



Innovative Bike Infrastructure in the San Diego Region

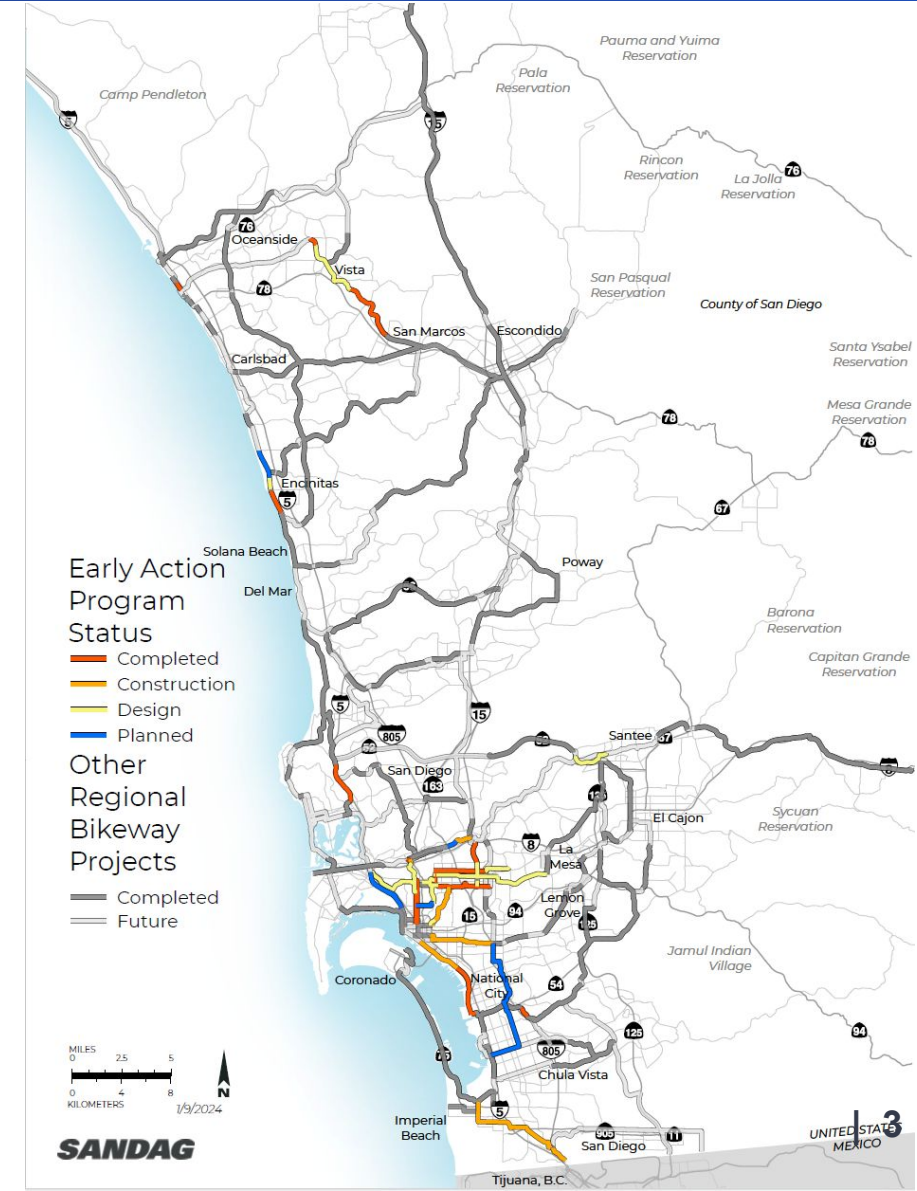
Chris Kluth

Regional Planning Manager – Active Transportation

Early Action Program Background

What is EAP?

