



Board Report

File #: 2019-0642, **File Type:** Oral Report / Presentation

Agenda Number: 29.

CONSTRUCTION COMMITTEE SEPTEMBER 19, 2019

SUBJECT: PROGRAM MANAGEMENT MAJOR PROJECT STATUS REPORT

ACTION: ORAL REPORT

RECOMMENDATION

RECEIVE oral report on the Major Project Status by the Chief Program Management Officer.

DISCUSSION

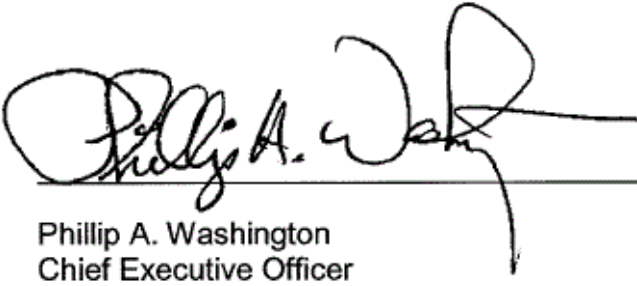
Update report covering the month of September 2019 by the Chief Program Management Officer.

ATTACHMENTS

Attachment A - Program Management Major Project Status Report

Prepared by:

- **Crenshaw/LAX** - Sameh Ghaly, Sr EO Project Mgmt., (213) 418-3369
- **Regional Connector** - Gary Baker, EO Project Mgmt., (213) 893-7191
- **Westside Purple Line Ext 1** - James Cohen, EO Project Mgmt., (213) 922-7911
- **Westside Purple Line Ext 2** - Michael McKenna, EO Project Mgmt., (213) 312-3132
- **Westside Purple Line Ext 3** - Kimberly Ong, EO Project Mgmt., (323) 903-4112
- **Patsaouras Plaza Busway Station** - Timothy Lindholm, EO Project Engr., (213) 922-7297
- **Willowbrook/Rosa Park Station** - Timothy Lindholm, EO Project Engr., (213) 922-7297
- **The New Blue** - Timothy Lindholm, EO Project Engr., (213) 922-7297
- **I-210 Barrier Replacement** - Androush Danielians, EO Project Engr., (213) 922-7598
- **I-5 North** - Abdollah Ansari, Sr EO Construction & Engr., (213) 922-4781
- **I-5 South** - Abdollah Ansari, Sr EO Construction & Engr., (213) 922-4781
- **Presentation** - Yohana Jonathan, Princ. Prog. Mgmt. Analyst, (213) 418-3031



Phillip A. Washington
Chief Executive Officer























Program Management Major Project Status Report

Presented By

Richard Clarke

Chief Program Management Officer

PROJECT BUDGET & SCHEDULE STATUS SUMMARY CHART

Project	Cost Performance	Schedule Performance	Comments
Crenshaw/LAX			Project is 93% complete. The forecast revenue service date is Summer 2020.
Regional Connector			Project is 58% complete and proceeding on schedule and within budget.
Westside Purple Line Extension-Section 1			Project is 50% complete and proceeding on schedule and within budget.
Westside Purple Line Extension-Section 2			Project is 20% complete and proceeding on schedule and within budget.
Westside Purple Line Extension-Section 3			C1152 Stations, Trackwork, Systems, and Testing Contract – Notice to Proceed (NTP) commenced on July 16, 2019.
Patsaouras Plaza			Project is 70% complete. Archaeological and Native American monitoring continues. Foundation work for the pedestrian overcrossing, busway canopy, elevator and walkway are complete.
Willowbrook/Rosa Parks Station			Customer Service Building and mobility hub ongoing at 60% completion. Blue Line Station platform and mezzanine work progressing to topping slab and final utility infrastructure. In full coordination with New Blue. Package B 100% bid package has been delivered and is under review by Metro.
Metro Blue Line Projects			Metro Expo Line closure to be open on 8/24 while remaining work continues on the MBL. Testing of the North Segment will take longer than the South Segment due to the amount of new equipment that needs to be tested.
I-210 Barrier Replacement			In Final Design, Metro Systems has performed simulations and determined less than 10 minute headways during construction of Project 1. Metro met with Caltrans and has obtained conceptual approval of proposed stage construction & reduced lane widths for Project 1.
I-5 North: SR 118 to SR 134			Segment 3 (Empire) is 75% complete. Segment 4 (Magnolia to SR-134) is 92% complete.
I-5 South: Orange County Line to I-605			Segment 2 (Valley View) is 46% complete. Segment 3 (Rosecrans) is open to traffic. Segment 4 (Imperial) is 96% complete. Segment 5 (Florence) is 82% complete.

September 2019

Construction Committee

Los Angeles County Metropolitan Transportation Authority



On target



Possible problem



Major issue



Metro 2

PROGRAM MANAGEMENT - OVERALL

- FTA Quarterly meeting – September 4, 2019
- Started update of Program Management Plan (PMP)
- Tracking construction cost indices
- Unifier (Records Management) system implementation cutover in process
- Began implementation of new Quality Management System

CRENSHAW/LAX TRANSIT PROJECT

BUDGET

	<u>Current</u>	<u>Forecast</u>
TOTAL COST	\$2,058M	\$2,058M

SCHEDULE

	<u>Current Summer</u>	<u>Forecast Summer</u>
REVENUE OPERATION	2020	2020

- Overall Project Progress is 93% complete; addressing contractor construction schedule.
- Contractor continues work to test the rail system software over a 10-weekend period at the Green Line and Crenshaw/LAX junction.
- Working with 3rd parties to complete power drops for traction power substations in support of testing systems equipment.
- Contractor preparing for Crenshaw Blvd road restoration in the Hyde Park neighborhood.



