Program Management Major Project Status Report

Presented By **Richard Clarke** Chief Program Management Officer

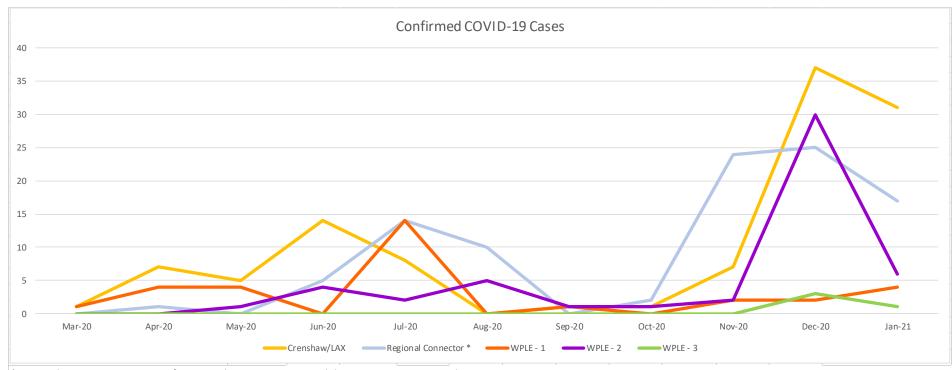
February 2021

Construction Committee Los Angeles County Metropolitan Transportation Authority



Impact of COVID-19 Cases on Mega Construction Projects (as of 1/31/2021)

| Metro Mega Construction Projects COVID-19 Confirmed Cases | | | | | | | | | | | | |
|---|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|---------------------|
| Project | Mar-20 | Apr-20 | May-20 | Jun-20 | Jul-20 | Aug-20 | Sep-20 | Oct-20 | Nov-20 | Dec-20 | Jan-21 | Total Cases to Date |
| Crenshaw/LAX | 1 | 7 | 5 | 14 | 8 | 0 | 1 | 1 | 7 | 37 | 31 | 112 |
| Regional Connector * | 0 | 1 | 0 | 5 | 14 | 10 | 0 | 2 | 24 | 25 | 17 | 98 |
| WPLE - 1 | 1 | 4 | 4 | 0 | 14 | 0 | 1 | 0 | 2 | 2 | 4 | 32 |
| WPLE - 2 | 0 | 0 | 1 | 4 | 2 | 5 | 1 | 1 | 2 | 30 | 6 | 52 |
| WPLE - 3 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 3 | 1 | 4 |



*Regional Connector case count for December 2020 was revised due to a January 2021 audit

PROJECT BUDGET & SCHEDULE STATUS SUMMARY CHART

| Cost Performance | Schedule Performance | Comments |
|---------------------|-------------------------|---|
| \diamond | | Project is 98% complete. Contractor is not applying sufficient work force to complete their remaining work. Metro continues to work with contractor to mitigate the schedule forecast; emphasizing safety and reliability in final acceptance of project elements and systems. |
| <u>(</u> | ОК | Project is 74% complete. Schedule agreement seemed to mitigate Load Transfer System (LTS) delays and accelerate balance of Project; civil and structural giving way to systems and finishes in all areas except Alameda and 1st St; backfill and restorations at stations continue to gain pace. |
| \diamond | | Project is 67% complete. Reviewing the impacts differing site conditions and third-party requirements have had on the project schedule. The Reach 3 anomaly is impacting critical path tunnel mining activities. |
| <u>()</u> | ОК | Project is 41% complete and proceeding on schedule and within budget. |
| <u>()</u> | ОК | Project is 18% complete and proceeding on schedule and within budget. |
| <u>()</u> | ОК | The Customer Center, Mobility Hub + Public Plaza and promenade are complete and turned over to Metro. Package B is in full progress with underground utility work and vertical circulation work. Elevator #4 at the C Line West entrance, a major phase for the project, is expected to be completed by 1 st quarter 2021. |
| <u>ok</u> | ок | Caltrans (CT) Design has approved Project 1's Plans, Specifications and Estimate (PS&E) package. However, the construction permit for Project 1 will be granted once the Aerially Deposited Lead (ADL) testing has been completed and submitted to Caltrans. Funding source for ADL testing still to be determined. Project 2 Barrier analysis has begun in late January. Development of Project Study Report (PSR) for Project 2 is underway. |
| <u>o</u> | ОК | Project is in procurement and is expected to begin construction in Summer 2021. |
| | | Segment 1 and 2 are completed. Segment 3 (Empire Ave & Burbank) is 87% complete. Segment 4 (Magnolia to SR-134) is 98% complete and began the plant establishment phase on June 1, 2020. |
| or | \diamond | Segments 1, 3, and the Carmenita Interchange are completed. Segment 2 (Valley View) is 74% complete. Segment 4 (Imperial) is 97% complete and began the plant establishment phase on Jan 31, 2020. Segment 5 (Florence) is 92% complete. |
| | Performance | Performance Performance Image: Constraint of the second |