- The Early Action Program is \$200 million commitment from SANDAG Board of Directors toward regional network of all ages and abilities bicycle and pedestrian projects
- Full range of facility types to match context and constraints



Case Study: Georgia Meade Bikeway

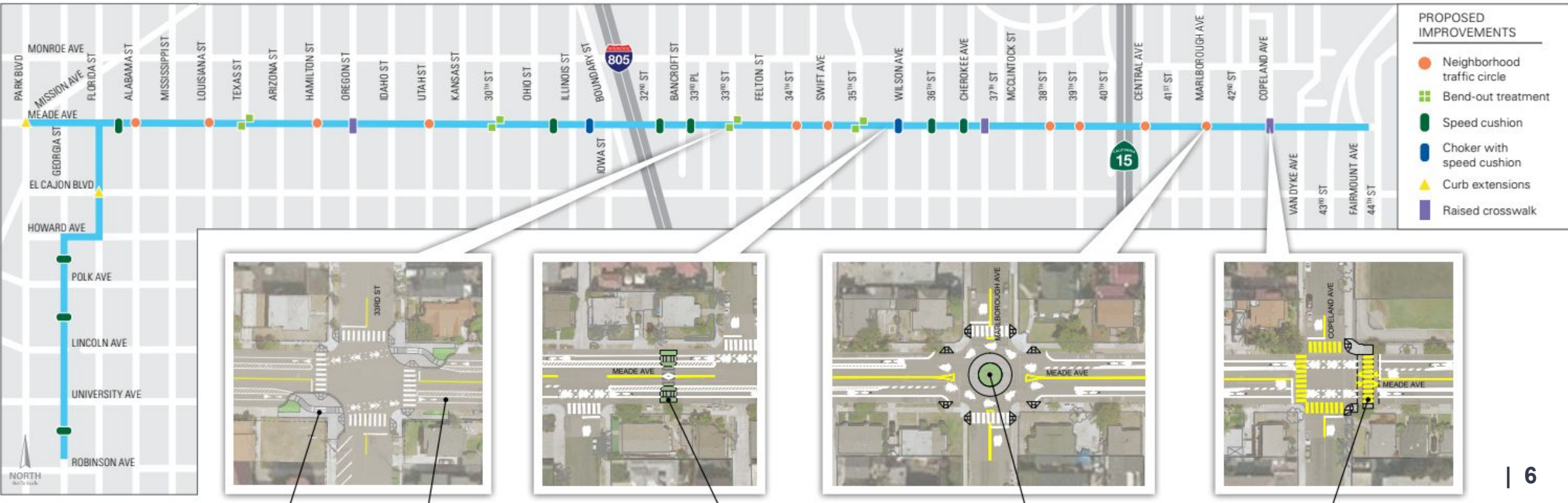
Project Features: Bike Bendouts, Bike Friendly Intersections, Neighborhood traffic circles, Sandy Calmers

Original Condition



Proposed Changes

- Intensive traffic calming strategy to reduce speed and volume
- Implement bendouts, chokers (Sandy Calmers), neighborhood traffic circles, raised crosswalks at schools



Bendouts

- Design guidance from MASSDOT
- High volume of right turns
- Overall improved visibility

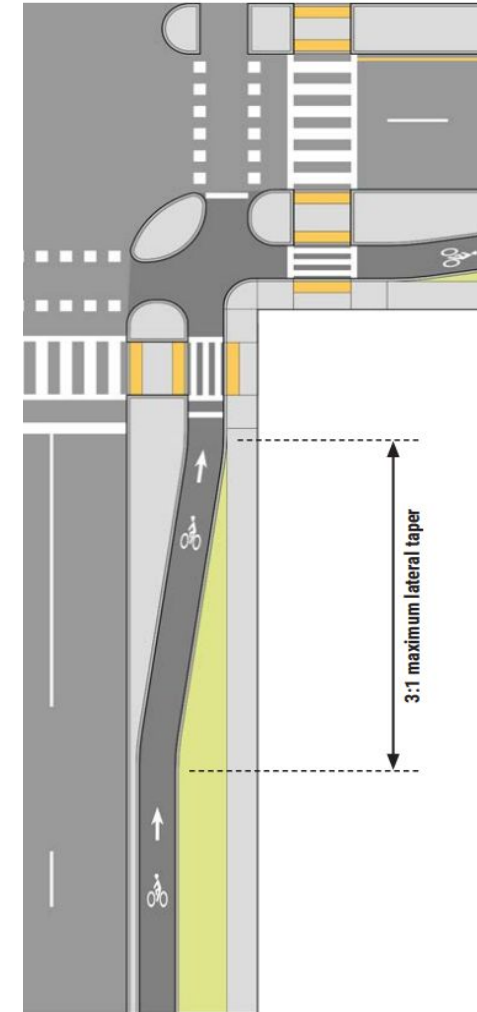


EXHIBIT 40: Bend-out Example

Challenges During Design

- ADA Compliance
- Advanced signal/loop detector
- Drainage



Challenges During Design



35th and Meade



35th and Meade



Neighborhood Traffic Circle

- Reduce vehicle speeds and discourage cut-through traffic
- Splitter islands and circle apron accommodate emergency vehicles and large trucks
- Facilitate future landscaping



