METROPOLITAN
TRANSPORTATION
COMMISSION

Bay Area Metro Center
375 Beale Street, Suite 800
San Francisco, CA 94105
415.778.6700
www.mtc.ca.gov

Air Quality Conformity Task Force

Metropolitan Transportation Commission
Bay Area Metro Center
Mount Hamilton Conference Room
375 Beale Street, Suite 800
(Note: Visitors must check in with the receptionist on the 7th floor)
San Francisco, CA

Conference Call Number: Dial - **(415) 655-0002 (Access Code: 929 406 755)**

Participant ID is **# button.**

Thursday, February 22, 2018
9:30 a.m. –11:00 a.m.

AGENDA

1. Welcome and Introductions

2. $PM_{2.5}$ Project Conformity Interagency Consultations

   a. Consultation to Determine Project of Air Quality Concern Status
      i. 7th Street Grade Separation (East) Project
      ii. 7th Street Grade Separation (West) Project
      iii. 7th Street Grade Separation (East and West) Project Presentation

   b. Confirm Projects Are Exempt from $PM_{2.5}$ Conformity
      i. Projects Exempt Under 40 CFR 93.126 – Not of Air Quality Concern

3. Projects with Regional Air Quality Conformity Concerns

   a. Review of the Regional Conformity Status for New and Revised Projects
   (This agenda item will be available on the MTC website prior to the February 22nd meeting)

4. Release of Draft Transportation Conformity Analysis for the Amended Plan Bay Area 2040 and the Amended 2017 Transportation Improvement Program – (Update)

5. Consent Calendar

   a. January 25, 2018 Air Quality Conformity Task Force Meeting Summary

6. Other Items

   Next Meeting: March 22, 2018

MTC Staff Liaison: Harold Brazil hbrazil@bayareametro.gov

METROPOLITAN
TRANSPORTATION
COMMISSION

Bay Area Metro Center
375 Beale Street
San Francisco, CA 94105
TEL 415.778.6700
WEB www.mtc.ca.gov

Memorandum

TO: Air Quality Conformity Task Force DATE: February 9, 2018

FR: Harold Brazil W. I.

RE: $PM_{2.5}$ Project Conformity Interagency Consultation

A project sponsor representing two projects (two separate components of the same project), seek interagency consultation from the Air Quality Conformity Task Force (AQCTF) at today's meeting and the projects are as follows:

No.	Project Sponsor	Project Title
1	Alameda County Transportation Commission	7th Street Grade Separation East Project
2	Alameda County Transportation Commission	7th Street Grade Separation West Project

2ai_7th_Street_Grade_Separation_East _Project_Assessment_Form.pdf (for the 7th Street Grade Separation East project)

2aii_7th_Street_Grade_Separation_West _Project_Assessment_Form.pdf (for the 7th Street Grade Separation West project)

MTC also requests the review and concurrence from the Task Force on projects that project sponsors have identified as exempt and likely not to be a POAQC. **2b_Exempt List 02092018.pdf** lists exempt projects under 40 CFR 93.126

Application of Criteria for a Project of Air Quality Concern
Project Title: 7th Street Grade Separation East
Project Summary for Air Quality Conformity Task Force Meeting: (February 22, 2018)

Description

The Alameda County Transportation Commission (Alameda CTC), in cooperation with the Port of Oakland (Port) proposes to construct the 7th Street Grade Separation and Port Arterial Improvements Project (GoPort), a package of landside transportation improvements within the Port, which are critical to the San Francisco Bay regional economy. These improvements include the 7th Street Grade Separation West (7SGSW) project, the 7th Street Grade Separation East (7SGSE) project, the Port Utility Relocation (PUR) project, and the Oakland Freight Intelligent Transportation System (FITS) project, consistent with the Intelligent Transportation Systems and Technology (ITST) Master Plan. The 7SGSE project, which is the subject of this Application of Criteria for a Project of Air Quality Concern, is located on 7th Street within the Port of Oakland. Key components of the 7SGSE project include:

