

# Patsaouras Plaza Busway Station



# **PATSAOURAS PLAZA BUSWAY STATION**

## **QUARTERLY PROJECT STATUS REPORT**

THE PREPARATION OF THIS DOCUMENT HAS BEEN FINANCED IN PART THROUGH A GRANT FROM THE U. S. DEPARTMENT OF TRANSPORTATION, FEDERAL TRANSIT ADMINISTRATION (FTA).

**MARCH 2018**

## **TABLE OF CONTENTS**

	Page No.
Project Overview & Status.....	1
Current Quarter Accomplishments.....	1
Activities Planned for Next Quarter.....	1
Risks and Management Issues.....	2-3
Project Scope.....	4-10
Project Status	
• Project Schedule	
◦ Project Summary Schedule.....	11
◦ Critical Path Narrative.....	12
◦ Justification for Schedule Changes.....	12
• Project Cost	
◦ Project Cost .....	13
◦ Project Cost Analysis.....	13-14
◦ Summary of Contract Modifications.....	15
◦ Summary of Change Notices Negotiated this Reporting Period	15
◦ Summary of Change Notices Issued this Reporting Period.....	16
◦ Summary of Unnegotiated Change Notices.....	16
• Financial/Grant	
◦ Financial/Grant Status.....	17
◦ Status of Funds Anticipated.....	17
• Construction Contracts	
◦ Contract C0970.....	18
• Construction Photographs.....	19-22
Appendices	
• Cost and Budget Terminology.....	23
• List of Acronyms and Abbreviations.....	24-25

## **PROJECT OVERVIEW & STATUS**

Metro awarded Patsaouras Plaza Busway Station Contract C0970 in February 2014 and issued Notice to Proceed (NTP) in March 2014. Contract C0970 is a Design-Build (DB) contract that originally had a 12-month contract duration for design and 18-month forecast for construction.

*Status through March 31, 2018:*

*Patsaouras Plaza Busway Station is 60.0% complete. Project commitments and expenditures through March 2018 indicate that the current budget does not require increasing contract modification authority for the next reporting period*

*Substantial completion was originally scheduled for December 2017. It is now contractually scheduled for October 2018, but for the last two quarters OHL has been forecasting it will achieve substantial completion in February 2019 due to delays in starting construction. The project team continues to work with OHL to discuss the critical path of the schedule and to review mitigation opportunities to improve the schedule and reduce impacts to the project budget.*

## **CURRENT QUARTER ACCOMPLISHMENTS**

Current quarter accomplishments:

- *Completed deck pours on right side of freeway*
- *Completed falsework on left side of freeway and began deck pours*
- *Continued Mechanical/Electrical/Plumbing (MEP) work*
- *Began removing falsework on right side of freeway*
- *Completed elevator foundation piles*
- *Completed test micropiles*

## **ACTIVITIES PLANNED FOR NEXT QUARTER**

Activities planned for the next quarter include:

- *Complete removing falsework on right side of freeway*
- *Complete pours on left side of freeway*
- *Begin removing falsework on left side of freeway*
- *Continue Mechanical/Electrical/Plumbing (MEP) work*
- *Continue micropiling the foundations for the pedestrian overcrossing*
- *Complete pouring of elevator foundation caps*
- *Complete and file Storm Drain Exception with Caltrans*



## **RISKS AND MANAGEMENT ISSUES**

### **Concern No. 1: Project Schedule Re-assessment**

**Status/Action** This item has two implications

1. Substantial completion was contractually scheduled for December 2017, got negotiated to November 2018. However, OHL currently forecasts it will achieve substantial completion in February 2019. The project team is working with OHL to discuss the critical path of the schedule and review potential schedule mitigation opportunities such as concurrent delays in order to reduce impacts to the project budget.
2. Obtaining concurrence on the start date for construction is necessary in order to properly evaluate Time Impact Analyses (TIAs) or compare schedule modifications to the baseline schedule. *Still unresolved. The project team continues to meet with OHL representatives to reach an agreement. Negotiations ongoing as of December 31, 2017.*

### **Concern No. 2: Project Cost Re-assessment**

**Status/Action** Professional Services costs have been reassessed as a result of the Project Schedule Re-assessment, especially agency costs. Currently any potential increase is covered by contingency. The forecast for Special Conditions is trending to be less than the current budget, and staff is studying projects with funding dedicated for specific scopes of work to fund certain portions of the construction. *The budget will be readjusted with savings from Special Conditions transferred to Professional Services if the trend continues.*

### **Concern No. 3: Contractor submitting RFCs and Claims without ROM**

**Status/Action** OHL submits requests for change (RFC) and claims without including Rough Order of Magnitude (ROM) estimates, thus making it difficult to update budget forecasts. *Resident Engineer has begun conducting weekly meetings to obtain information from OHL, but OHL has still not submitted ROMs for several RFCs.*

### **Concern No. 4: Paleontological Remains (Closed)**

**Status/Action** In October 2017, Contractor encountered human remains which were found to be of paleontological significance. This has limited contractor's access to his jobsite as he now has to cordon off work area around the remains. *Staff is working to document the finding so that work can resume without restrictions. Contractor has stated that paleontological remains are not impacting schedule. The issue should be resolved next quarter.*

### **Concern No. 5: Caltrans Falsework Concerns (Closed)**

## **RISKS AND MANAGEMENT ISSUES (Continued)**

**Status/Action** In November 2017, Caltrans required falsework calculations before any pours could be made. *Issue was resolved in December 2017.*

### **Concern No. 6: Rebar Issues (Closed)**

**Status/Action** In December 2017, Contractor suspended deck pours to evaluate rebar after QA/QC noticed a discrepancy during a pour. Pour was found to be OK. Other rebar was examined for compliance with drawings, and Contractor proceeded with pours. *Issue was resolved and pours resumed.*