Weekend testing of the rail system software



Grading for Aviation/Century Station plaza and parking lot

September 2019



On target



Possible problem



Major issue



Metro 4

Construction Committee

Los Angeles County Metropolitan Transportation Authority

REGIONAL CONNECTOR TRANSIT PROJECT

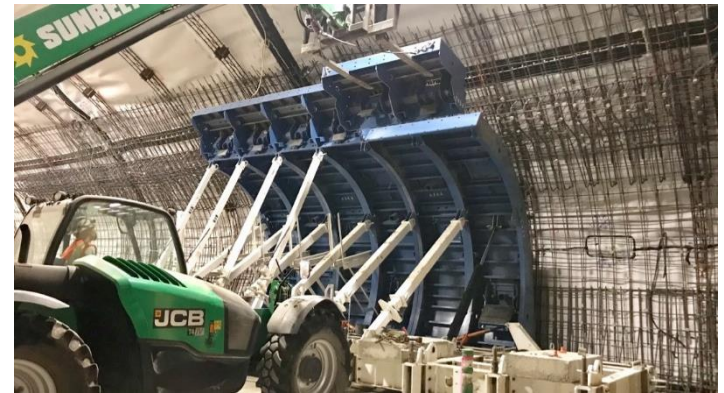
BUDGET

	<u>Current</u>	<u>Forecast</u>
TOTAL COST	\$1,810M	\$1,810M

SCHEDULE

	<u>Current</u>	<u>Forecast</u>
REVENUE OPERATION	Spring/Summer 2022	Spring/Summer 2022

- Overall Project Progress is 58% complete.
- Tunnels:** Structural concrete commenced in Sequential Excavation Method (SEM) Cavern.
- Little Tokyo/Arts District Station, WYE and 1st Street:** Structural concrete placement for station walls continues. Pre-Bus Bridge piling activities underway.
- Historic Broadway Station:** Structural concrete continues in station entrance and throughout the concourse level.
- Grand Av Arts/Bunker Hill Station:** Structural concrete walls continue to be erected at multiple levels throughout the station.
- Flower Street:** Completed excavation and continued structural concrete. Completed break through of knock-out panel at 7th/Metro Station.





Wall form installation in SEM Cavern



Break through knock-out panel at 7th/Metro Center Station

September 2019

 On target

 Possible problem

 Major issue

Construction Committee

Los Angeles County Metropolitan Transportation Authority

WESTSIDE PURPLE LINE EXTENSION – SECTION 1

BUDGET

	<u>Current</u>	<u>Forecast</u>
TOTAL COST*	\$3,154M	\$3,154M

* Includes Board approved LOP budget plus finance costs.

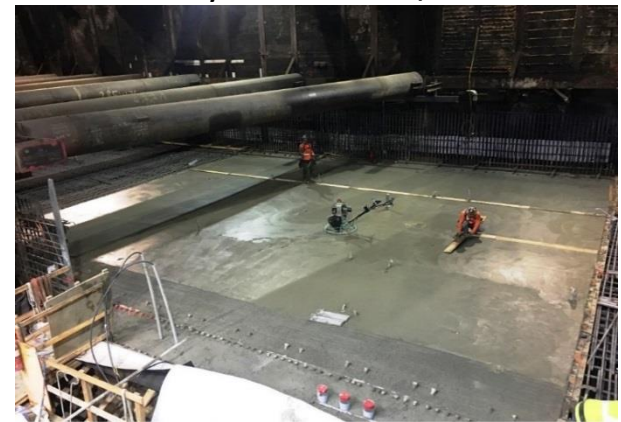
SCHEDULE

	<u>Current</u>	<u>Forecast</u>
REVENUE	Fall	Fall
OPERATIONS	2024 (FFGA)	2023

- Overall Project Progress is 50% complete.
- Wilshire/Western Retrieval Shaft:** Both Tunnel Boring Machines (TBM) broke through at the Western shaft in June 2019. Both TBMs are in the process of being transported from Western to the La Brea Station Yard.
- Wilshire/La Brea Station:** HDPE and rebar installation for exterior walls above concourse slab continues. Placement of exterior wall concrete is scheduled for August 21, 2019. Work on the concourse level high bay area is scheduled to begin in December 2019.
- Wilshire/Fairfax Station:** Invert rebar, MEP and concrete placement continues. Invert slab placement scheduled to complete in September 2019.
- Wilshire/La Cienega Station:** Level D strut installation and daily maintenance of dewatering wells continues. Excavation to invert continues and remains scheduled to complete in August 2019.
- Tunneling:** Reach 1 cross passage work is scheduled to start in October 2019. Reach 2 TBM launch is scheduled for late September / early October 2019.



TBM Gantry Shield at Wilshire/Western



Invert Concrete Placement at Wilshire/Fairfax

September 2019



On target



Possible problem



Major issue

Construction Committee

Los Angeles County Metropolitan Transportation Authority



Metro 6

WESTSIDE PURPLE LINE EXTENSION – SECTION 2



BUDGET

	<u>Current</u>	<u>Forecast</u>
TOTAL COST*	\$2,530M	\$2,530M

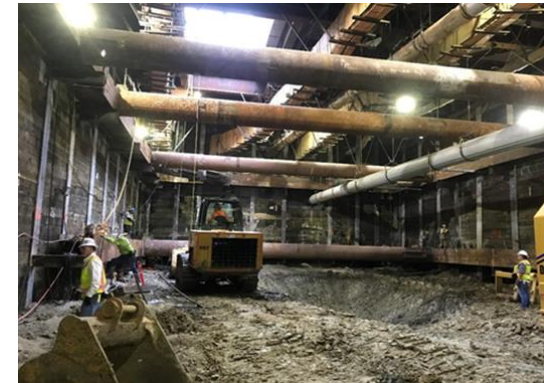
* Includes Board approved LOP budget plus finance costs.



SCHEDULE

	<u>Current</u>	<u>Forecast</u>
REVENUE OPERATION	Winter 2026 (FFGA)	Summer 2025

- Overall Project progress is 20% complete.
- Final design progress is 94% complete.
- **Century City Constellation**
 - Tunnel Boring Machine (TBM) launch box excavation is on going. The installation of the third level bracing has been completed and the fourth level bracing has commenced.
 - Tunnel shaft excavation and installation of walers/struts is ongoing.
 - LABOE granted an extension for the full street closure of Constellation Blvd until December 2019 .
 - Sound wall installation at the AT&T property has been completed.
 - The ceremonial TBM naming and unveiling event was held on June 17, 2019. The names “Harriet” and “Ruth” were selected as the names for the two TBM’s.
 - Cable pulling and splicing for AT&T and LADWP is anticipated to complete prior to the start of piling activities west of the TBM Launch Box.
 - Santa Monica bus layover construction is complete.
- **Wilshire/Rodeo**
 - Sound wall pile installation at Canon Yard is complete.
 - Potholing for underground utilities are ongoing.
 - Pre-Construction condition surveys are ongoing.



