



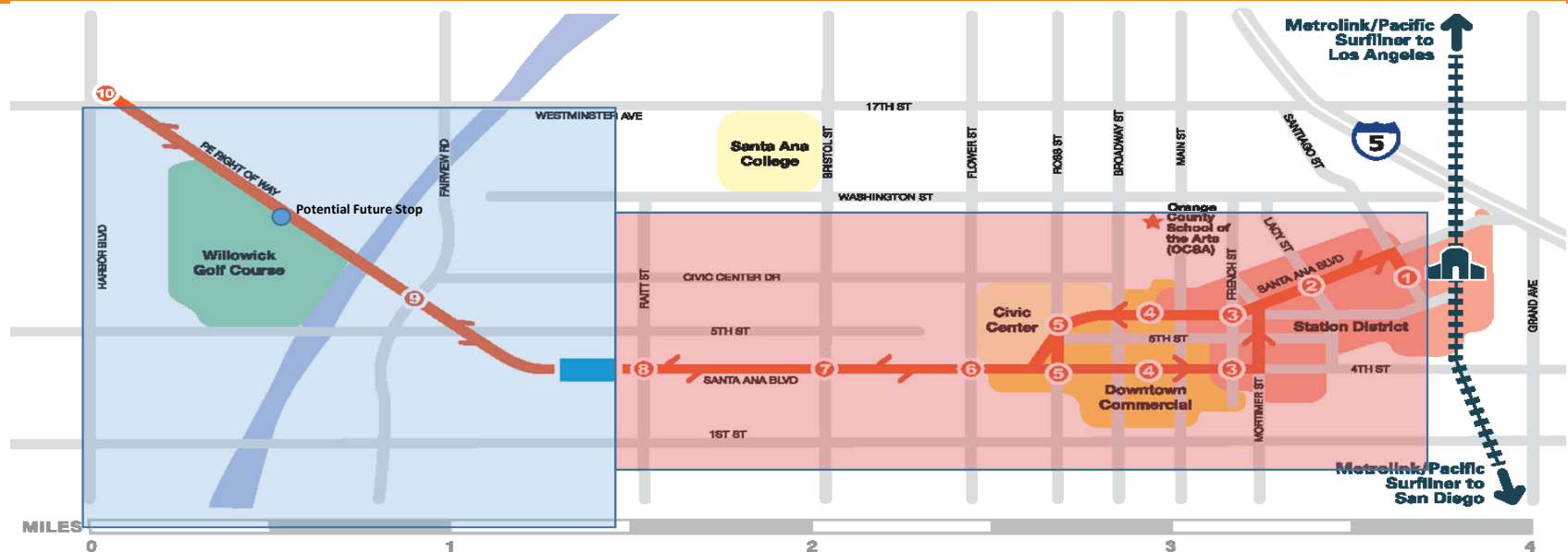
OC Streetcar Project Update

Background

- Measure M2 Project S – Transit Extensions to Metrolink approved by the Orange County voters in November 2006
- Key Project implementation dates:

Key Milestone	Date	Contract Execution Amount (in Millions)
Vehicle Contract Award	March 2018	\$51.52
Construction Contract Award	September 2018	\$220.53
Full Funding Grant Agreement Executed	November 2018	\$148.96

OC Streetcar Features



Pacific Electric Right-of-Way (ROW)

- Dedicated ROW owned by the Orange County Transportation Authority (OCTA)
- Double-Track, Ties, and Ballast
- Two Bridges-Westminster and Santa Ana River
- Two Gated Crossings-Fairview and 5th Street
- Maintenance facility for eight cars west of Raitt Street
- Center Platforms
- Two-Wire Overhead Catenary System (OCS)

