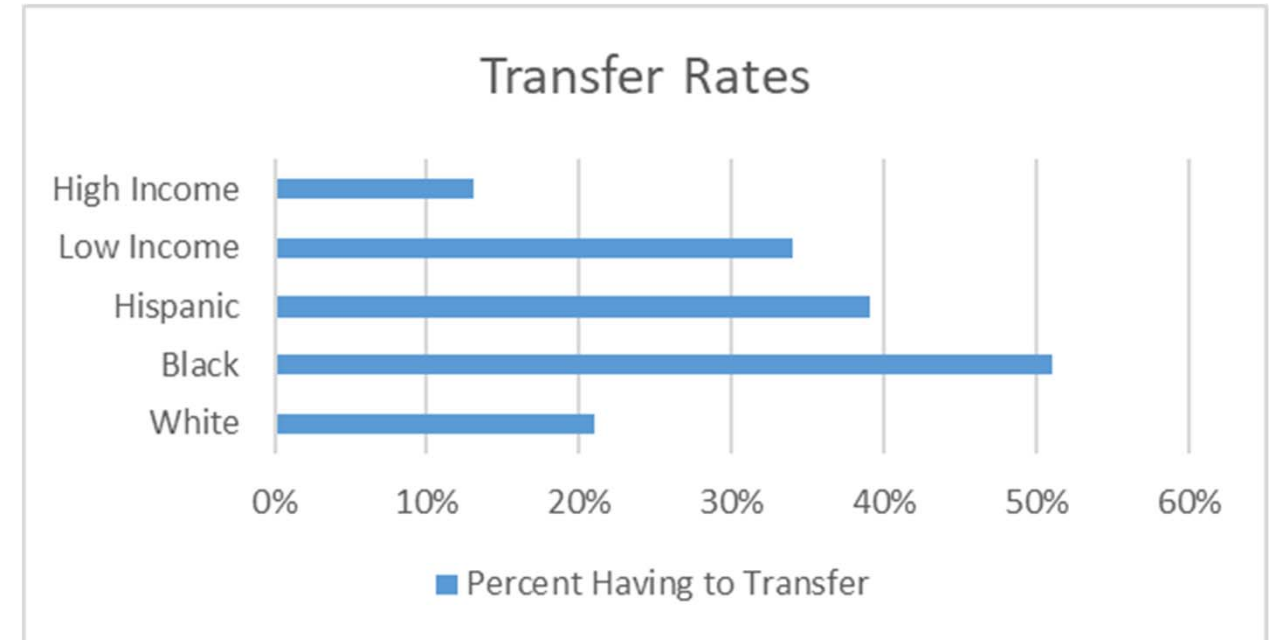
Business Concerns

- Concerns about buses:
 - Noise and emissions
 - Bus shelters take up space
 - More events could be held if buses didn't have to be detoured
- Other concerns:
 - Panhandling
 - Disruptive and illegal behavior



Equity

- 2015 On-board survey indicates low-income people and people of color transfer at higher rates than the general population
- One in four boardings on the square is a transfer.
- Transfers are how users access different parts of the system, and are particularly important for passengers traveling through. (ex Owl Creek)



Its not possible to provide ***direct*** routing to all the destinations a person make need to go.



Equity

City staff interviewed bus riders on the Capitol Square during the day:

- 55% indicated that walking one block to transfer would be a problem
 - Those with mobility problems expressed greatest concern
- 78% indicated that eliminating stops on the square would be a problem
- 25% indicated that detours were a problem for them



Staff Recommendation: Alternative 1

- Most direct access to the city center
- Easiest to use - EB and WB stations are within a block or two
- Generous space for stations
- Does not reduce parking revenue
- Reduces the number of buses on State Street during PM peak
- Allows most convenient transfers to and from local buses

(Mobility considerations)

Staff Recommendation: Alternative 1

- Can minimize impacts (improve) urban environment
 - Some local bus routes will be removed from the Capitol Square
 - Diesel buses will be replaced by electric buses
 - BRT infrastructure can be positioned to maintain sidewalk and event space
 - Some bus stops on the Capitol Square may be closed or relocated
- BRT will be detoured for special events, but improved with:
 - Real-time signs with more up-to-date information
 - Benches and shelters on the Capitol Loop
- Metro Transit Network Plan – 2020

Madison East-West Bus Rapid Transit (BRT) Planning Study

Downtown Route Options – February 3, 2020

MADISON DEPARTMENT



OF TRANSPORTATION