TBM Launch Box Excavation in Century City



Tunnel Shaft Excavation in Century City

September 2019



On target



Possible problem



Major issue

Construction Committee

Los Angeles County Metropolitan Transportation Authority



Metro 7

WESTSIDE PURPLE LINE EXTENSION – SECTION 3

OK BUDGET		
	<u>Current</u>	<u>Forecast</u>
TOTAL COST*	\$3,611M	\$3,611M

* Includes Board approved LOP budget plus finance costs.

OK SCHEDULE		
	<u>Current</u>	<u>Forecast</u>
REVENUE	TBD	2027
OPERATION		

- C1151 Tunnel Contract
 - Detailed design is ongoing, including coordination with Southern California Edison (SCE) for approval of duct bank design to provide temporary power for TBMs.
 - Continue coordination with FTA for the amended Veterans Affairs (VA) Memorandum of Agreement (MOA). Associated Historic Resources Monitoring and Discovery Plan (HRMDP) reviews are nearing completion.
 - Continue real estate negotiations for access to VA property. Draft Access Easement Agreement (AEA) and draft Right of Entry (ROE) are under review.

- C1152 Stations, Trackwork and Systems Contract
 - NTP commenced on July 16, 2019.

- Other Third Party Utility Relocation Work
 - Joint trench for Verizon and Frontier telecom is ongoing.



Main Line A Excavation and Potholing



Hand Dug Excavation for Fiber Optic Conduit

September 2019

OK On target
 ◆ Possible problem
 ▲ Major issue

Construction Committee

Los Angeles County Metropolitan Transportation Authority

PATSAOURAS BUS PLAZA STATION

BUDGET

	<u>Current</u>	<u>Forecast</u>
TOTAL COST	\$50.9M	\$50.9M

SCHEDULE

	<u>Current</u>	<u>Forecast</u>
SUBSTANTIAL COMPLETION	Spring 2020	Spring 2020

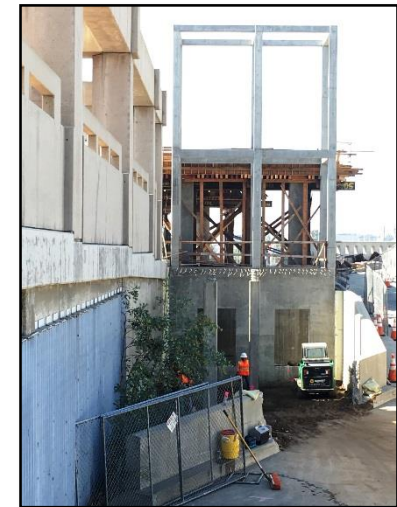
- Overall project progress at approximately 70% complete.
- Archaeological and Native American monitoring continues, causing occasional construction delays.
- Pedestrian overcrossing foundations completed
- Busway canopy foundations completed.
- Elevator and walkway foundation completed
- Walkway and Platform Falsework completed
- Retaining wall completed



Pedestrian Walkway Columns





Elevator Platform Falsework



Elevator Enclosure

September 2019

 On target

 Possible problem

 Major issue

Construction Committee

Los Angeles County Metropolitan Transportation Authority

WILLOWBROOK/ROSA PARKS STATION

BUDGET

	<u>Current</u>	<u>Forecast</u>
TOTAL COST	\$109.3M	\$109.3M

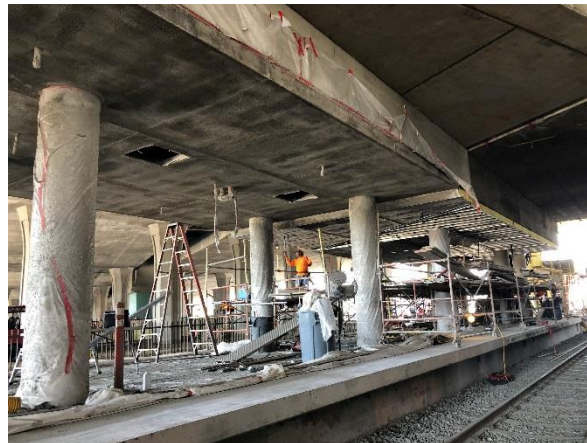
SCHEDULE

	<u>Current</u>	<u>Forecast</u>
SUBSTANTIAL COMPLETION	Summer 2020	Summer 2020

- Package A: Customer Service and Mobility Hub building MEP infrastructure work nearly complete. Finish work ongoing. Formwork for public plaza has begun.
- Package C: Structural work has been completed with final utility infrastructure installation near completion. Topping slab, systems and finishes set to proceed. Project focus is on meeting New Blue operations deadline.
- Package B: Final coordination of 100% documents submitted for Metro review.