Speed Cushion with Edge Islands (Traffic "Chokers")



Georgia – Meade Bikeway: Post Implementation



Bike Ridership **↑ 28%**

Pedestrian Travel **↑ 24%**

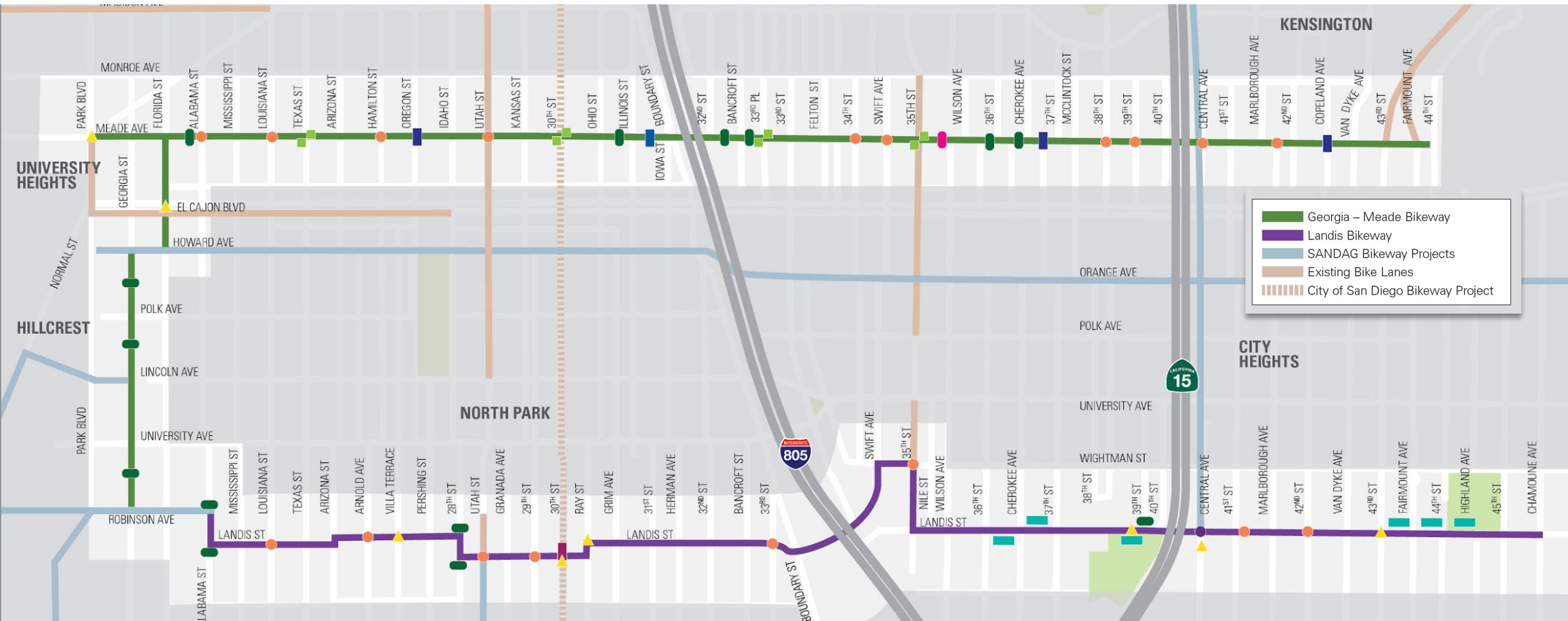
Motor Vehicle Travel **↓ 24%**

Motor Vehicle Speeds **↓ 13%**

Case Study: Landis Bikeway

Project Features: Contraflow connection, Bike Friendly Intersections, Neighborhood traffic circles, Grade separation

