

Transit Performance Initiative Investment Program Semi-Annual Update

The Transit Performance Initiative (TPI) Investment program funds low-cost capital investments that can be implemented rapidly to improve operations and customer experience on major transit corridors and systems. This report summarizes TPI-funded projects throughout the life of the program and provides progress updates for ongoing TPI projects.

Program Summary

Since 2012, \$132.2 million has been programmed to 49 capital and planning projects, and 27 of these have been completed or are substantially completed.

The TPI program utilizes a combination of federal One Bay Area Grant (OBAG) funds from the OBAG 1 and OBAG 2 programs and the state Low Carbon Transit Operations Program (LCTOP). Five rounds of the TPI program, including the majority of the TPI 2022-23 Program awarded in February 2023, were funded with OBAG funds, totaling \$97.5 million. In May 2016, the Commission committed one-third of the region's annual population-based LCTOP funds to augment the TPI program, subject to the region's Cap and Trade Framework in MTC Resolution No. 4130, Revised. Six cycles of LCTOP funds have been programmed by MTC, totaling \$34.7 million from FY 2016-17 to FY 2023-24.

Completed projects have benefited transit service and helped agencies build up tools and experience for getting transit out of traffic. Ongoing projects from STP/CMAQ rounds 1-4 are in or entering construction, and LCTOP projects are either in design or under construction. Funding awarded in FY23 and FY24 have seen challenges in access from state and federal funders, as detailed in the "Funding Delays" section.

Project Sponsor	Total TPI Awards (\$M)
AC Transit (11 projects*)	\$41.9
SFMTA (15 projects)	\$49.4
VTA (8 projects)	\$20.2
Other (13 projects)	\$20.7
Total	\$132.2

*Includes Bay Bridge Forward award to MTC implemented in coordination with AC Transit

Report Highlights

Projects completed this period include:

- SFMTA – Colored Laned on MTA Rapid Network: Implement red colored lanes at several locations throughout San Francisco. The scope was expanded multiple times as SFMTA found efficiencies through implementing many miles of colored lanes. The latest scope addition for colorization and additional red paint for Mission Boulevard was completed this period.
- SFMTA – 5 Fulton Arguello to 25th Ave Muni Forward: Transit bulb-outs and signal upgrades, including additional locations added with savings from the 27-Bryant project. Construction is completed, including the additional scope, and the project has been closed out.
- AC Transit’s San Pablo and Telegraph Rapid Bus Upgrades and Mission Boulevard Transit Signal Priority (TSP) project were completed in the prior reporting round, but closeout activities have continued into this reporting period. Additional updates are provided below.

Construction and implementation continued on most projects awarded through FY 2022. Progress on these projects is detailed in the “Individual Project Updates” section below.

Funding Delays

The underlying federal funding source for the OBAG funds programmed in February 2023 as part of the TPI 2022-23 program goes through a multi-step, multi-agency review and approval process prior to the award and allocation of funds. Most OBAG funds awarded to transit operators are transferred from FHWA to FTA as part of this process. Most projects receiving these funds experienced significant delays throughout the federal award process— part of a systemic issue in which receiving federal awards can take an extraordinarily long time. This has resulted in delays of a year or more to the start of work on these projects, and may result in cost increases, effectively reducing the purchasing power of the TPI funds.

Further, funding from the LCTOP program awarded in the TPI 2022-23 and 2023-24 programs was released by the state many months later than typical; LCTOP program staff have indicated this is to be the expected schedule going forward.

Staff will continue to monitor the status of these funds, and work with sponsors to ensure applications for future awards are handled as efficiently as possible.

Ongoing Projects

Below is a list of ongoing TPI-funded projects by operator covered in this report. The full list of TPI projects by round and by operator, including completed projects, is included in Attachment B.