Blue Line Platform Work



Mezzanine Extension and Platform Work ongoing



Mobility Hub and Plaza Work

September 2019



On target



Possible problem



Major issue

Construction Committee

Los Angeles County Metropolitan Transportation Authority



Metro 10

THE NEW BLUE CLOSURE

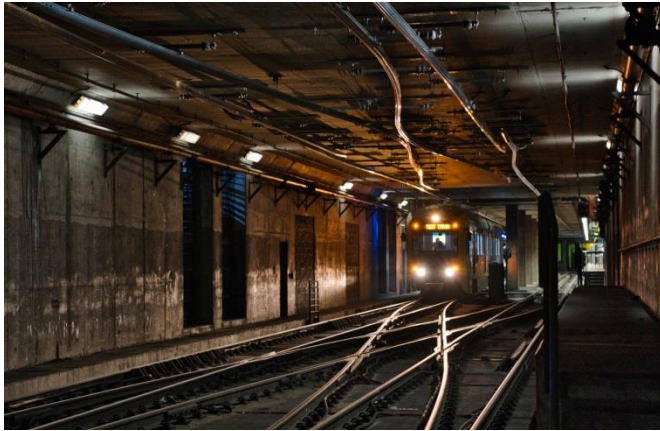
◆ BUDGET

	<u>Current</u>	<u>Forecast</u>
TOTAL COST	\$221.3M	\$221.3M

◆ SCHEDULE

	<u>Current</u>	<u>Forecast</u>
SUBSTANTIAL COMPLETION	Fall 2019	Fall 2019

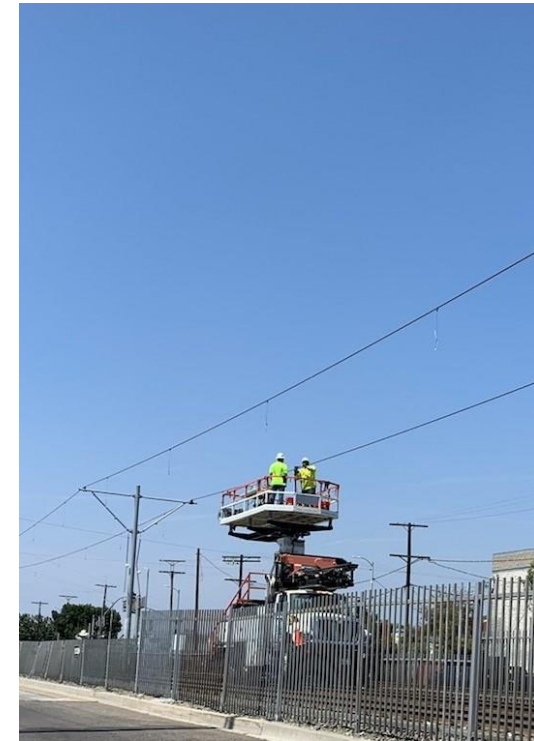
- Overhead conductor rail (OCR) completed for the 7th/ Metro Tunnel
- Expo Line will re-open August 24th as planned.
- South Segment work completed and operating normally. Some punch list items remaining which are being addressed.
- North side construction work is progressing per plan; however, Metro test team forecasts more than double the amount of testing will be required compared to the South Segment.



Testing of the new Overhead Conductor Rail (OCR)



Replacing trackwork at Expo Junction



Installing New Overhead Catenary System (OCS)

September 2019

🟢 On target

◆ Possible problem

⚠ Major issue

Construction Committee

Los Angeles County Metropolitan Transportation Authority

I-210 BARRIER REPLACEMENT PROJECT

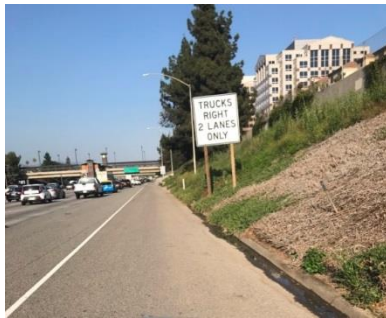
BUDGET

	<u>Current</u>	<u>Forecast</u>
TOTAL COST	\$22.54M	\$22.54M
	Design	Design

SCHEDULE

	<u>Current</u>	<u>Forecast</u>
Complete Design (Proj 1)	Summer 2019	Summer 2019
Complete Design (Proj 2)	Spring 2020	Spring 2020

- Metro met with Caltrans and obtained conceptual approval of the Stage Construction Plans including the proposed reduced lane widths for Project 1 to avoid lane closures.
- Draft Communication Plan has been developed and is ready for Metro review.
- Project 1: Segment from Michillinda to Iconic Bridge – Train Simulations have been performed and the results show less than 10 minute headways with single tracking during construction of Project 1 is achievable.
- Project 2: Segment from west end of the project to Michillinda – Development of alternative barrier system to avoid freeway lane closure for Project 2 is underway.



Newly Installed Caltrans Freeway Sign





Incident in 2014




Newly Installed Speed Limit Sign

September 2019

 On target

 Possible problem

 Major issue

Construction Committee

Los Angeles County Metropolitan Transportation Authority

I-5 Construction Projects (By Caltrans)