- Reconstruction of the existing four-lane underpass at the Union Pacific Railroad (UPRR) mainline tracks between Bay Street and Maritime Street, to meet current seismic and geometric standards with a 16.5-foot vertical clearance, two 12-foot wide travel lanes, and shoulders in each direction
- Reconstruction and widening of the existing multi-use path to include a 10-foot pathway, 2-foot shoulders and a crash barrier separating the path from the roadway
- Reconstruction of railroad tracks, switches and appurtenant rail infrastructure
- Reconstruction of all appurtenant features to the roadway, including street lighting, storm drain infrastructure, pumping plant, signage and striping
- Installation of changeable message signs at the intersection of 7th Street and Maritime Street (compatible with the FITS project)

In addition, 7SGSE includes related work including right of way acquisition, demolition, and filling in of the existing grade separation after opening the new one. The 7SGSE project falls under 40 CFR 93.126 (Railroad/Highway Crossing) as a grade separation that does not change the number of through lanes, and does not change the channelization or signalization status of intersections at either end.

The existing grade separation on 7th Street at the UPRR Railport entrance is substandard in lane width, multi-use path conditions, and structural condition. The 7SGSE would replace the grade separation structure and multi-use path with a facility that meets current seismic and geometric standards on an adjacent, parallel alignment then demolish or fill in the old structure.

The 7SGSE project is independent from the 7SGSW project, which is located west of the 7SGSE project. Neither the 7SGSE nor the 7SGSW grade separation projects add through lanes – roadway capacity overall is not changed.

7th Street is an urban arterial. It is a major truck route within the Port, and provides one of the three main road entrances to the Port. Heavy trucks dominate the existing and projected traffic volumes. Projected opening year volumes exceed 10,000 trucks under the baseline scenario, and in 2040 for both baseline and build scenarios, at Maritime Street (western portion of the 7SGSE project study area). However, total annual average daily traffic (AADT) is well under the total AADT criterion discussed in U.S. EPA conformity analysis guidance, and the 7SGSE project meets normal criteria for an exempt grade separation project.

No public transit lines provide service within the Port (AC Transit online map, accessed 1/12/18). Bay Area Rapid Transit (BART) passes through the project study area on an elevated structure just south of and generally parallel to 7th Street; the closest BART station is approximately 0.75 mile east.

Background

- NEPA process Categorical Exclusion is expected to be completed in 2018.
- 7SGSE project would include improvements to existing bicycle/pedestrian access.
- 7th Street within the project study area is an urban arterial.

Exempt Project (40 CFR 93.126, Railroad/Highway Crossing)

The normal criteria for an exempt grade separation project are that it matches the number of lanes at each approach to the existing crossing (the 7SGSE project matches both the number of lanes at each end of

the project study area, and the number of lanes in the existing grade separation), and does not include "127" components such as new channelization or signalization (the 7SGSE project makes no change to signalization or channelization to intersections at each end of the project study area, and only modifies the one existing channelization within the project study area to relocate it due to the new alignment used for the new separation). The existing grade separation will be deactivated and filled in or demolished after the new grade separation opens. The multi-use path is also exempt from conformity under 40 CFR 93.126

Not a Project of Air Quality Concern (40 CFR 93.123(b)(1))
If the 7SGSE project is determined to not be fully exempt from conformity, possibly due to the realignment needed for construction:

(i) New or expanded highway projects with significant number/increase in diesel vehicles?

- Not a new or expanded highway project. The 7SGSE project would relocate the existing street with no change in through lanes.
- Existing traffic is dominated by diesel vehicles, and projected Opening Year (No Build) and Horizon Year (No Build and Build) traffic will include a significant number of diesel vehicles. Differences in AADT are not caused by increases in capacity; Port activity is the basis for projected changes.

(ii) Affects intersections at LOS D, E, or F with a significant number of diesel vehicles?