Georgia – Meade & Landis Bikeways



Contraflow Connection




Landis Bikeway: Post Implementation



Bike Ridership  **34%**

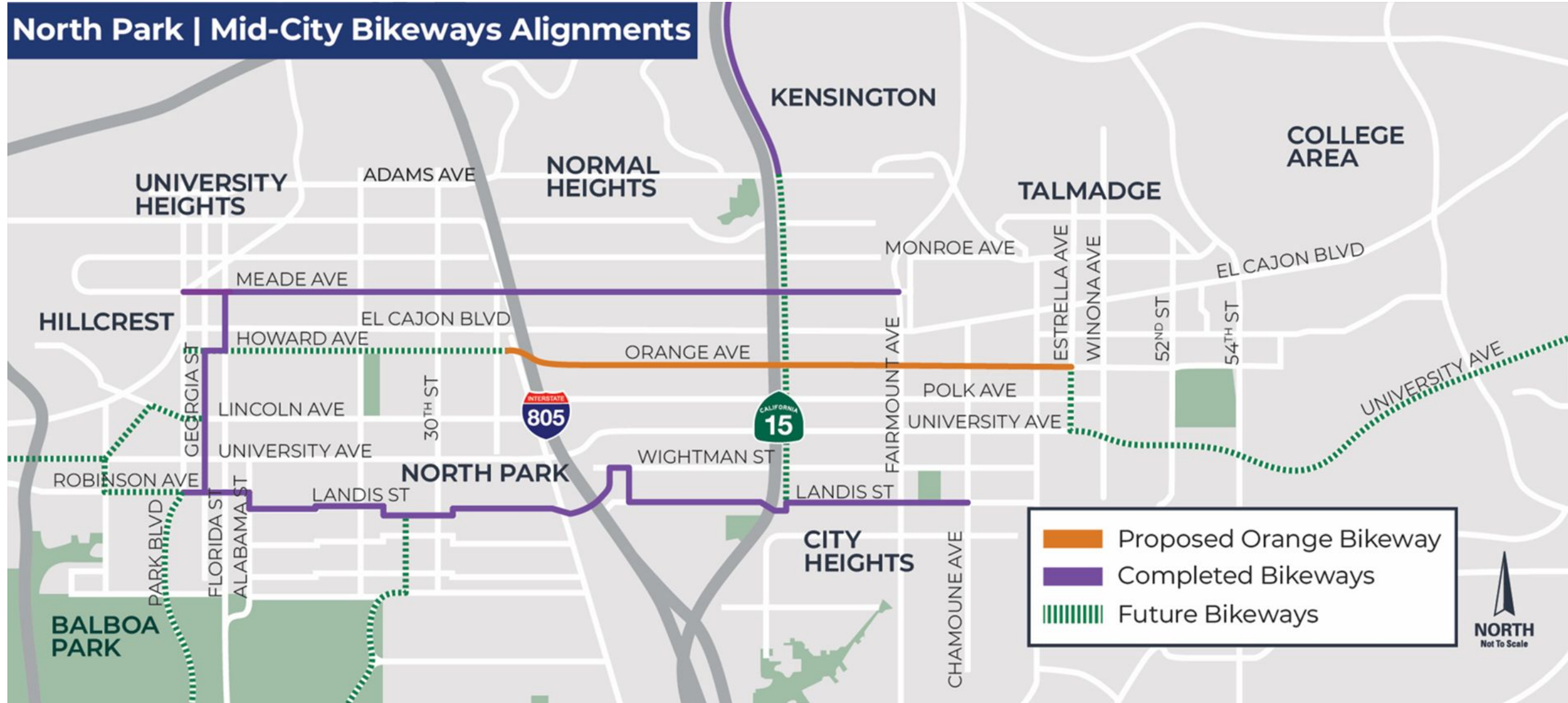
Pedestrian Travel  **13%**

Off-peak P_{85} Motor Vehicle
Segment Speeds  **10%**
from **27 mph** to **22 mph**