AC Transit

- San Pablo and Telegraph Rapid Bus Upgrades Project (Substantially completed)

- Mission Boulevard TSP (Substantially completed)
- MacDonald Avenue TSP Project Phase 1
- Foothill Corridor Planning Study
- Cutting Boulevard Project
- Fruitvale Corridor TSP

SFMTA

- N-Judah Customer First
- Colored Lanes on MTA Rapid Network (Completed)
- Geary Rapid Project (Substantially completed)
- 5-Fulton Arguello to 25th Ave Muni Forward (Completed)
- 29-Sunset Muni Forward Phase 1
- Next Generation Transit Lane and Bus Zone Enforcement Pilot Program
- 29-Sunset Improvement Project Phase 2
- Third Street Dynamic Traffic Signal Optimization Project
- Muni Forward Five-Minute Network Corridor Planning Program
- Cloud-Based TSP

VTA

- Light Rail TSP Improvements (Substantially completed)
- Stevens Creek Ltd 323 TSP (Substantially completed)
- Eastridge to BART Regional Connector
- Transit Reliability Improvement and Performance System (TRIPS)
- Monterey Road Transit Lane Project
- Senter Road Bus Boarding Islands and Bulb Outs

Other

- **SamTrans** – Traffic Signal Priority on El Camino Real (Expanded Scope)
- **TAM/Marin Transit** – Marin County Hwy 101 Part Time Transit Lane
- **NVTA** – Napa Valley Transit Safety and Efficiency Improvements
- **SamTrans** – El Camino Real Mid-County Transit and Multimodal Corridor Plan
- **CCTA/County Connection** – Transit Corridors Study

Programming Updates

AC Transit Mission Blvd TSP: At project completion, AC Transit requested that \$752,670 in savings from the FY22 LCTOP award for this project be reprogrammed to the Fruitvale Corridor TSP project. MTC had previously approved a similar request to add the Fruitvale Corridor TSP project as a new TPI project and transfer savings from the completed Dumbarton IDEA project. MTC approved the Mission Blvd reprogramming request via the Executive Director's Administrative Authority, and AC Transit is awaiting final Caltrans approval of the new project and funding transfer.

Individual Project Updates

Staff collected reports from sponsors on all ongoing projects in November 2025 covering recent project progress and milestones, budget and schedule updates, and other changes to the project or status. Following is a summary of each report, organized by funding round.

Round 1

VTA

Light Rail TSP (substantially complete)

- All construction activity is completed
- Moved into revenue service with the vast majority of intersections, remaining will be put into service after final approvals
- VTA currently refining the system and will measure and report on benefits next year



TSP equipment - intersection (left) and in-vehicle (right) installations. VTA Photos.

Stevens Creek – Limited 323 TSP (substantially complete)

- Original scope complete
- Savings directed towards additional TSP Central Monitoring System – the server has been activated and field devices installed
- Closeout anticipated in the coming months

SFMTA

N-Judah

- TSP, lane colorization, camera elements complete
- Stop branding design is complete; installation is anticipated in the coming months

Round 2

SFMTA

Geary Rapid Project Phase 1 (Substantially Complete)

- Initial implementation resulted in 1-2 minutes of peak hour transit travel time savings
- Construction of Phase 1, including transit lane colorization, was completed in 2024
- Closeout is dependent on other project components and is expected in the next reporting period

Colored Lanes on Rapid Network

- All original colored lanes segments and segments added before 2024 are complete
- Additional savings redirected via staff approval to additional segments on Mission Street and additional red thermoplastic paint; this scope is complete and closeout is anticipated in the next reporting period



Colored lane at Second and Mission St. SFMTA Photo.

Round 3

AC Transit

AC Transit San Pablo/Telegraph Rapid Bus Upgrades Project

- Construction on both the Telegraph and San Pablo segments is complete
- Before/after study underway
- The project has cost savings on the original OBAG award; staff are working with AC Transit to redirect these funds according to TPI policies.



Photo: Telegraph Rapid Bus Stop Improvements. AC Transit Photo

SamTrans

Traffic Signal Priority on El Camino Real

- Original scope completed with cost savings
- Scope expanded in 2022 to implement TSP equipment across the full 322-bus fleet
- TSP has already been installed on 199 buses and the current procurement will add TSP equipment on the remaining 107 expansion buses currently in production as they are delivered.
- Remaining buses will be replaced in 2028, and TSP will be installed on the replacement buses

LCTOP Projects – FY18 through FY22 and FY24

AC Transit

Mission Boulevard TSP

- Scope: Implement TSP along the Mission Blvd. corridor in Hayward and Union City to close the gap in the Adaptive Traffic Control Systems
- Project completed and closed out; savings transferred to new Fruitvale Corridor TSP project