- Intersection at the west end (Maritime Street) will operate at LOS D or worse in No Build and Build alternatives without construction of the East grade separation.
- Potential traffic redistribution from the 7SGSE project anticipated to be minimal.
- The 7SGSE project has truck % exceeding 50% in all analysis cases (Existing, Opening Year Build/No Build, Horizon Year Build/No Build). Truck volumes exceed 10,000 AADT for Opening Year No Build and Horizon Year Build and No Build at Maritime Street. However, there are no nearby residential or other sensitive land uses (nearest residential uses are to the east across Interstate 880 (I-880), more than 0.5 mile away), total AADT is well below the EPA criterion for concern, and the 7SGSE project makes no changes to that intersection.
- The 7SGSE project may help reduce vehicular traffic via modal shift to walking and biking (through improvement of the existing multi-use path).

*(iii) New bus and rail terminals and transfer points?—*Not Applicable

*(iv) Expanded bus and rail terminals and transfer points?—*Not Applicable

(v) Affects areas identified in PM10 or PM2.5 implementation plan as site of violation? <<<CHECK SIP

- The project study area is not in and does not affect locations, areas, or categories of sites that are identified in a PM_{10} or $PM_{2.5}$ implementation plan.
- The immediate project area is not considered to be a site of violation or possible violation in the SIP.

Future Traffic Volumes

The 7SGSE project replaces a grade separation, with bicycle/pedestrian and rail facilities, and does not add through traffic lanes. Future traffic volumes overall are expected to be similar for Build and No Build alternatives, though with increased congestion in the No Build case.

Recommendation

The 7SGSE project should be exempt from conformity under 40 CFR 93.126. If the CTF determines that full exemption is not appropriate, it should not be a POAQC because:

- Annual Average Daily Traffic (AADT) is well below 125,000
- Truck volumes are significant in both Build and No Build alternatives, but the 7SGSE project makes no change to those volumes.
- The 7SGSE project does not add through lanes.

RTIP ID# *(required)*
In progress

TIP ID# *(required)*
In progress

Air Quality Conformity Task Force Consideration Date
2/22/2018

Project Description *(clearly describe project)*
The 7th Street Grade Separation East (7SGSE) project consists of the reconstruction of the existing 7th Street underpass on an adjacent alignment, rail tracks, and other rail infrastructure at the Union Pacific Railroad (UPRR) tracks between west of 880 and Maritime Street, in the Port of Oakland, that maximizes the operation of the Port's overall roadway system to provide traffic management benefits. No through lanes will be added. The multi-use path along 7th Street (part of the Bay Area trail) will be improved and brought up to standard. See Figure 1 for a Project Vicinity Map.

Type of Project:
Railroad/Highway Crossing (Grade Separation) replacement.

County	***Narrative Location/Route & Postmiles***
Alameda	On 7th Street in Port of Oakland, between west of I-880 and Maritime Street

Lead Agency: Alameda CTC

Contact Person (ACTC)	***Phone#***	***Fax#***	***Email***
Bashar Dayoub	(510) 208-7435	(510) 893-6489	bdayoub@alamedactc.org

Federal Action for which Project-Level PM Conformity is Needed *(check appropriate box)*

X	*Categorical Exclusion (NEPA)*	**EA or Draft EIS**	**FONSI or Final EIS**	**PS&E or Construction**	*Other*

Scheduled Date of Federal Action: Fall 2018

NEPA Delegation – Project Type *(check appropriate box)*

	X	**Section 326 – Categorical Exclusion**	**Section 327 – Non-Categorical Exclusion**

Current Programming Dates *(as appropriate)*

	PE/Environmental	**ENG**	**ROW**	**CON**
Start	12/2017	7/2018	7/2018	6/2020
End	6/2018	12/2019	12/2019	12/2022