### **Concern No. 7: Storm Drain Exception**

**Status/Action** OHL installed a storm drain prior to receiving approval from Caltrans, and the location of the manhole is within Caltrans right-of-way. Caltrans noted that it was not per their specifications, but also stated OHL could pursue a storm drain exception. In March, after OHL prepared and submitted the paperwork for the storm drain exception, Caltrans Headquarters in Sacramento noted that exceptions are supposed to be submitted before the work is performed, not after the fact, and did not process the permit. The possibility exists that Caltrans may require OHL to install the storm drain as per their specifications. *Caltrans has not approved the storm drain. OHL and Metro are working with the local Caltrans District 7 to obtain approval as possibility exists that Caltrans may require the storm drain to be built as per their specifications.*

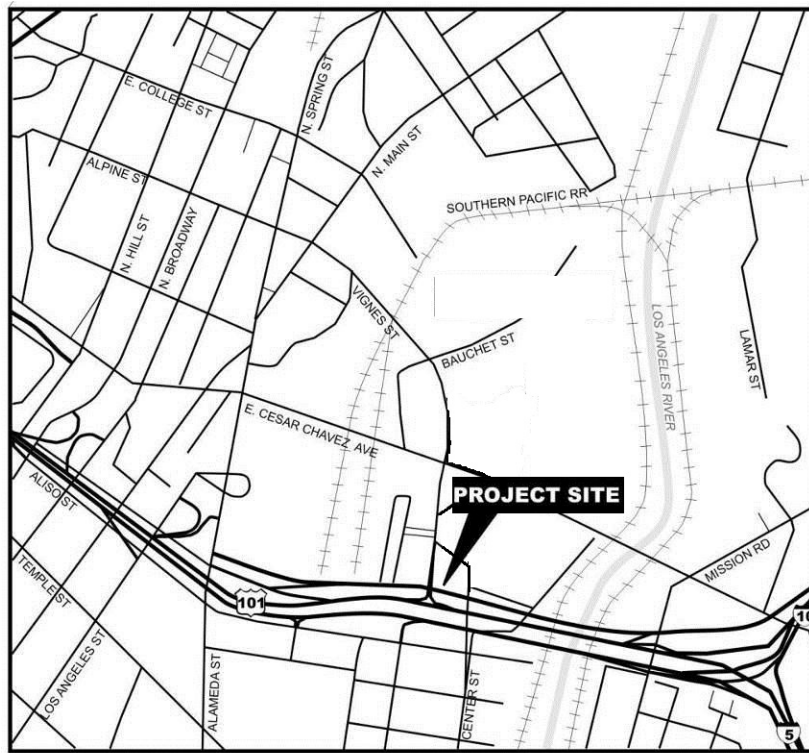
### **Concern No. 8: Finding of additional Human Remains May Impact Austin Vault**

**Status/Action** In February 2018, Contractor encountered human remains on the jobsite. This second set of bones was determined to be medical waste by the coroner. The site is located near a potentially historic medical college. Metro's consultants are in the process of preparing a Testing and Site Evaluation Plan in order to determine the Site's eligibility for listing on the NRHP and/or the CRHR in coordination with the FTA, SHPO, Caltrans, and Native American tribes. The finding has limited contractor's access to his jobsite as he now has to cordon off work area around the remains. Contractor found a way to access the jobsite via an alternate location. However, the locations where the bones are located will impact construction of the Austin Vault. Consultants are preparing the Testing and Evaluation Plan. *Contractor has stated that, for now the human remains are not impacting schedule because the Austin Vault is not currently on the critical path. Metro anticipates that the issue should be resolved next quarter.*

## **PROJECT SCOPE**

### **PROJECT LOCATION**

The project site is in the industrial area northeast of Downtown Los Angeles, and located above the Vignes Street entrance to the U.S. Highway 101 along the HOV/Express Lanes, adjacent to Patsaouras Bus Plaza and across the street from the C. Erwin Piper Technical Center.



SOURCE: TAHA, 2009



Regional access to the project site is provided by U.S. Highway 101/Interstate 5 (Hollywood Freeway/Santa Ana Freeway), which runs adjacent to the project site, and Interstate 10 (San Bernardino Freeway), which is approximately 0.5 miles southeast of the project site.

## **PROJECT SCOPE (Continued)**

**LIFE OF PROJECT BUDGET: \$39,793,000:**

**FEDERAL GRANTS AWARDED TO PROJECT:**

Grant CA-04-0233: \$9,679,000 FTA Section 5309 Bus and Bus Livability Initiative Program  
Grant CA-90-Y716: \$1,200,000 FTA Section 5307 (CRD)

**PROJECT BACKGROUND:**

The passenger boarding / alighting areas for the HOV and El Monte Busway lanes are not located contiguous with Union Station, but rather are situated at the corner of Alameda Street and the busway entrance, which requires a long walk to the Plaza. There is currently no direct pedestrian connection to Union Station, and there are no passenger amenities such as lighting, closed circuit television (CCTV), or information displays.

This issue is even more acute now with the revenue operation of the Congestion Reduction Demonstration Initiative project, since all new passengers also need to make the long walk for other transit connections such as the Red Line, Gold Line, and Metrolink.

To resolve these issues and to provide a more user-friendly passenger experience, a number of potential configurations were evaluated. The final preferred configuration provides a new passenger boarding / alighting area on the south side of Patsaouras Plaza on the El Monte Busway.