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On target 🔶 Possible problem 🛕



Significant Impact



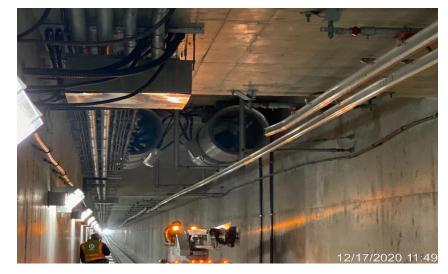
CRENSHAW/LAX TRANSIT PROJECT



- Overall Project Progress is 98% complete.
- Contractor is not applying sufficient work force to complete their remaining work.
- Metro continues to work with contractor to mitigate the schedule forecast; emphasizing safety and reliability in final acceptance of project elements and systems.
- Remaining work is primarily systems–power, train control, station/tunnel fire life safety & communications.



LEIMERT PARK STATION – Continue performing electrical work to the Fare Gate/TVM system at the Paid & Free Area.



UNDERGROUND STRUCTURE NO. 3 – Start-up crew inspecting fans

February 2021



Possible problem



Significant Impact



Construction Committee

REGIONAL CONNECTOR TRANSIT PROJECT

🥶 BUDGET

TOTAL COST \$1,816M

<u>Forecast</u> \$1,816M

- Overall Project Progress is 74% complete.
- Little Tokyo/Arts District Station & Surrounding Area: Utility work and excavation for underground guideway beneath Temple Street is advancing.
- Historic Broadway Station: Construction work on the entrance structure including the overbuild structure foundation work is continuing.
- Grand Av Arts/Bunker Hill Station: Approaching final concrete pours; Pedestrian Bridge construction over Hope underway.
- Flower Street: Concrete nearing completion; final walkways and Mechanical, Electrical, & Plumbing (MEP) underway; interface plans with 7th/Metro Station under review.
- Trackwork: Crossover installation east of Broadway Station underway; Trackwork between 7th/Metro and Little Tokyo/Arts District Station complete.
- Systems: Overhead Conductor Rail (OCR) layout initiated with access from Alameda Wye to 7th/Metro Station.

SCHEDULECurrentForecastREVENUESummer/FallSummer/FallOPERATION20222022



Conduit installation inside CMU Walls at Grand Av Art/Bunker Hill Station



Backfill operations above roof slab at Flower St

February 2021

On target

> Possible problem



Significant Impact



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WESTSIDE PURPLE LINE EXTENSION – SECTION 1

| \diamond | BUDGET |
|--------------|--------|
| \checkmark | DODGLI |

CurrentForecastTOTAL COST*\$3,354M* Includes Board approved LOP budget plus finance costs.