Cutting Boulevard Project

- Scope: Bus stop relocations, bus bulbs, longer bus stops, and accessibility improvements along Cutting Boulevard
- Project complements MTC's RM3-funded Richmond-San Rafael Forward Cutting Boulevard project
- Design progressed to 65%, alongside coordination with the City of Richmond and Caltrans
- Construction contract will be shared with the MacDonald Avenue TSP project for efficiency

Fruitvale Corridor TSP

- New project added in 2025 utilizing savings from completed Dumbarton IDEA and Mission Boulevard TSP projects
- Scope: Install TSP improvements along Fruitvale Avenue between MacArther Blvd and E. 9th Street and on San Leandro St.
- New project awaiting final approval by the state
- Initial coordination began, design anticipated to start in the spring

SFMTA

5-Fulton Arguello to 25th Ave Muni Forward

- Scope: Transit bulb-outs and signal upgrades, including additional locations added with savings from the 27-Bryant project
- Construction completed and project is closed out



Fulton bus bulbs. SFMTA images

29-Sunset Muni Forward Phase 1

- Scope: stop consolidation, traffic signal upgrades, and other improvements to improve reliability, travel time, and safety
- Stop-related work on Sunset Blvd is complete
- Preliminary TSP work began
- Additional work on Lincoln and the south end of the segment will progress in the coming months

Cloud-Based TSP

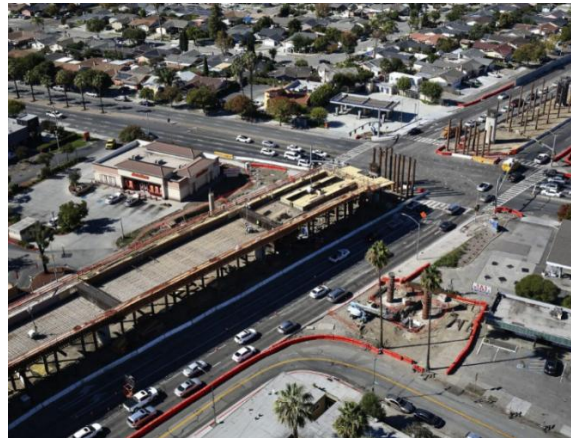
- Scope: Upgrade network equipment and software to implement next-generation TSP across the Muni system
- Signal upgrades began at intersections with existing TSP
- Pilot and testing of new TSP products will begin next year, followed by equipment procurement and installation

VTA

Eastridge to BART Regional Connector

- TPI funding for this project includes:
 - Reprogrammed FY 18 LCTOP funds
 - Replacement project for the LCTOP-funded FY 2019 ZEB project (which is not TPI eligible)
 - FY21 LCTOP funds

- Commission also allocated \$130M in RM3 bridge toll funds for construction
- Construction continued: Stage 1 road widening is complete and stage 2 aerial guideway is underway
- Revenue service anticipated to start in 2028



EBRC Construction progress – Left: completed guideway near Story Road; Right: bridge construction at Story Road. VTA images

Senter Road Bus Boarding Islands and Bulb Outs

- Scope: Construct bus boarding islands and bulb outs to reduce transit delays and maintain frequencies
- Design for Senter Road corridor (LCTOP-funded segment) is complete and construction is anticipated to start in the spring
- Phase 2 includes intersection work and proceeding on a later schedule due to federal funding timelines

TPI 2022-23 Program (LCTOP and OBAG funds)

AC Transit

Foothill Corridor Planning Study

- Scope: Study to identify service and design improvements to reduce delay and improve bus operations
- Initial coordination with the City of Oakland began
- Plan to procure consultant and kickoff study in 2026

MacDonald Ave TSP Project Phase 1

- Scope: Install TSP equipment along MacDonald Ave in Richmond
- 65% design completed
- Project will share a construction contract with the Cutting Blvd project for efficiency

SFMTA

Muni Forward Five-Minute Network Corridor Planning

- Scope: Develop next generation of Muni Forward corridor projects to support five-minute headways
- FTA grant executed
- Early planning initiated for phase 1 corridors

Next Generation Transit Lane and Bus Zone Enforcement Pilot

- Scope: Modernize a quarter of the Muni bus fleet with next generation camera technology to improve lane violation detection
- Developed an RFP to procure an external vendor