**GENERAL DESCRIPTION / FEATURES**

- Relocates patron boarding station currently on north Alameda Street to a new station platform at the southern end of Patsaouras Plaza
- Improves vertical and horizontal pedestrian circulation
- Provides a direct connection to Union Station
- Widens the existing Caltrans Los Angeles River Busway Bridge
- The new station will serve Metro, Foothill Transit, and other operators

**SCOPE OF WORK:**

The Scope of Work is composed of several major construction elements, each with its own subset of work components. The major elements are: Roadways and Sitework; Structures; Bus Platform and Amenities; Canopy Structure; Pedestrian Circulation; Lighting; Signage and Wayfinding; and Universal Fare Collection.



## **PROJECT SCOPE (Continued)**

### **Roadways and Sitework**

1. Roadway Modifications at El Monte Busway — The El Monte Busway is to be widened on the south side along a length of approximately 200 feet to accommodate the revised El Monte Busway lane configurations south of Patsaouras Plaza. The widening varies from 0.0 feet at the western limit to approximately 9.5 feet at the El Monte Busway Bridge's western abutment. Removal work includes removal of pavement sections, raised islands, lighting standards, and barrier rails. New construction includes building new pavement and barrier rails, reconstruction of lighting standards, and modifications to existing embankment slopes. New signage, striping, and pavement markings along this length will also be required. In addition, new overhead signing is to be provided at the entrance to the busway near Alameda Street and an existing overhead sign structure is to be removed and replaced near the west end of the El Monte Busway Bridge.
2. Roadway Modifications at Patsaouras Plaza — The revised lane configurations along the El Monte Busway require modifications to the busway lanes that once entered and exited Patsaouras Plaza. The existing busway lanes entering and leaving Patsaouras Plaza from the busway will be permanently closed. Existing raised medians will be removed, and existing traffic signal poles and signal heads will be removed and salvaged. Signing and pavement markings will be provided at the Plaza for the new lane configurations.
3. Other Modifications at Patsaouras Plaza — Construction of the pedestrian overcrossing, stairs, and elevators will require removal of existing improvements in the plaza, including existing brick paving, traffic signal poles, barrier rails, granite curbs, sidewalk, accessible ramps, and palm trees. Brick paving and granite curbs are to be salvaged and reinstalled if not damaged. Any damage to existing pavement, landscape/hardscape, and granite curbs to remain must be removed and replaced with new materials to very specific and exacting standards.
4. Roadway Modifications at the US 101 On/Off Ramps at Vignes Street — Construction of the columns and footings for the busway bridge and platform canopy in the area of these ramps will require removal and reconstruction of concrete barriers along roadway edges as well as removal /replacement of AC/AB. In addition, portions of an existing retaining wall and curb are to be removed at locations interfering with the new construction (see Drawing C-07 in Volume III of the Project Definition Documents for details). Allowable ramp closures are discussed in Volume II of the Project Definition Documents — Specifications.
5. Utilities and Drainage - Project construction will require relocation and reconstruction of various existing utilities and drainage facilities, including a Caltrans' fiber optic line. In addition, new drainage facilities are to be provided for the freeway widening and other roadway improvements.

## **PROJECT SCOPE (Continued)**

### **Structures**

#### **1. El Monte Busway Bridge Widening**

The project includes widening both the north and south sides of the existing Caltrans Los Angeles River Busway Bridge and Overhead (Br. Na 53-2673). This bridge provides a travel way for the existing El Monte Busway through the project area. The widening on the north side of the bridge extends approximately 872 feet with an average width of 28 feet. The widening on the south side of the bridge extends approximately 775 feet with an average width of 14 feet.

The widening of the structure is required to provide for construction of the new station platform, bus lanes servicing the platform, and buffer lanes separating platform traffic from through traffic. In addition, the widening is required to provide for construction of the Pedestrian Ramp / Walkway which is to be built along the centerline of the existing bridge, allowing access to the platform from Patsaouras Plaza.

The widening to the north of the existing El Monte Busway Bridge was originally sized to accommodate an entrance lane from Patsaouras Plaza onto the Busway. Metro has decided not to provide vehicular access to/from Patsaouras Plaza onto the Busway, but is still requiring the north side widening as shown on the plans. The unused deck areas will be stripped off as shown on the Pavement Delineation drawings in Volume III of the Project Definition Documents.

The widening work includes design and construction of new bridge superstructure, substructure, and barrier rails. Work also includes removal of portions of the existing bridge superstructure and barrier rails. In addition, removal (and replacement at some locations) of portions of existing retaining walls and removal of portions of the existing CIDH retaining wall (Bent 6 & 7) for new column /footing construction will be required. New columns / foundations are to be designed to avoid conflicts with existing roadways, the future and existing Metro Rail Subway Tunnel, and the future Ramirez Flyover.

#### **2. Pedestrian Ramp / Walkway Structure**

A new Pedestrian Ramp / Walkway is to be constructed to enable pedestrians to access the new Station Platform from the existing Plaza (via the new Pedestrian Overcrossing). This structure extends approximately 277 feet along the centerline of the existing El Monte Busway, connecting to the new Pedestrian Overcrossing on the west side and to the new Station Platform on the east side. The Pedestrian Ramp / Walkway rises approximately 9 feet vertically from the level of the station platform to the level of the new Pedestrian Overcrossing, thus allowing a minimum vertical clearance of 19.5 feet over the existing busway lanes for the Pedestrian Overcrossing.

The Pedestrian Ramp / Walkway structure width is to have a 10 feet minimum horizontal inside clear dimension. It is to be supported on new columns which extend through the

## **PROJECT SCOPE (Continued)**

deck surface of the existing busway bridge to new foundations at existing grade below the existing bridge. The structure is enclosed with a structural steel frame with a covered roof. The roof consists of a standing seam over a dovetail roof deck. Side walls consist of fixed perforated stainless steel panels. In addition, swinging perforated stainless steel panels are located outside of the fixed stainless steel panels on the south side wall.