September 2019

Construction Committee

Los Angeles County Metropolitan Transportation Authority



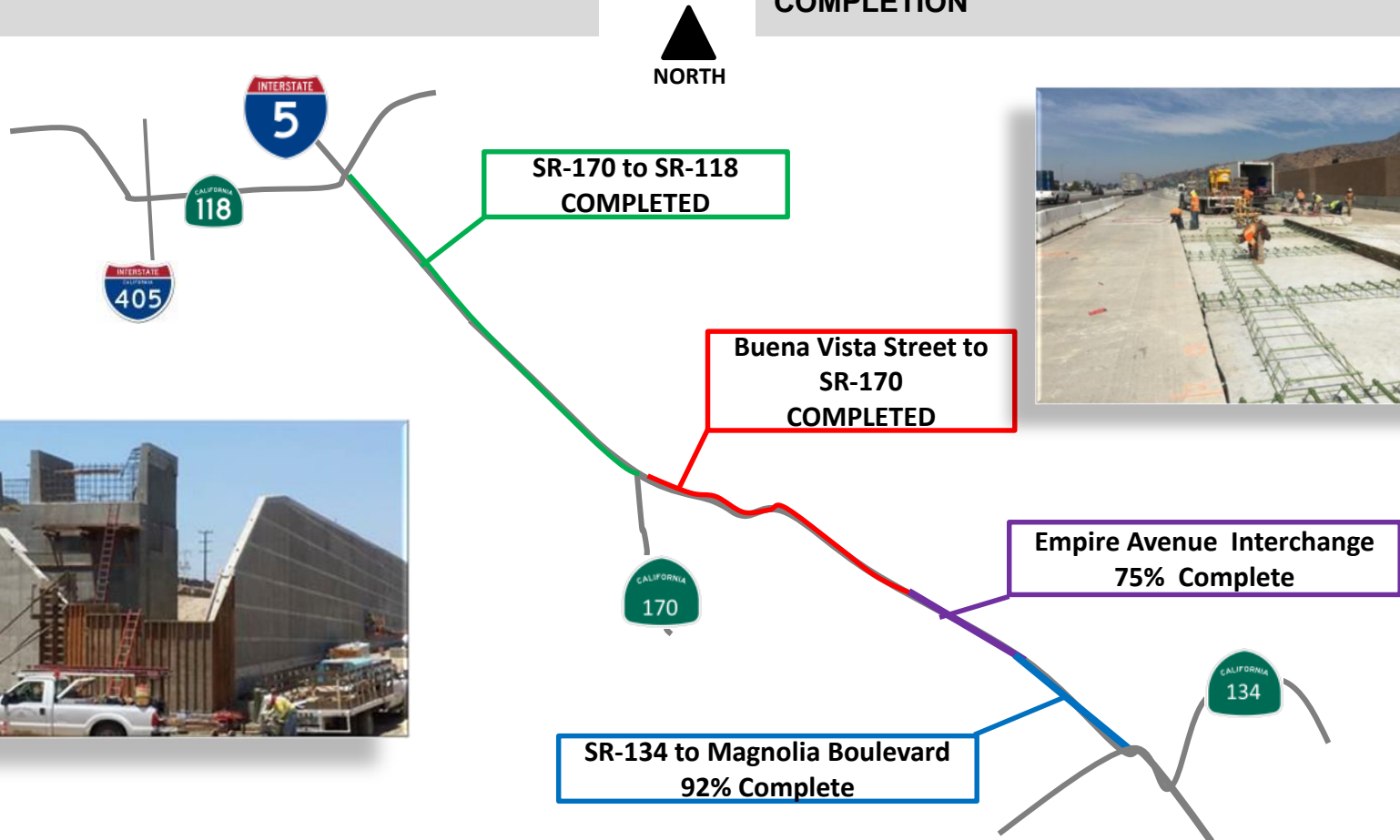
Metro 13

I-5 NORTH: SR 118 TO SR 134



! BUDGET		
TOTAL COST	Current	Forecast
	\$880.9M	TBD

! SCHEDULE		
ANTICIPATED PROJECT COMPLETION	Current	Forecast
	Spring 2022	Summer 2022