29-Sunset Improvement Project Phase 2

- Scope: Removal of some stops, relocation of stops, improved amenities, implementation of TSP on the Muni 29 Sunset Bus Route
- Awaiting FTA award
- Began preliminary engineering with local funds

Third Street Dynamic Traffic Signal Optimization Project

- Scope: Evaluate and implement traffic signal improvements including upgraded or replaced smart traffic cameras, improved vehicle detection technology, and signal retiming
- Project start delayed due to FTA grant processing delays
- Performed initial evaluation of potential improvements and refined scope to focus implementation on smart traffic cameras and signal retiming

VTA

Monterey Road Transit Lane (Planning)

- Scope: Transportation Analysis and Final Design for dedicated bus lanes on Monterey Road
- Project not yet started, awaiting FTA award

Transit Reliability Improvement and Performance System (TRIPS)

- Scope: Implement a centralized TSP system
- Continued to develop funding agreements with Cities of Cambell and Sunnyvale to integrate local intersections into the TSP system
- Work will proceed after funding agreements are executed

Other Operators

County Connection – Transit Corridors Study

- Scope: Analyze current conditions on four major bus corridors, gather feedback, and identify speed and reliability improvements
- Continued planning work and stakeholder engagement

SamTrans – El Camino Real Mid-County Transit and Multimodal Corridor Plan

- Scope: Develop preferred conceptual design for the El Camino Real mid-county corridor
- Consultant completed existing conditions and prepared design alternatives for each segment
- Phase 1 of community outreach (build awareness and learn existing conditions) was completed

Marin Transit – Marin County Highway 101 Part Time Transit Lane

- Scope: Pilot a Part Time Transit lane on the shoulder of SB US-101 in Marin County, implemented by the Transportation Authority of Marin (TAM)
- Secured a consultant and executed an agreement with Caltrans for preparation and oversight of the Project Initiation Document

Napa Valley Transportation Authority – Napa Valley Transit Safety and Efficiency Improvements

- Scope: Suite of improvements at three transit facilities and to vehicles serving the Vine transit network
- Soscot Gateway Transit Center wayfinding and signage installations are complete
- System-wide vehicle surveillance system installed and in operation
- Imola Park and Ride surveillance system completed, and electronic signage installation continued
- Redwood Park and Ride improvements, initiated procurement for construction contract



CCTV/Surveillance System and Cameras at Imola Park and Ride. NVT image

Look Ahead

A TPI call for projects utilizing FY 2025-26 LCTOP funds was released by MTC in November, and applications are due on January 16, 2025. The sponsor and recipient of the state LCTOP funds must be a transit operator-eligible to receive State Transit Assistance (STA) funds. Staff intend to present recommended funding awards along with the FY 2025-26 LCTOP population-based funding program to the Commission for approval in April 2026.

Staff will continue to monitor project progress and work with project sponsors to apply project savings to additional improvements consistent with the TPI Savings Policy.

For future transit priority funding, including annual LCTOP funding allocations, staff anticipate coordinating with the Bus Accelerated Infrastructure Delivery (BusAID) program or other Regional Network Management transit priority efforts.

Background and Context

Additional background information on TPI funds and projects can be found in the Committee and Commission items for the following actions:

Initial Programming of each TPI round:

- [STP/CMAQ Round 1 – May 17, 2012](#)
- [STP/CMAQ Round 2 – September 24, 2014](#)
- [STP/CMAQ Round 3 – January 25, 2017](#)
- [STP/CMAQ Round 4 – July 26, 2017](#)
- [LCTOP FY 17-18 – March 28, 2018](#)
- [LCTOP FY 18-19 – April 24, 2019](#)
- [LCTOP FY 19-20 – March 25, 2020](#)
- [LCTOP FY 20-21 – March 24, 2021](#)
- [LCTOP FY 21-22 – March 23, 2022](#)
- [FY2022-23 Round – February 22, 2023](#)
- [LCTOP FY 23-24 – March 27, 2024](#)

Major Reprogramming Actions:

- Round 1
 - [July 22, 2015](#)
- Round 2
 - [January 25, 2017](#)
- Round 3
 - [April 26, 2017](#)
- LCTOP FY 17-18
 - [December 16, 2020](#)