STREET RUNNING

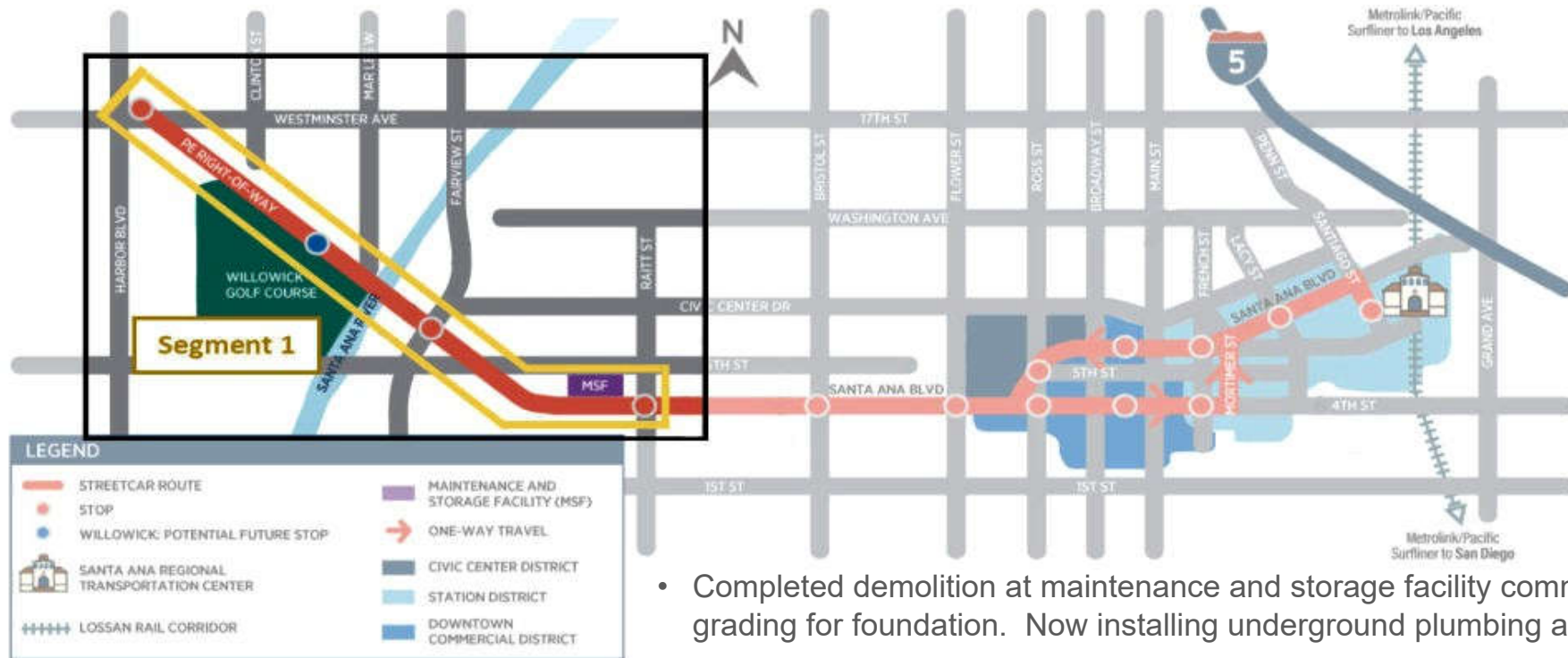
- Traffic Signal Priority
- One-way couplet downtown
 - 4th Street Eastbound, Santa Ana Boulevard Westbound
- Embedded Track (Block Rail)
- Side Platforms (except Santa Ana Regional Transportation Center)
- Protected bike lane on Santa Ana Boulevard
- One-Wire OCS with underground feeder

Utilities

- Wet utilities are being relocated by the streetcar construction contractor: water, sewer, and storm drain
- Eight private utilities are in the process of being relocated
- Final utility relocation work for the private utilities is expected to be complete by September 2019, with exception of final AT&T relocation after sewer lines are complete



Construction—Segment 1



- Completed demolition at maintenance and storage facility commercial site and grading for foundation. Now installing underground plumbing and electrical
- Installing foundations for the Santa Ana River Bridge
- Once complete, the crew will move to the Westminster Avenue Bridge
- Installing drainage improvements
- Grading in preparation for ballasted trackwork installation