- Overall Project Progress is 67% complete.
- Wilshire/La Brea Station: Permanent utility installation / backfill (above the roof) activities, plenum work and appendage construction continue.
- Wilshire/Fairfax Station: Concourse and 2nd lift wall concrete activities continue. Entrance plaza and appendage work move forward. Build out of roof forming systems is scheduled to start in January 2021.
- Wilshire/La Cienega Station: Roof concrete placements continue through the month of February 2021. Work on the entrance structure also moves forward. Preparation for Tunnel Boring Machine (TBM) arrival continues.
- **Tunneling**: The Purple TBM (Elsie) has mined 2,828 feet (86% complete) and is parked 75' from the anomaly site. The Red TBM (Soyeon) has mined 2,734 feet (83% complete) and is parked 190' from the anomaly site. Mining will continue once the Wilshire/San Vicente grout block installation is completed.
- Reach 1 Tunnel Cross Passages (CP): 11 out of 12 cross passages have been excavated. Concrete placement for 5 cross passages are complete (#10, #11, #13, #14, #15). Completion of all Reach 1 cross passages is planned for February 2021.
- **Schedule:** The Reach 3 anomaly is significantly impacting critical path tunnel mining activities. The project is attempting to mitigate the delay. The forecast completion is currently the 4th quarter of 2024. Metro and the FTA will have a formal risk assessment after mining through the anomaly is completed in April 2021. The Board will be briefed of the results of the risk assessment.

SCHEDULECurrentForecastREVENUEFallFallOPERATIONS2024 (FFGA)2023



Wilshire/La Brea Concrete Placement Above Station Roof



Interior Wall Conduit Installation at Wilshire/Fairfax

February 2021

Construction Committee



Possible problem



Significant Impact



WESTSIDE PURPLE LINE EXTENSION – SECTION 2



- Overall Project progress is 41% complete.
- Century City Constellation Station
 - On January 5, 2021, the City of Los Angeles approved additional street closures along Constellation Boulevard between Avenue of the Stars and Solar Way through April 4, 2021, including 13 weekend closures at the intersection of Constellation Boulevard and Avenue of the Stars.
 - Pile installation on Constellation Boulevard is anticipated to be completed in February 2021.
 - Decking operations are anticipated to be completed in April 2021.
- Wilshire/Rodeo Station
 - Excavation of the station is anticipated to be completed in February 2021.
- Tunneling
 - Tunneling operations are progressing. The BL TBM "Ruth" is east of the buildings on the Beverly Hills High School campus. The BR TBM "Harriet" is scheduled to be east of the high school buildings in late February 2021.
 - After the BR TBM reaches the tennis courts on the high school campus, all tunneling operations will be transitioned from the TBM Launch Box area to the access shaft.

On target

Possible problem

Major issue





Tunnel Access Shaft



Excavation - Wilshire/Rodeo Station



February 2021



WESTSIDE PURPLE LINE EXTENSION – SECTION 3



TOTAL COST*

Current Forecast

\$3,611M \$3,611M

* Includes Board approved LOP budget plus finance costs.

- Overall Project progress is 18% complete
- Final design progress is 77% complete
- C1151 Tunnel Contract
 - TBM #1 (BR) has mined the initial 112 feet and is being fitted with gantries 2, 3, & 4 before resuming mining.
 - TBM #2 (BL) assembly continues at the BL headwall.
 - Fabrication of tunnel precast concrete liners are ongoing.
 - Installation of instrumentation and monitoring equipment is ongoing.
 - Special segment mold build and Aerially Deposited Lead removal proceeding.

C1152 Stations, Trackwork, and Systems Contract

- Final design is ongoing.
- Westwood/VA Station power conduit installation along Wilshire Boulevard complete; ductbank installation on VA Lot 42 completion expected in January 2021.
- VA solar panel removal completed in VA Lot 42; site preparation and soundwall installation expected to be complete in January 2021.
- Utility relocation at UCLA and VA Stations sites planned to start in January/February 2021.
- Other Work
 - Joint trench for Verizon and Frontier telecommunications is substantially complete; punch list expected to be complete January 2021.
 - LADWP power cutover to 10921 Wilshire Boulevard is planned for spring of 2021.

On target

| SCHEDULE | | | | | | | |
|-----------------|----------------|-----------------|--|--|--|--|--|
| | <u>Current</u> | Forecast | | | | | |
| REVENUE | Winter | Spring | | | | | |
| OERATION | 2028 (FFGA) | 2027 | | | | | |
| •=== | | | | | | | |



BL TBM Assembly at Tail Track Exit Shaft



Installation of Sound Wall at the VA Site



February 2021

Construction Committee

Los Angeles County Metropolitan Transportation Authority

Possible problem

Significant Impact

WILLOWBROOK/ROSA PARKS STATION

| TOTAL COST | <u>Current</u> \$128.4M | <u>Forecast</u> \$128.4M | CurrentForecastSUBSTANTIALMarchMarchCOMPLETION20212021 | |
|------------|----------------------------|-----------------------------|--|--|