Upcoming Bikeways

Orange Bikeway

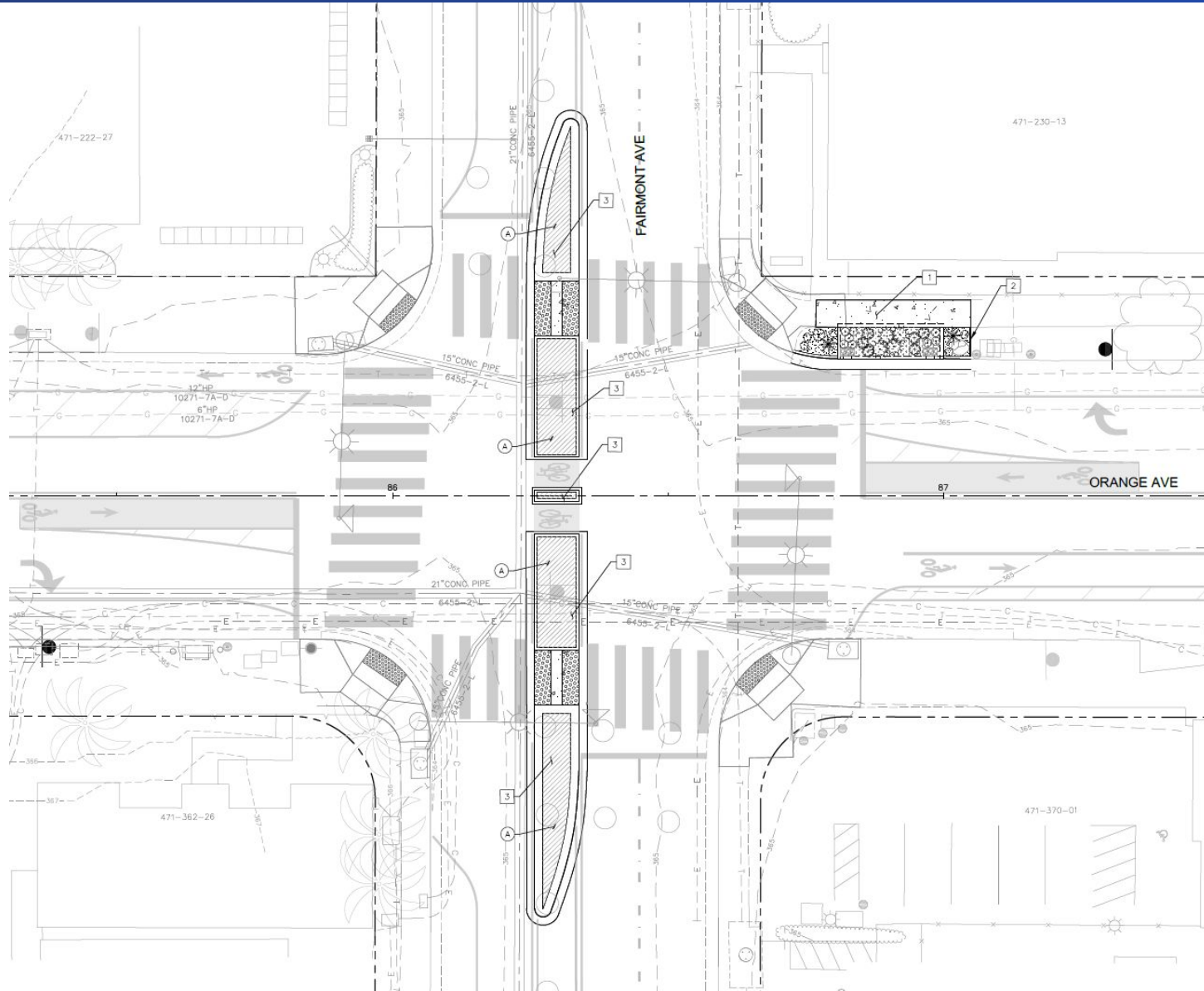
North Park | Mid-City Bikeways Alignments