September 2019

● On target
 ◆ Possible problem
 ! Major issue

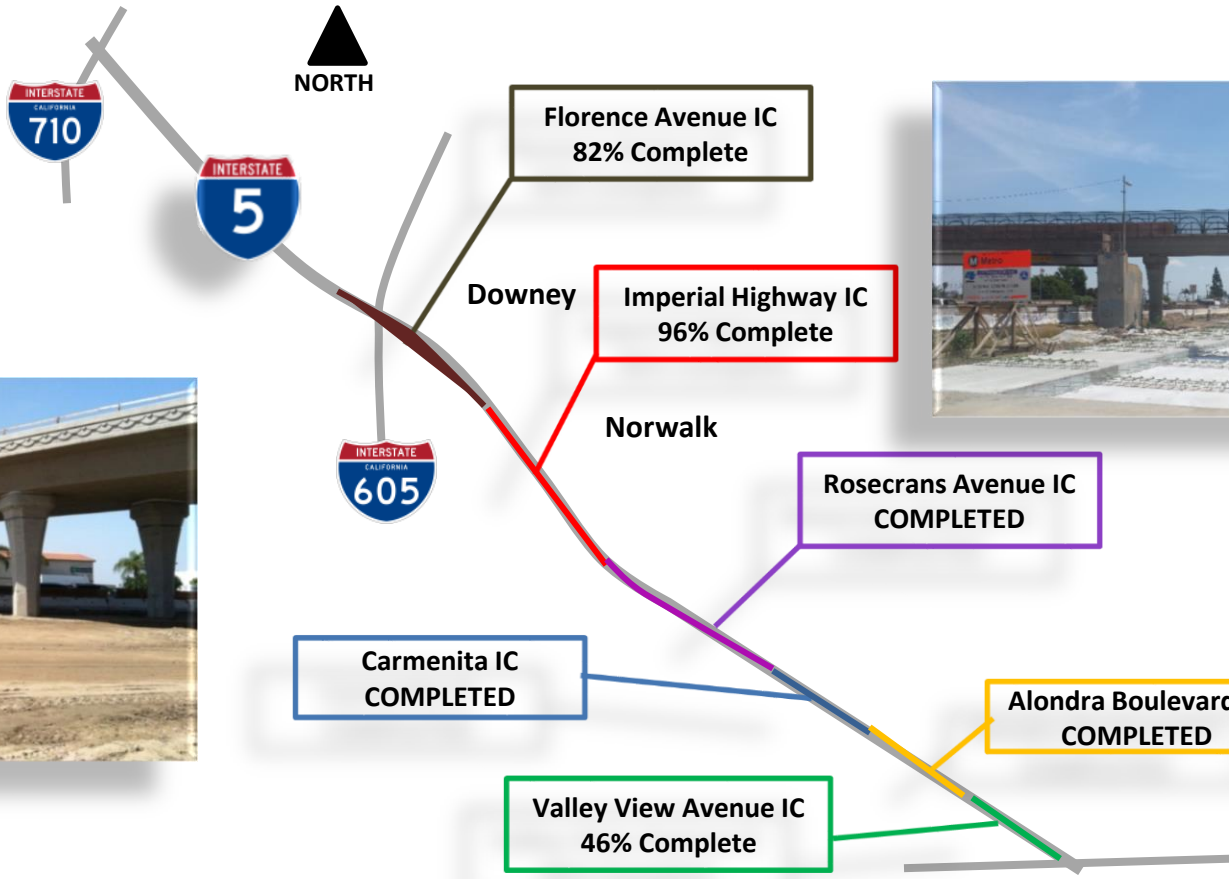


I-5 SOUTH: ORANGE COUNTY LINE TO I-605



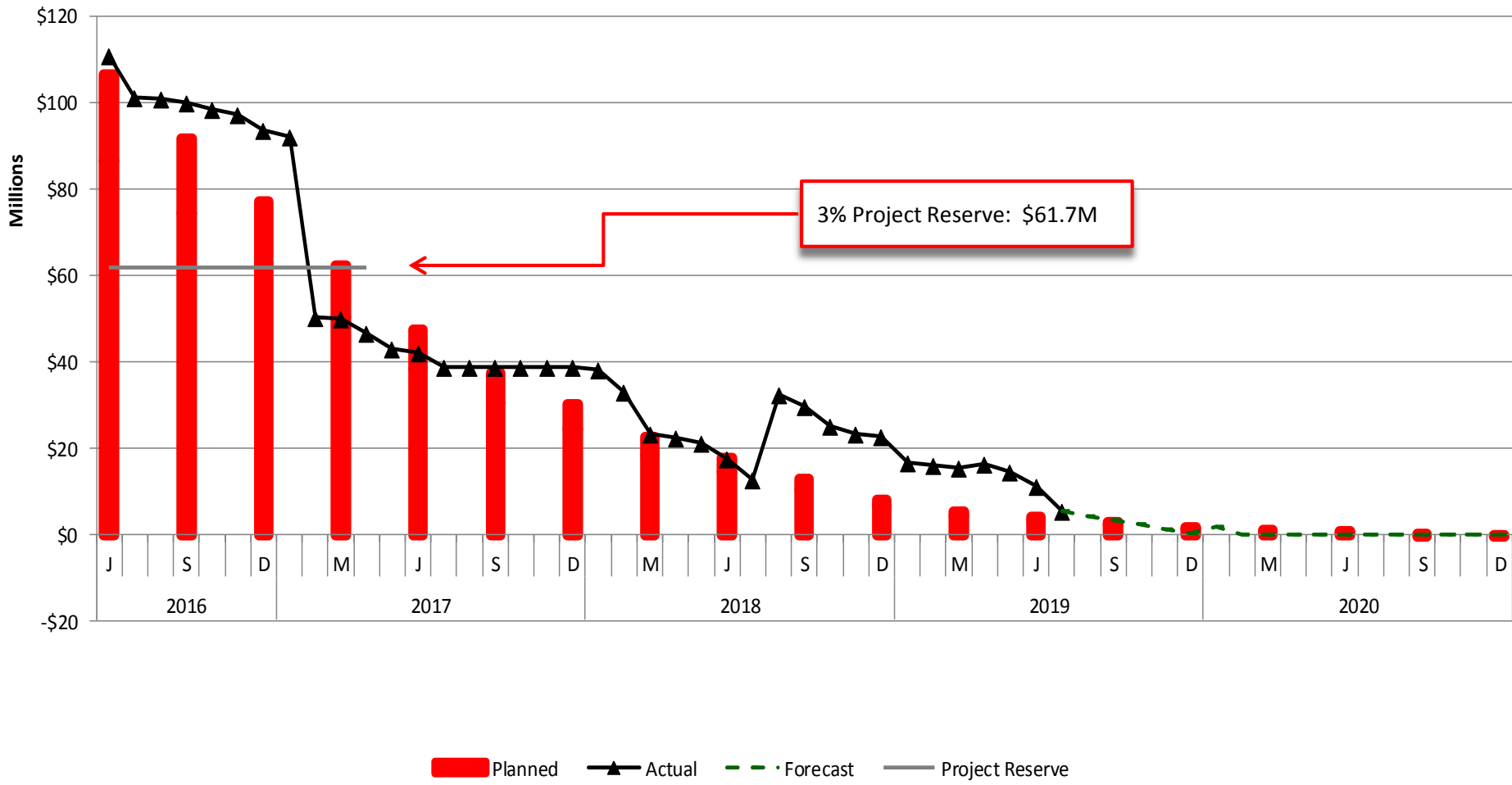
OK BUDGET		
	Current	Forecast
TOTAL COST	\$1.888B	TBD

◇ SCHEDULE		
	Current	Forecast
ANTICIPATED PROJECT COMPLETION	Fall 2022	Winter 2022