The outside wall swinging panels hang from stainless steel hinges, allowing them to move in the wind. A stopper at the base will limit the extent the panels can move. Final design and implementation of the panels is to be coordinated with and approved by Metro Creative Services.

### **3. Pedestrian Overcrossing**

A new Pedestrian Overcrossing (OC) is to be constructed to enable pedestrians to access the new Pedestrian Ramp / Walkway and Station Platform from the existing Plaza. The Pedestrian OC extends approximately 114 feet south from the south end of the existing Plaza and connects with the new Pedestrian Ramp / Walkway. The OC is basically a level structure that maintains a minimum vertical clearance of 19.5 feet over the existing busway lanes below. The north end of the OC at the Plaza junction connects to new elevators and a stairway that allows pedestrian access to / from the Plaza itself.

The Pedestrian OC width has a 10 feet minimum horizontal inside clear dimension except at the north end, where it widens in the area of the new elevators and stairs. It is to be supported on new columns which extend through the deck surface of the existing busway bridge to new foundations at existing grade below the existing bridge, except for the north support column. The north column is shown to be supported on a new pedestal on the top of the existing parking garage structure.

The OC structure is enclosed with a structural steel frame with a covered roof. The roof consists of a standing seam over a dovetail roof deck. Side walls consist of fixed perforated stainless steel panels. In addition, swinging perforated stainless steel panels are located outside of the fixed stainless steel panels on the west side wall (same design and same oversight requirements as for the Pedestrian Ramp / Walkway structure noted above).

### **Bus Platform and Amenities**

The bus station platform consists of an 8-inch-high concrete slab placed on the existing El Monte Busway bridge deck. The platform is 200 feet long by 18 feet wide, covered by a continuous canopy with lighting. The canopy structure is supported on individual columns, separated from the platform slab, that extend through the existing bridge deck to foundations beneath the existing bridge structure. The station amenities include seating benches, map cases, brick paving, signage and graphics, public address speakers, CCTV cameras, a passenger assistance telephone, an emergency telephone, and trash receptacles.

## **PROJECT SCOPE (Continued)**

### **Canopy Structure**

A 16-foot-wide continuous canopy is to cover the entire platform length. The roof of the canopy consists of a standing seam over a dovetail roof deck. The canopy roof rests on painted steel T-shaped supports and framing members. The supports are separated from the deck platform and extend through the existing bridge deck to new foundations below the existing bridge

### **Pedestrian Circulation**

#### **1. Stairs and Elevators.**

Pedestrian access to the Pedestrian OC from the existing Plaza is to be provided via new stairs and two (2) new elevators at the north end of the OC. The elevators are to be enclosed in a glass and steel framework. Elevator doors are to open on three levels within the enclosure: (1) the 00 deck level - opening to the east; (2) the Plaza level - opening to the east; and (3) the P-1 level of the parking garage - opening to the west. The P-1 level doors will provide access to I from the existing pedestrian walkway located outside and along the west side of Metro's existing parking garage.

Construction of the stairs and elevators will require demolition of the southern two bays of the existing arcade structure located along the west side of the Plaza. A new section of the arcade structure is to be built to connect to the southern end of the remaining arcade structure.

#### **2. Emergency Egress**

New stairs are to be provided for emergency egress from the eastern end of the new station platform. The stairs will descend approximately 21 feet from the platform level to the street level below. The area at the bottom of the stairs is to be enclosed for security purposes.

### **Lighting**

Lighting will be a key component in the experience of passengers to and from the bus platform and the existing plaza. In addition to achieving required light levels and meeting energy codes, the lighting should assist with creating a visually stimulating procession for pedestrians as well as creating visual interest for people viewing the architectural canopies and structures from adjacent areas and the plaza. Lighting is to be provided for all areas of the project including the stairways, elevator areas, Pedestrian OC, Pedestrian Ramp / Walkway, station platform, and canopies.