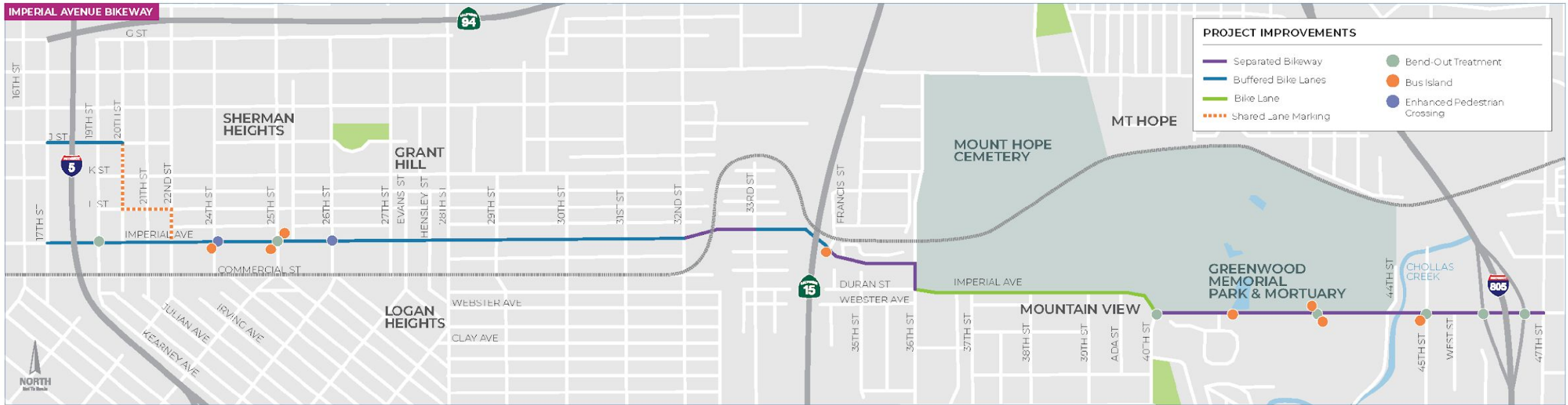
Traffic Diverters



Traffic Diverters



Imperial Bikeway



Separated Bikeways



Buffered Bike Lanes / Bike Lanes



Enhanced Pedestrian Crossings



Bus Islands



Bend-Out Treatments