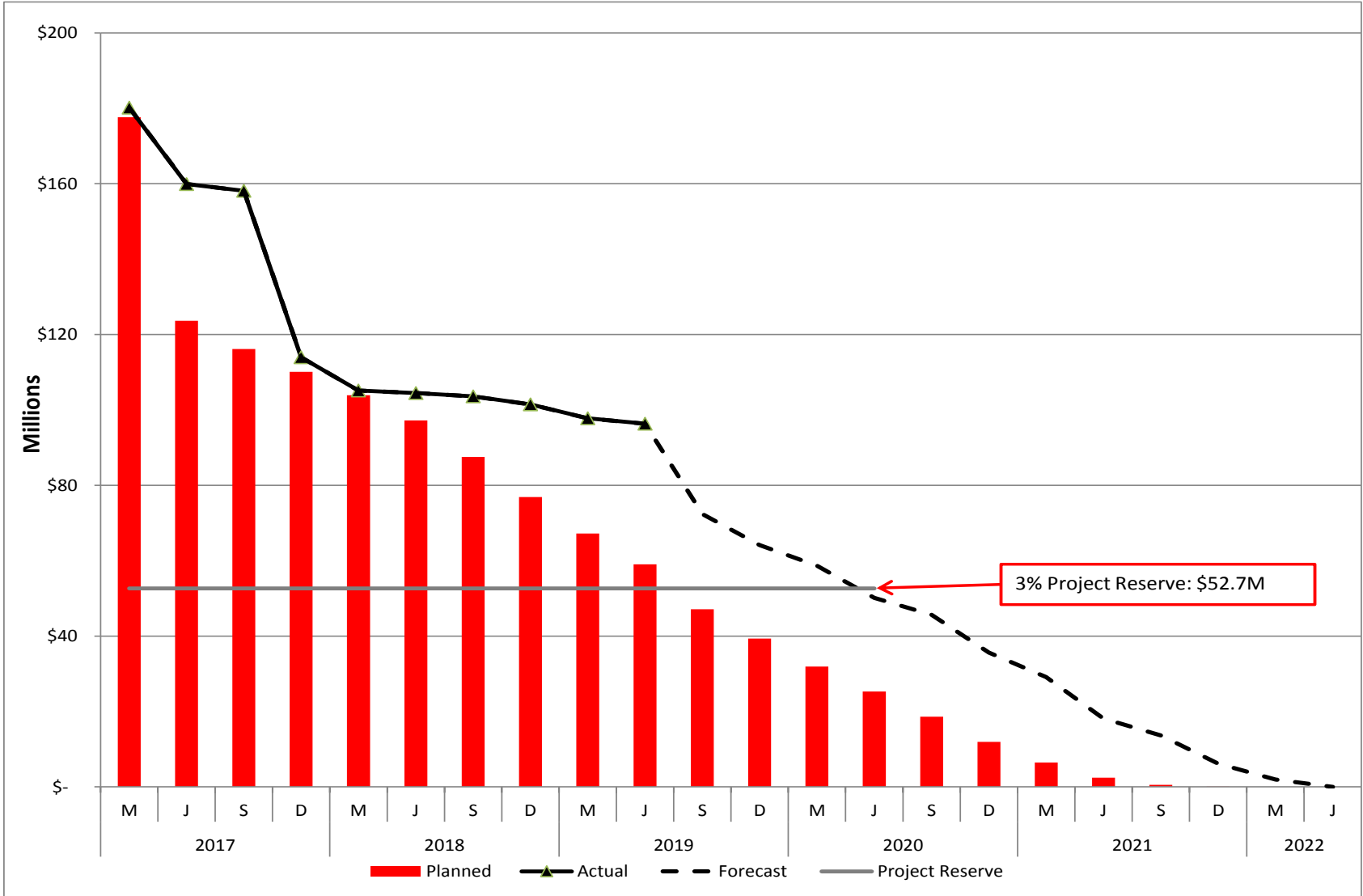


Crenshaw/LAX Transit Project

Project Cost Contingency Drawdown

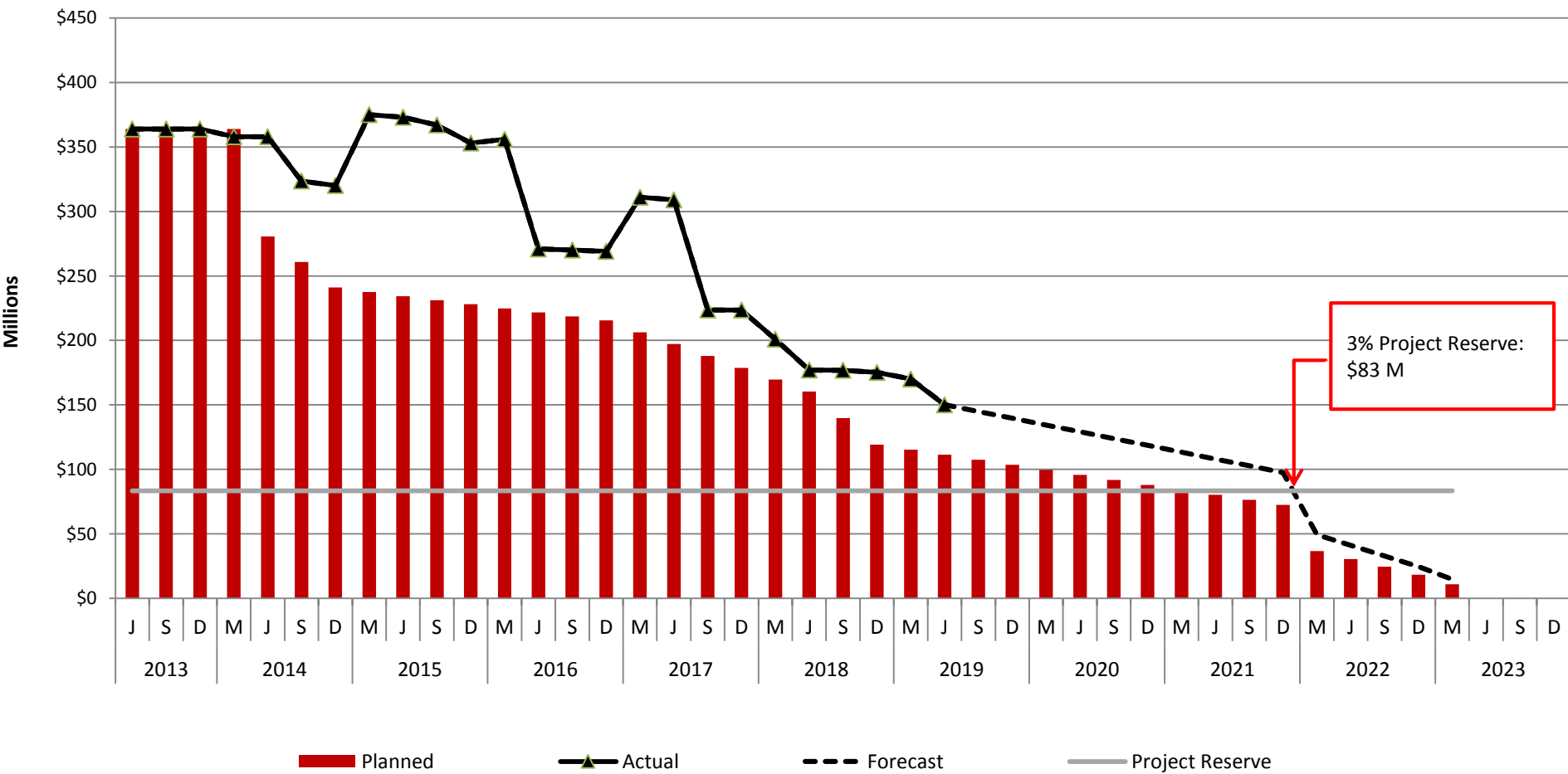


Regional Connector Project Cost Contingency Drawdown



Westside Purple Line Extension – Section 1

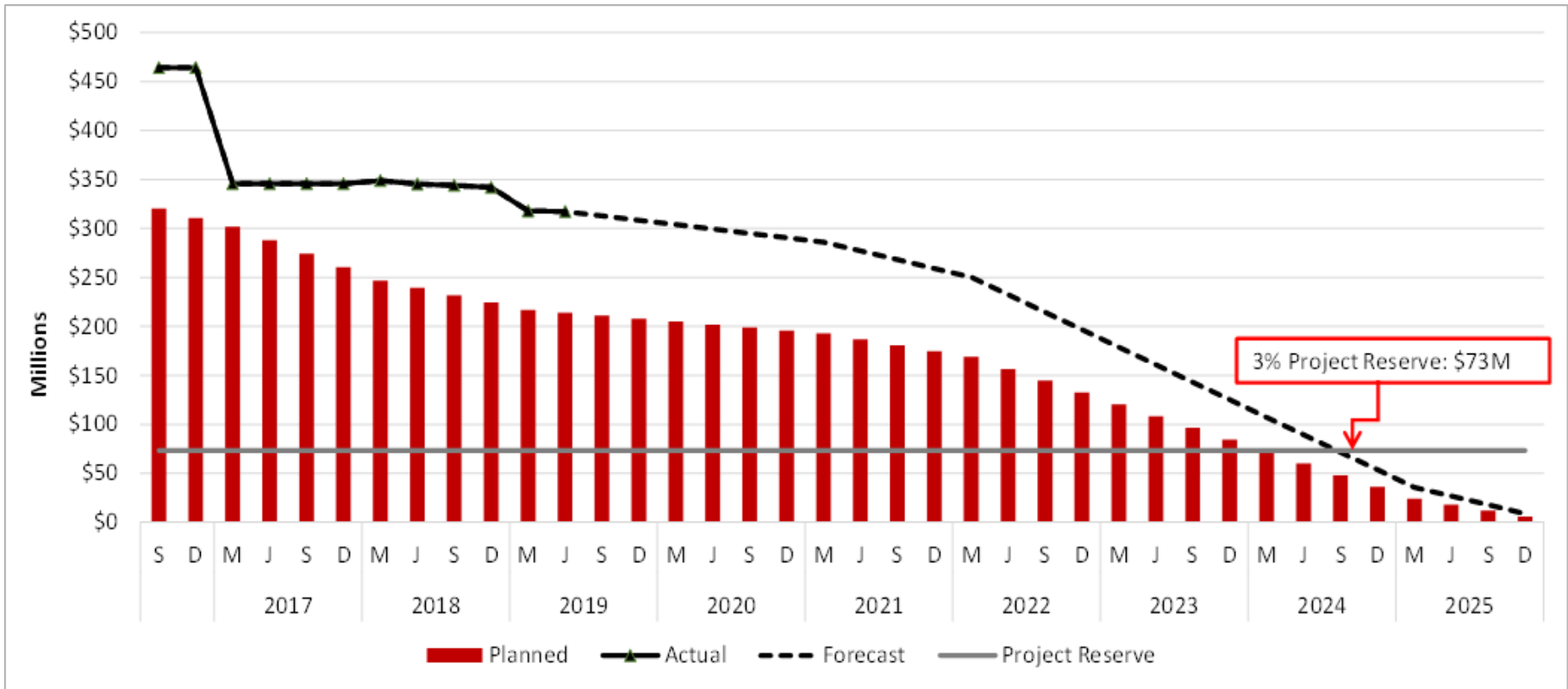
Project Cost Contingency Drawdown