- Package A: Customer Center, Mobility Hub and Public Plaza substantially complete and turned over to Metro. Final repairs to the Landscaping within the Public Plaza are ongoing.
- Package C: Remaining punch list and finish work ongoing throughout the platform.
- Package B: Package B underground utility work ongoing with underground utility work throughout. Installation of new County required storm drain in progress. Elevator 4 work at the C Line West Entrance is ongoing with temporary sidewalk and state inspection approval expected by end of February. Once certified, the project will be cleared to close up the entire central plaza for main Package B work.

Possible problem



Mobility Hub, Customer Service Building and Public Plaza complete and open to the public



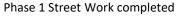
Infrastructure Work @ Central Plaza

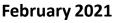
On target



Storm Drain Work @ Central Plaza

Significant Impact





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I-210 BARRIER REPLACEMENT PROJECT

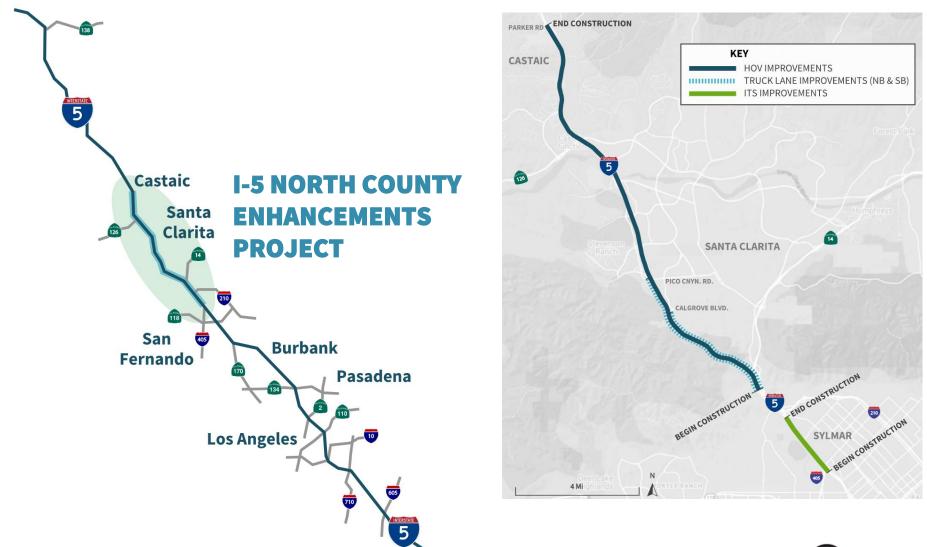
| BUDGET | | | | |
|---------------|---|--------------------------------|--|--|
| TOTAL COST | <u>Current</u> \$22.54M _{Design} | Forecast \$22.54M Design | Complete Design (Proj 1) Complete Design (Proj 2) | Forecast Winter 2021 Summer 2022 |

- Project 1: Segment from Michillinda to Iconic Bridge Caltrans (CT) Design has approved Project 1's Plans, Specifications and Estimate (PS&E) package. However, the construction permit for Project 1 will be granted once the Aerially Deposited Lead (ADL) testing has been completed. Funding source for ADL testing still to be determined.
- Project 2: Segment from west end of the project to Michillinda Barrier analysis has begun in late January. Development of Project Study Report (PSR) for Project 2 is underway.



Construction Committee

I-5 Construction Projects (Administered by Metro)



Metro 11

February 2021

Construction Committee

I-5 NORTH COUNTY ENHANCEMENTS

| | Current | Forecast | | <u>Current</u> | Forecast |
|------------|------------------|------------------|-------------|----------------|-----------------|
| TOTAL COST | \$679.3M | \$679.3M | SUBSTANTIAL | Spring | Spring |
| | <i>vor oroni</i> | v or orom | COMPLETION | 2026 | 2026 |

- Project is in procurement phase and is expected to begin construction in Summer 2021.
- Advanced utility relocations on-going