## **PROJECT SCOPE (Continued)**

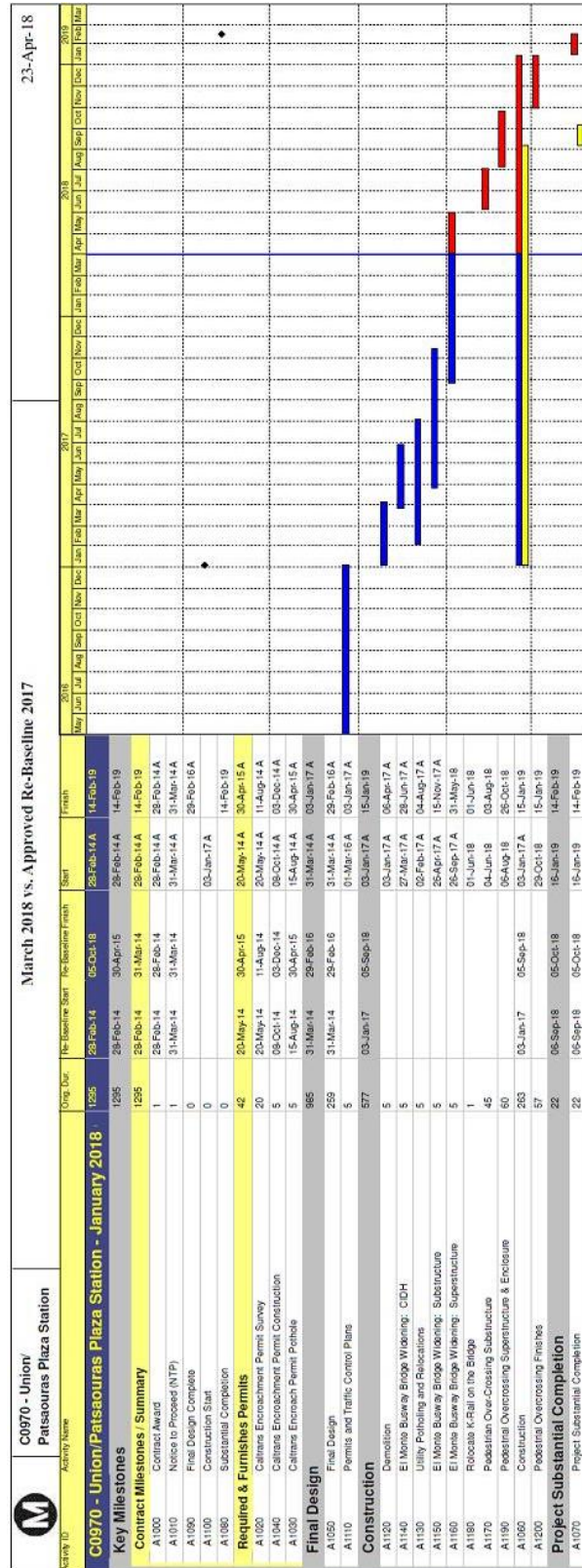
### **Signage and Wayfinding**

The Contractor shall design, procure, and install all signage and wayfinding for the project. These items include identification, directional, and regulatory signage, and map cases. The identification signage includes iconic signs placed on top of the platform canopy. Signage and wayfinding is to be provided for the area of the new stairs and elevators at the south end of the Plaza, along the Pedestrian OC and Ramp / Walkway, and at the station platform and emergency egress. Signs shall conform to Metro's Signage Standards Manual and to accessibility standards under Specifications Section 00.04, Standards.

### **Universal Fare Collection**

The project includes design and construction of provisions for future Ticket Vending Machines (TVMs), Stand Alone Validators (SAVs), and gating. The provisions include placing conduit with pull cords to service these elements. As shown in Volume III — Preliminary Engineering Drawings, provisions for future gating are to be provided at two locations. Provisions for future TVMs and SAVs are to be located at the Plaza entrance and at the level P-1 elevator entrance. Locations shown in Volume III are preliminary. Final locations are to be determined by the Contractor and approved by Metro.

PROJECT SUMMARY SCHEDULE





## **CRITICAL PATH NARRATIVE**

Based on the current schedule, the critical path continues with superstructure widening at the left side of the El Monte Busway Bridge and the Pedestrian Overcrossing structure and enclosure. Work concludes with the completion of Pedestrian Overcrossing amenity items.

## **JUSTIFICATION FOR SCHEDULE CHANGES**

At the end of FY17Q3, the Project Schedule shows substantial completion in October 2018. However, the Contractor (OHL) schedule forecasts substantial completion in February 2019. OHL has not yet submitted a recovery schedule.

## PROJECT COST STATUS

PATSAOURAS PLAZA BUSWAY STATION  
PROJECT 202317  
DIVISION: PROGRAM MANAGEMENT  
DEPARTMENT: PROGRAM MANAGEMENT  
COMBINED COST REPORT BY ELEMENT  
PERIOD ENDING: March 31, 2018  
DOLLARS

ELEMENT CODE	ELEMENT DESCRIPTION	ORIGINAL BUDGET	CURRENT BUDGET		COMMITMENTS		EXPENDITURES		CURRENT FORECAST		BUDGET / FORECAST VARIANCE
			PERIOD	TO DATE	PERIOD	TO DATE	PERIOD	TO DATE	PERIOD	TO DATE	
C	CONSTRUCTION	19,992,000	-	25,435,000	(2,254,000)	23,342,000	2,584,000	15,201,000	(563,000)	25,925,000	490,000
S	SPECIAL CONDITIONS	750,000	-	2,517,000	200,000	1,326,000	174,000	504,000	80,000	1,338,000	(1,179,000)
R	RIGHT-OF-WAY	-	-	-	-	-	-	-	-	-	-
P	PROFESSIONAL SERVICES	7,425,000	-	9,024,000	391,000	11,057,000	469,000	10,586,000	388,000	11,992,000	2,968,000
PC	PROJECT CONTINGENCY	2,817,000	-	2,817,000	-	-	-	-	95,000	538,000	(2,279,000)
<b>TOTAL PROJECT</b>		<b>30,984,000</b>	<b>-</b>	<b>39,793,000</b>	<b>(1,663,000)</b>	<b>35,725,000</b>	<b>3,227,000</b>	<b>26,291,000</b>	<b>-</b>	<b>39,793,000</b>	<b>-</b>

NOTE: EXPENDITURES ARE CUMULATIVE THROUGH March 31, 2018

## PROJECT COST ANALYSIS

### Original Budget

The original Life of Project (LOP) budget of \$16,803,000 was established in October 2011 when the project was in preliminary design. In 2013, bids for the station contract exceeded the LOP budget. Staff performed value engineering and re-bid the work, and in January 2014 the Metro Board increased the LOP budget to \$30,984,000 in order to award Contract C0970.

### Current Budget

In March 2016, the Metro Board increased the LOP budget to \$39,793,000. At that time, the project budget was allocated to match the forecasts for construction, professional services special conditions and to replenish contingency as indicated in the March 2016 Board Report. During the period ending March 31, 2018 the project budget established in March 2016 did not change.

### Commitments

Commitments at the end of March 2018 were \$35.7 million, an overall decrease of \$1.66 million compared to last quarter. There were no new commitments for construction contract C0970 as no contract modifications were executed. However, the decrease is due to staff reducing the value of purchase order for Construction Contract C9070 to account for the unilateral deductive change orders executed in June 2017, and Metro finding a separate project number to pay for work related to the elevators. There was a \$200,000 increase in commitments for Special Conditions as Metro created the purchase orders for the FY18 work orders with the City of Los Angeles. There was also a \$0.47 million increase in commitments for Professional Services this quarter that was primarily due to the labor hours charged by Metro employees and a task order Metro issued for construction management support services for a field engineer.