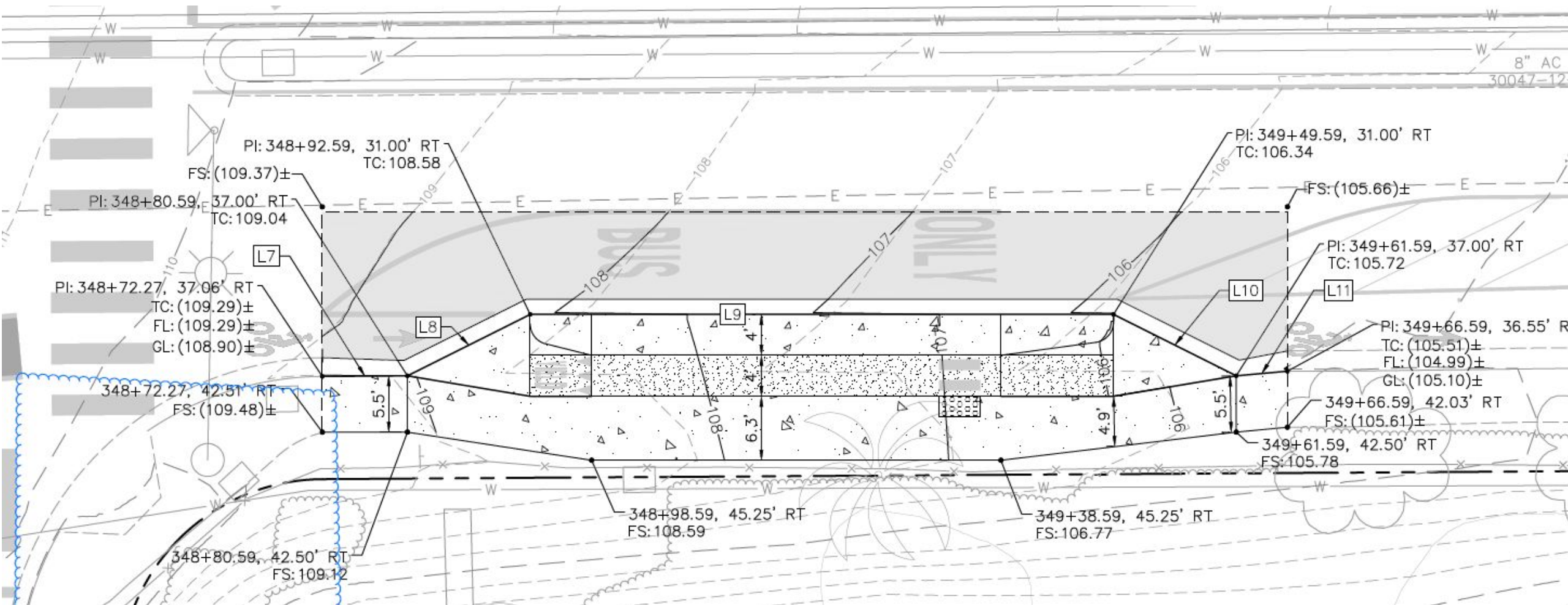
Shared Lane Markings



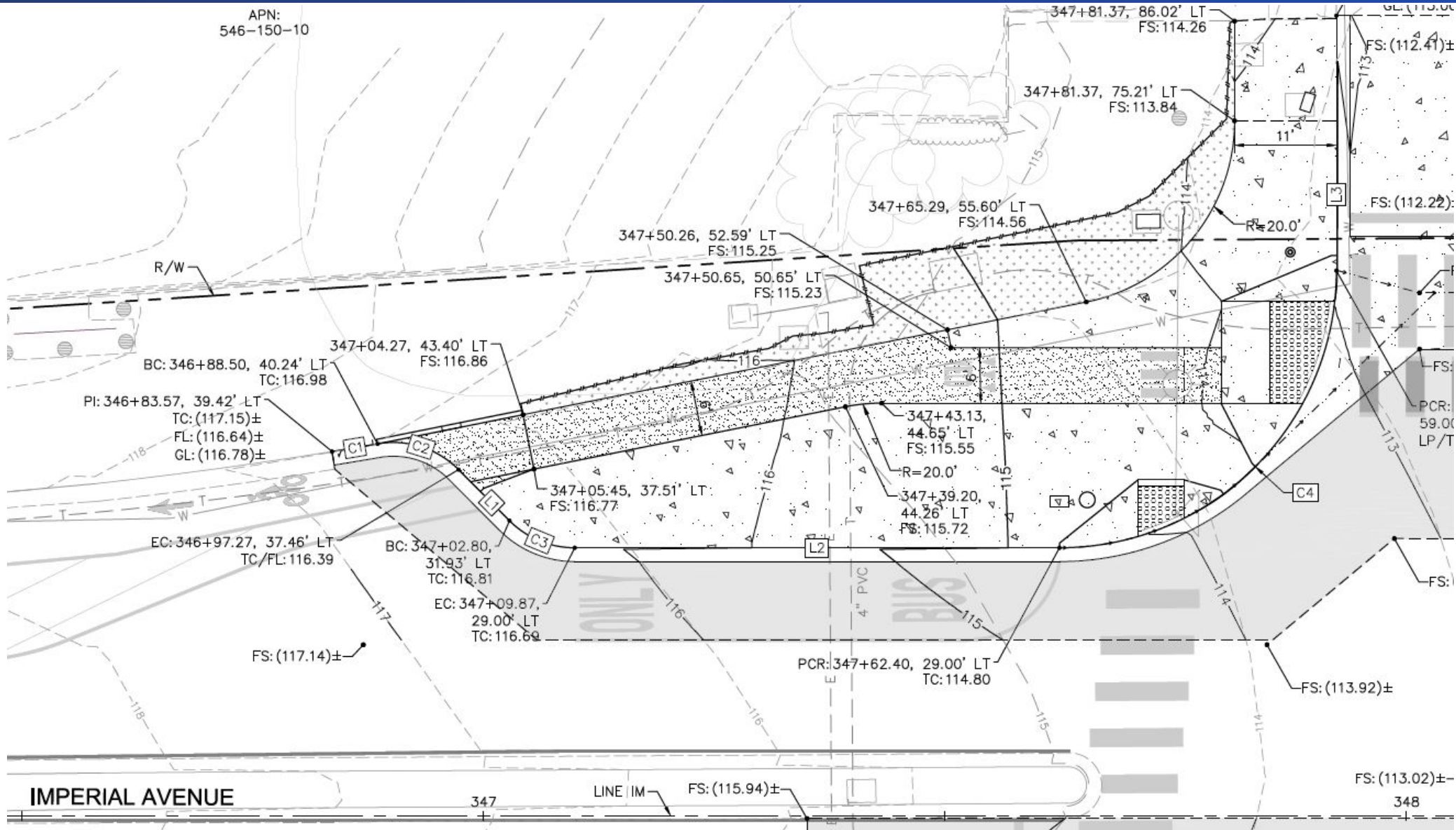
Bus Island Example (Burnaby, BC)



Bus Island Constrained Condition



Bulb-out and Bus Island Combo



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