February 2021

On target 🔶 Possible problem



Significant Impact

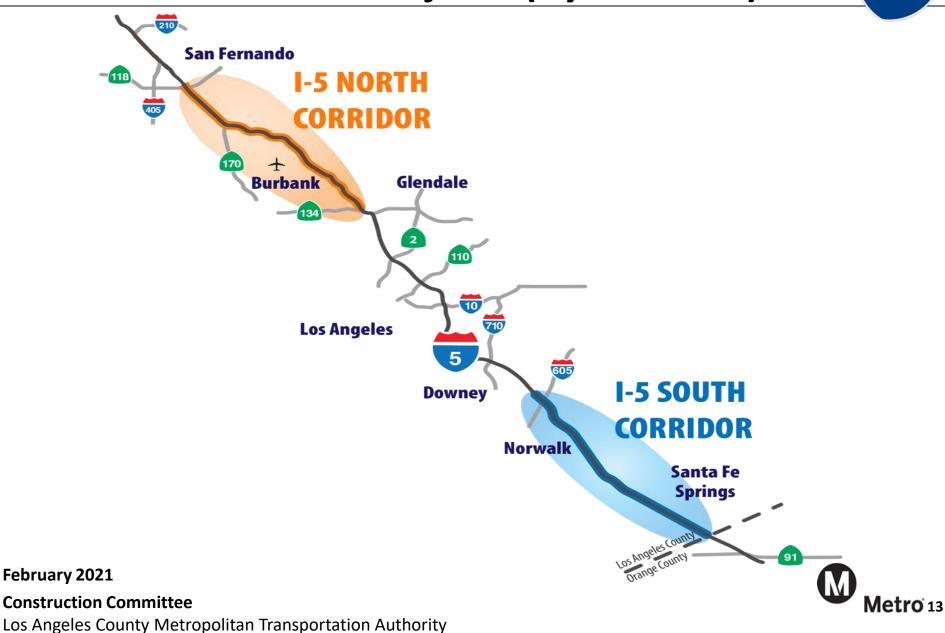


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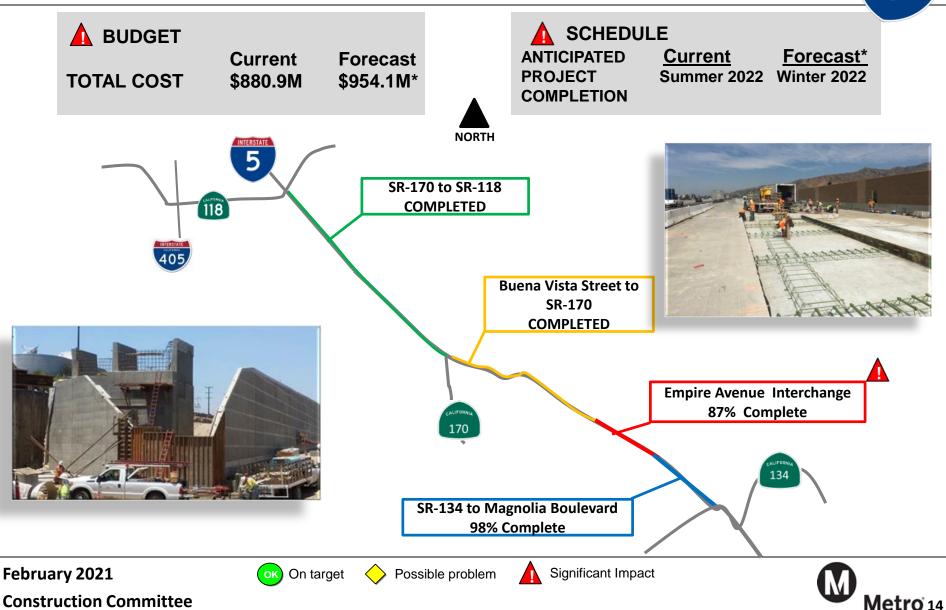
OK

I-5 Construction Projects (By Caltrans)



INTERSTATE

I-5 NORTH: SR 118 TO SR 134



Los Angeles County Metropolitan Transportation Authority

* Risk Analysis, Nov 2020 and Caltrans' request

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