## **PROJECT COST ANALYSIS (Continued)**

### **Expenditures**

Through March 31, 2018, Metro has incurred \$26.29 million in cumulative expenditures. Expenditures increased \$3.23 million this reporting period, and \$2.58 million of it was for construction as the contractor submitted four invoices. The balance of this quarter's expenditures, or \$0.65 million, were for professional services that included materials testing, paleontological monitoring, document control, scheduling support, and agency labor.

### **Current Forecast**

The overall project forecast remained at \$39,793,000 this reporting period. This quarter:

- The forecast for Construction is \$25,925,000  
This is a decrease of \$563,000 from the previous quarter. As noted in the "Commitments" section above, the decrease is due to staff reducing the value of purchase order for Construction Contract C9070 to account for the unilateral deductive change orders executed in June 2017, and Metro finding a separate project number to pay for work related to the elevators. Claims are being accounted for at 50% of the value submitted by the contractor.
- The forecast for Special Conditions is \$1,259,000  
This is an increase of \$95,000 from the previous quarter and is due to City of Los Angeles Department of Transportation submitting an invoice in February for the first six months of FY18 that exceeded the value of the FY18 work order.
- The forecast for Professional Services is \$11,604,000  
This is an increase of \$469,000 from the previous quarter. Almost 75% of the increase is for materials testing support to meet CALTRANS QA/QC requirements. The balance is for construction management support services, specifically to add a field engineer at the field office.
- The forecast for Contingency is \$ 538,000  
This is an increase of \$95,000 from the previous quarter is primarily due to Metro finding a project number for vertical transportation projects to fund the elevator component of the construction contract. In addition, one change was negotiated for 100,000 less than the contractor's original estimate and two others will be paid using provisional sums in the contract.

**SUMMARY OF EXECUTED CONTRACT MODIFICATIONS**

<b>Modification</b>	<b>Description</b>	<b>Amount (\$)</b>
1	General Requirements	-
2	CN2 Update SP-27 and Section 01200	-
3	Revise Contract Compliance Manual	-
4	CN7 – Redesign extra work – RFC03 Supplemental PSR/PR	93,450
5	CN6 – Emergency Power to Light Fixtures	79,424
6	CN3 – LED Fixture Change	8,877
7	CN4 – RFC010 – Potential Source Change	173,151
8	CN14 – Ramirez Street Design	60,900
9	CN9.1 – RFC7 – Construction 2 Lanes West with 1 Lane East	614,968
10	CN10.1 – Construction change	3,505,769
11	CN16 – Design of 2 Lanes West & 1 Lane East	51,570
12	CN17 – Redesign of Structural Footings	188,926
13	CN11 – ADA Tactile Pathway	57,000
14	CN12 – CRZ Installation of Bollards at Bus Platform	190,000
15	CN15 – Added Design for Storm Drain Manholes	31,733
16	Mitigation of Concurrent and Compensable Delays	548,000

No contract modifications were executed between January 1, 2018 and March 31, 2018.

**SUMMARY OF CHANGE NOTICES  
 NEGOTIATED THIS REPORTING PERIOD  
 (BUT CONTRACT MODIFICATIONS NOT EXECUTED)**

<b>CN</b>	<b>Description</b>	<b>Amount (\$)</b>
25	8" Water Line Relocation (Sewer Conflict)	244,000
27	60" Steel Line Relocation	95,000
36	Mitigation of Concurrent Delays (01/03/17 TO 05/12/17)	124,000
37	Denny's Signage	2,846

The value of four change notices were negotiated between January 1, 2018 and March 31, 2018.

**SUMMARY OF CHANGE NOTICES  
ISSUED THIS REPORTING PERIOD**

<b>CN</b>	<b>Description</b>	<b>Contractor Proposal (\$)</b>	<b>ROM (\$)</b>	<b>Metro's Position (\$)</b>
36	Mitigation of Concurrent Delays (01/03/17 TO 05/12/17)	216,000	130,000	124,000
37	Denny's Signage	2,846	3,000	2,846

Metro issued two new change notices (CNs) between January 1 – March 31, 2018.

**SUMMARY OF UNNEGOTIATED CHANGE NOTICES  
(ISSUED PREVIOUS REPORTING PERIODS)**

<b>CN</b>	<b>Description</b>	<b>Contractor Proposal (\$)</b>	<b>ROM (\$)</b>	<b>Metro's Position (\$)</b>
26	Roadway Aesthetic Treatment	Not Yet Submitted	80,000	n/a
28	Additional Malcolm Mobilization	Not Yet Submitted	85,000	n/a
29	Obstruction at Bent 5RT, 4LT, 6	Not Yet Submitted	200,000	128,000
30	Obstructions at Bent 9LT and 8LT	242,500	240,000	n/a
31	Obstructions at Bent 5 Ped Bridge	12,200	12,000	n/a
32	Obstructions at Bent 6 Ped Bridge (RFC 58)	12,700	13,000	n/a
33	Obstructions at Bent 4 Ped Bridge (RFC 59)	13,600	13,000	n/a
34	Obstructions at Bent 6 and Bent 7 (RFC 60)	Not Yet Submitted	200,000	n/a
35	Additional Obstructions at Bent 4 Ped Bridge (RFC61)	27,200	27,000	n/a

None of the CNs listed above have yet to be negotiated. Contractor has yet to submit a proposal for four of the CNs.