3% Project Reserve:
\$83 M

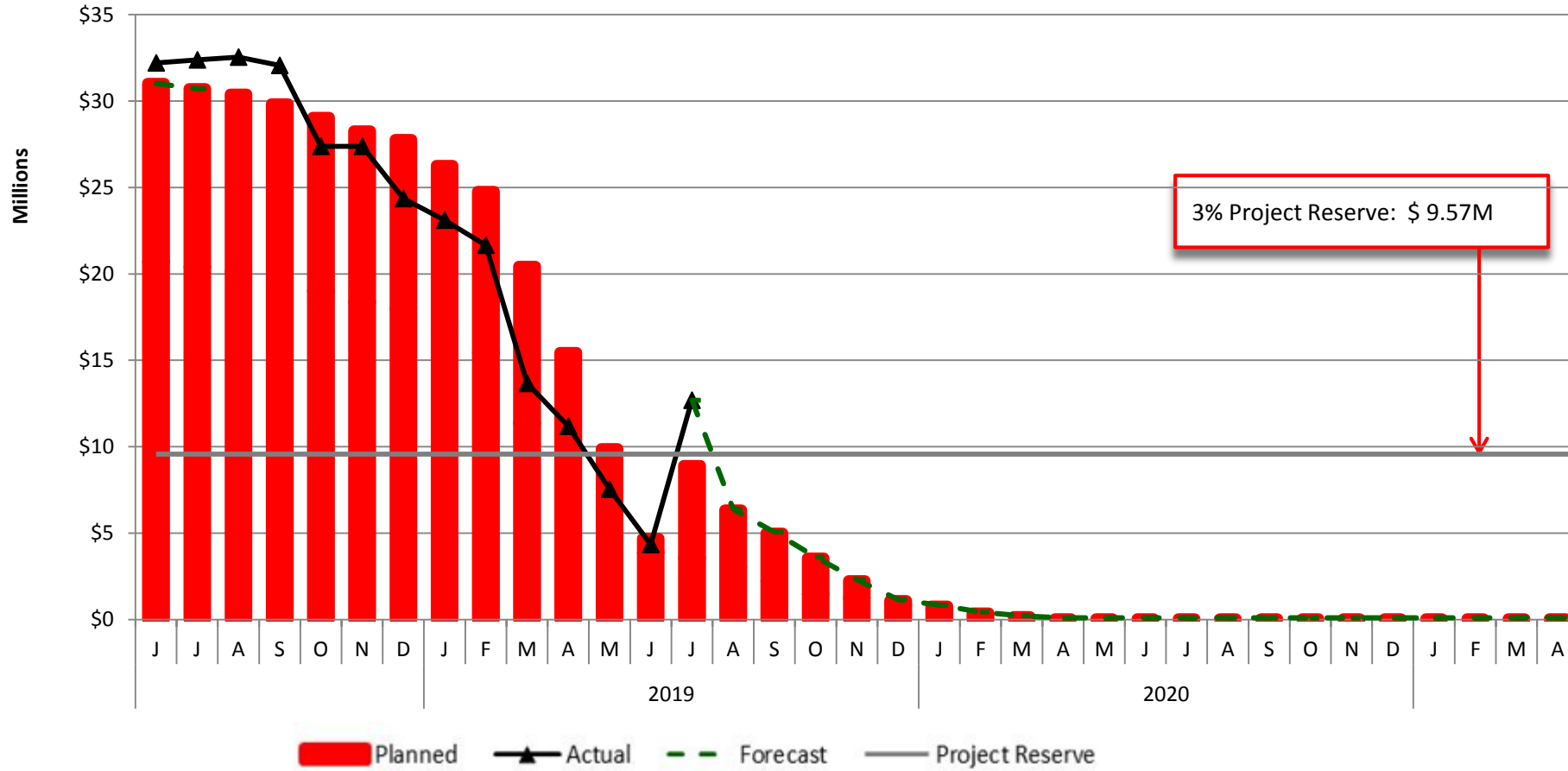
Westside Purple Line Extension – Section 2

Project Cost Contingency Drawdown



New Blue Projects

Project Cost Contingency Drawdown



- Blue Line Signal Rehabilitation
- Blue Line Track and System Refurbishment
- Willowbrook/Rosa Parks Station