Santa Ana River Bridge



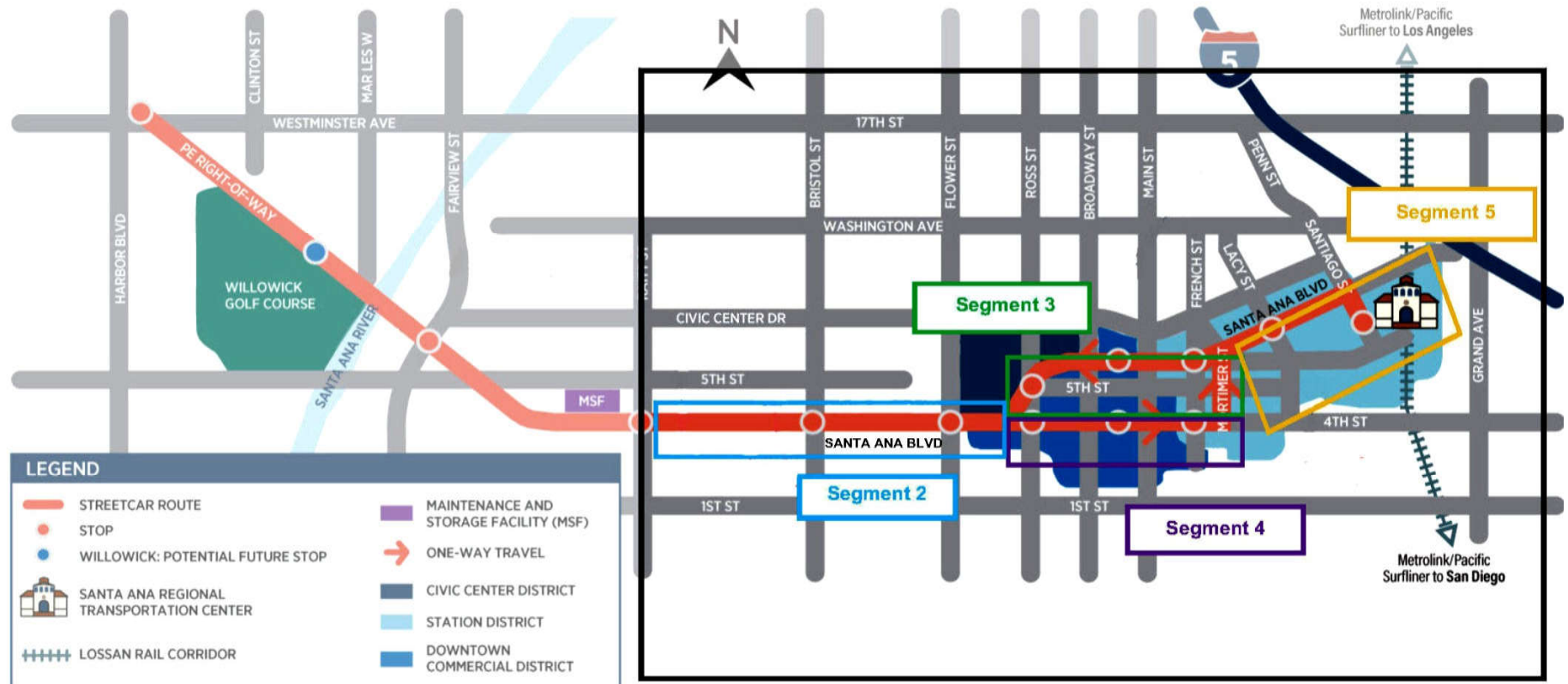
Photo taken 6/26/19 looking southwest

Maintenance and Storage Facility



Photo taken 6/26/19 looking northeast

Construction—Segments 2 through 5



- Installing sewer lines, waterlines, and storm drains—in preparation for track installation late this year

Vehicles

- Production of the first car shell is anticipated to be complete in December 2019.
- Coordination continues between OCTA, Siemens, and Walsh in the development of the Wheel to Rail Interface Plan that details the integration of the vehicle with the project infrastructure and track tolerance.
- Procurement of integration and engineering services of OCTA's Intelligent Transportation Management System with the streetcar vehicles.



Other key OC Streetcar updates

- Responded to questions on the Operations and Maintenance (O&M) Request for Proposals. Proposals due July 24, 2019.
- Award of O&M contract is anticipated for first quarter 2020.
- Ongoing coordination with the Federal Transit Administration, City of Santa Ana, City of Garden Grove, Orange County Fire Authority, OCFCD, and OC Parks.



Outreach

- **Biweekly Construction News emails**
 - Segment by Segment details of construction activities
 - Distributed 2,000+ recipients
- **Stakeholder Working Group**
 - Representatives from Neighborhood Associations, the City of Santa Ana, Santa Ana Unified School District, and Santa Ana Business Association
 - Provided updates on construction activities, vehicle manufacturing, operations & maintenance and construction sequencing
- **Two Community Open Houses**
 - Distributed 3,000+ invitations with construction sequencing information
 - 30 Attendees with positive feedback
- **Community Events**
 - Garden Grove High School (130 contacts)
 - Communication Linkage Awards Banquet (300 + attendees)
- **Targeted outreach to affected businesses and residents**