**FINANCIAL/GRANT STATUS**

SOURCE	(A)	(B)	(C)	(D)	(D/B)	(E)	(E/B)	(F)	(F/B)
	BUDGET	TOTAL FUNDS ANTICIPATED	TOTAL FUNDS AVAILABLE	COMMITMENTS	%	EXPENDITURES	%	BILLED to SOURCE	FUNDING SOURCE
	(\$)	(\$)	(\$)	\$	%	\$	%	\$	%
FEDERAL - BUS LIVABILITY SECTION 5309	9,679,000	9,679,000	9,679,000	9,679,000	100%	9,679,000	100%	9,679,000	100%
FEDERAL - SECTION 5307	1,200,000	1,200,000	1,200,000	1,200,000	100%	1,200,000	100%	1,200,000	100%
PROP C 40%	300,000	300,000	300,000	300,000	100%	300,000	100%	300,000	100%
PROP C 25% HIGHWAY	16,590,000	16,590,000	16,590,000	16,590,000	100%	11,897,000	72%	11,897,000	72%
PROP C 25% DEBT	8,809,000	8,809,000	8,809,000	3,929,000	45%	-	0%	-	0%
RAMIREZ FLYOVER (UNION STATION ESCROW)	3,215,000	3,215,000	3,215,000	3,215,000	100%	3,215,000	100%	3,215,000	100%
<b>TOTAL</b>	<b>39,793,000</b>	<b>39,793,000</b>	<b>39,793,000</b>	<b>34,913,000</b>	<b>88%</b>	<b>26,291,000</b>	<b>66.1%</b>	<b>26,291,000</b>	<b>66.1%</b>

NOTE: Expenditures are cumulative through March 2018

**STATUS OF FUNDS ANTICIPATED**

**FEDERAL SECTION 5309 BUS & RAIL LIVABILITY INITIATIVE PROGRAM:** FTA Grant CA-04-0233 for \$9.7 million was awarded by the FTA in June 2012. Funds are available for drawdown. Funds have been completely drawn down.

**FEDERAL SECTION 5307:** FTA Grant CA-90-Y716 for \$1.2 million was awarded by the FTA in July 2009. Funds are available for drawdown. Funds have been completely drawn down.

**PROP C 40% DISCRETIONARY:** \$300,000 has been allocated to the project through FY2016. Funds are available for drawdown. Funds have been completely drawn down.

**PROP C 25% STREET & HIGHWAY:** \$16.6 million has been allocated to the project. Funds are available for drawdown.

**PROP C 25% DEBT:** \$8.8 million has been allocated to the project. Funds are available for drawdown.

**CATELLUS (RAMIREZ FLYOVER):** \$3.2 million has been allocated to the project. Funds are available for drawdown. Funds have been completely drawn down.



**CONTRACT C0970**

<b>PE Design Contractor: STV Inc.</b> <b>CM Consultant: n/a</b> <b>Contractor: OHL USA, Inc.</b>					<b>Contract No.: C0970</b> <b>Status as of March 31, 2018</b>																																														
<b>Progress/Work Completed:</b> <b>Construction</b> <ul style="list-style-type: none"> <li>Completed deck pours on right side of freeway</li> <li>Completed falsework and began deck pours on left side of freeway</li> <li>Continued Mechanical/Electrical/Plumbing work</li> <li>Center Street night-time closure approved; removal of falsework over street scheduled for night-time work</li> <li>Completed elevator foundation piles</li> <li>Completed test micro-piles</li> </ul>					<b>Areas of Concern:</b> <ul style="list-style-type: none"> <li>Date for Substantial Completion milestone putting pressure on professional services forecast</li> <li>OHL has been non-compliant with General Requirement 1310 for schedule updates and submittals</li> <li>Subcontractors submitted Stop Notices</li> <li>Environmental expenses, including paleontological and archeological monitoring are more than originally forecasted</li> </ul>																																														
<b>Schedule Assessment:</b> <ul style="list-style-type: none"> <li>The forecast dates for Contract Milestones shown in the table below are based on the contractor's February 2018 Schedule Update . OHL had not yet submitted the March 2018 schedule update at the time this report was prepared.</li> <li>OHL has submitted schedule updates through May 2017 to have a basis for negotiating TIA .</li> <li>Although substantial completion is contractually scheduled for October 2018, OHL forecasts it will achieve substantial completion in February 2019 (FY19 Q3).</li> </ul>					<b>Cost Assessment:</b> <ul style="list-style-type: none"> <li>The current construction contract cost forecast is \$26,487,587 and is within the Board authorized LOP budget.</li> <li>Between January 2018 and March 2018, OHL USA, Inc. submitted complete pay applications                      Pay Estimate 30 for the Period Ending 10/31/17                      Pay Estimate 31 for the Period Ending 11/30/17                      Pay Estimate 32 for the Period Ending 12/31/17                      Pay Estimate 33 for the Period Ending 1/31/2018                      Pay Estimate 34 for the Period Ending 2/28/2018</li> <li>Through the period ending 3/31/2018, OHL USA, Inc. had billed \$15,228,600 or 59.9% of the current contract value.</li> </ul>																																														
<b>Schedule Summary:</b> <table border="0"> <tr> <td></td> <td>03/31/18</td> <td></td> <td></td> <td></td> </tr> <tr> <td>1. Date of Award:</td> <td>02/26/14</td> <td></td> <td></td> <td></td> </tr> <tr> <td>2. Notice to Proceed:</td> <td>03/31/14</td> <td></td> <td></td> <td></td> </tr> <tr> <td>3. Original Substantial Completion Duration:</td> <td>900</td> <td></td> <td></td> <td></td> </tr> <tr> <td>4. Current Substantial Completion Duration:</td> <td>1649</td> <td></td> <td></td> <td></td> </tr> <tr> <td>5. Elapsed Time from NTP:</td> <td>1461</td> <td>88.6%</td> <td></td> <td></td> </tr> </table>						03/31/18				1. Date of Award:	02/26/14				2. Notice to Proceed:	03/31/14				3. Original Substantial Completion Duration:	900				4. Current Substantial Completion Duration:	1649				5. Elapsed Time from NTP:	1461	88.6%			<b>Cost Summary:</b> <table border="0"> <tr> <td></td> <td style="text-align: right;"><b>\$</b></td> </tr> <tr> <td>1. Award Value:</td> <td style="text-align: right;">19,832,000</td> </tr> <tr> <td>2. Executed Modifications:</td> <td style="text-align: right;">5,603,768</td> </tr> <tr> <td>3. Approved Change Orders:</td> <td style="text-align: right;">-</td> </tr> <tr> <td>4. Current Contract Value (1 + 2 + 3):</td> <td style="text-align: right;">25,435,768</td> </tr> <tr> <td>5. Incurred Cost:</td> <td style="text-align: right;">15,228,600</td> </tr> </table>						<b>\$</b>	1. Award Value:	19,832,000	2. Executed Modifications:	5,603,768	3. Approved Change Orders:	-	4. Current Contract Value (1 + 2 + 3):	25,435,768	5. Incurred Cost:	15,228,600
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## **CONSTRUCTION PHOTOGRAPHS**

**AERIAL PHOTOGRAPH OF JOBSITE (3/31/2018)**



Photo taken from the south side of the Metro Gateway Building provides an aerial view of the jobsite.



## CONSTRUCTION PHOTOGRAPHS (Continued)



Closure pour RT Side.



Drain at Abutment 1.



**CONSTRUCTION PHOTOGRAPHS (Continued)**



Exterior Stems at Frame 3 Left.



Frame 4 Left Deck Pour.



## CONSTRUCTION PHOTOGRAPHS (Continued)



Post Tensioning Frame 4 Left.



Drill for Micropile Test.

## **APPENDIX COST AND BUDGET TERMINOLOGY**

**ADOPTED BUDGET:** The Approved Project Budget as established by Metro Board of Directors at the time it authorizes Construction Project Management Division to commence full design and construction of the project (Project Adoption).

**CURRENT FORECAST:** Evaluation of costs to go combined with actual expenditures.

**COMMITMENTS:** The total of actual contract awards, executed change orders or amendments, approved work orders of Master Cooperative Agreements, offers accepted for purchase of real estate, and other Metro actions which have been spent or result in the obligation of specific expenditures at a future time. Also includes commitments reported by other agencies.

**EXPENDITURES:** The total dollar amount of funds expended by Metro for contractor or consultant invoices, third party invoices, staff salaries, real estate and other expenses that are reported in Metro's Financial Information System (FIS), and expenditures reported by other agencies.



## **APPENDIX**

### **LIST OF ACRONYMS AND ABBREVIATIONS**

AFC	Approved For Construction
BNSF	Burlington Northern Santa Fe Railway
CADD	Computer Aided Drafting and Design
CCTV	Closed Circuit Television
CD	Calendar Day
CM	Construction Manager
CMAC	Congestion Mitigation Air Quality
CMIA	Cash Management Improvement Act
CN	Change Notice
CNG	Compressed Natural Gas
CO	Change Order
CPM	Critical Path Method
CPUC	California Public Utilities Commission
CR	Camera Ready
CO	Change Order
CTC	California Transportation Commission
D-B	Design-Build
D-B-B	Design-Bid-Build
DBOM	Design, Build, Operate and Maintain
DD	Design Development
DEIR	Draft Environmental Impact Report
DWP	Department of Water and Power
EA	Environmental Assessment
EIR	Environmental Impact Report
EIS	Environmental Impact Statement
FD	Final Design
FEIR	Final Environmental Impact Report
FHWA	Federal Highway Administration
FIS	Financial Information System
FOCT	Fiber Optics Cable Transmission System
FTE	Full Time Equivalent
IFB	Invitation for Bid
IPO	Integrated Project Office
LA	Los Angeles
LADWP	Los Angeles Department of Water and Power
LFAT	Local Field Acceptance Test
LNTP	Limited Notice To Proceed
LONP	Letter Of No Prejudice
LOP	Life of Project
MCA	Master Cooperative Agreement
METRO	Los Angeles County Metropolitan Transportation Authority
MIS	Major Investment Study
MOT	Maintenance of Traffic

**APPENDIX**

**LIST OF ACRONYMS AND ABBREVIATIONS (Continued)**

MOU	Memorandum of Understanding
MSA	Meter Set Assembly
MSSC	Metro Support Services Center
N/A	Not Applicable
NOA	Notice of Award
NTE	Not to Exceed
NTP	Notice To Proceed
O & M	Operations and Maintenance
PC	Project Control
PE	Preliminary Engineering
PIP	Project Implementation Plan
PLA	Project Labor Agreement
PM	Project Manager
PMA	Project Management Assistance
PMP	Project Management Plan
P&P	Policies & Procedures
PR	Project Report
PS&E	Plans, Specs & Engineering
PSR	Project Study Report
QA	Quality Assurance
QAR	Quality Assurance Report
QC	Quality Control
QPSR	Quarterly Project Status Report
RFC	Request For Change or Released for Construction (based on context)
RFP	Request For Proposal
ROM	Rough Order of Magnitude
ROW	Right-Of-Way
RSTP	Regional Surface Transportation Program
RWQCB	Regional Water Quality Control Board
SAFETEA-LU	Safe, Accountable, Flexible, Efficient Transportation Equity Act: A Legacy for Users
SCE	Southern California Edison
SD	Storm Drain
SEOR	Structural Engineer of Record
SIT	System Integration Testing
SOW	Statement Of Work
SP	Special Provision
TBD	To Be Determined
UPS	Uninterrupted Power Supply
USDOT	United States Department of Transportation
VE	Value Engineering
WBS	Work Breakdown Structure
WDP	Whitlock Dalnymple Poston
WP	Work Package