Project Purpose and Need (Summary): *(please be brief)*

Alameda CTC proposes to design and construct the 7SGSE project to optimize the mobility of Port users through the 7th Street corridor by providing structural upgrades to meet current roadway and railway design standards. The 7SGSE project would provide improved multi-modal traffic operations consistent with the overall GoPort (described further below) Purpose and Need. Provision of the improved underpass and a continuous bicycle and pedestrian multi-use path (a portion of the San Francisco Bay Trail) would improve traffic conditions upon completion of construction and opening of 7SGSE. The limits of the 7SGSE project have been set to provide improved connections to existing roadways, multi-use paths, and terminals at the Port. The completed 7SGSE project would conform to 7th Street east of Bay Street Circle (at the existing Union Pacific Railroad [UPRR] main line grade separation and I-880 ramp) and at Maritime Street, as shown in Figure 2 (7SGSE Project Roadway & Rail Elements) and Figure 3 (Plan and Profile).

GoPort is a package of landside improvements including the 7SGSE project, 7th Street Grade Separation West (7SGSW) project, the Port Utility Relocation (PUR) project, and the Oakland Freight

Intelligent Transportation System (FITS) project. GoPort would support a mode shift from truck to rail and also enable smart solutions to manage operations and improve safety on the Primary Highway Freight System (PHFS) within the Port's Seaport area and the connecting PHFS routes on the National Highway Freight Network. GoPort is included in the Metropolitan Transportation Commission's (MTC) 2017 Regional Transportation Improvement Plan.

The purpose of the 7SGSE project is to provide efficient multi-modal[1] landside access and infrastructure improvements to promote existing and anticipated Port operations, which are critical to the San Francisco Bay Area regional economy.

The 7SGSE project would:

- Improve movements on the PHFS Intermodal Connectors
- Provide landside access and infrastructure improvements that meet current design standards
- and accommodate anticipated uses
- Improve access for emergency responders
- Maintain and expand the Port's market and operational competitiveness
- Support regional economic development and growth

The 7SGSE project is needed to:

- Provide access and infrastructure improvements for effective multi-modal transportation for the following modes:
    - Rail freight
    - Truck and automobile
    - Bicycle and pedestrian traffic
- Manage truck traffic within the Port
    - Improve air quality and reduce GHG emissions through reduced congestion
    - Address existing restricted overhead clearance and deficient line of sight within existing undercrossing
- Support safe transportation system operations
    - Increase safety of truck operations through improved roadway geometry and signalization
    - Provide roadways that support emergency response
    - Minimize bicycle and pedestrian conflicts with other travel modes by providing reconstructed and improved public bicycle and pedestrian access
- Support regional economic development and Port growth potential
    - Reduce landside infrastructure constraints
    - Improve transportation infrastructure consistent with applicable planning documents
    - Support regional goods movement strategies

7SGSE project improvements include the following key elements, shown in Figure 2:

- Reconstruction of the existing four-lane underpass at the UPRR mainline tracks between Bay Street and Maritime Street, to meet current seismic and geometric standards with a 16.5-foot vertical clearance, two 12-foot wide travel lanes, and shoulders in each direction
- Reconstruction and widening of the existing multi-use path to include a 10-foot pathway, 2-foot shoulders and a crash barrier separating the path from the roadway
- Reconstruction of railroad tracks, switches and appurtenant rail infrastructure
- Reconstruction of all appurtenant features to the roadway, including street lighting, storm drain infrastructure, pumping plant, signage and striping
- Installation of changeable message signs at the intersection of 7th Street and Maritime Street

Surrounding Land Use/Traffic Generators *(especially effect on diesel traffic)*

The 7SGSE project is within the Port of Oakland, surrounded by and crossing the entrance of the Joint Intermodal Terminal (JIT); warehousing and other industrial land uses; and I-880 to the east. The Outer Harbor Intermodal Terminal (rail) is north of the project. Trucks dominate the traffic volume. Port activity generates a large amount of diesel traffic, and heavy trucks make up the majority of vehicles using the roadway under both existing and with-project conditions. There are residential areas to the east across I-880.

[1] Transportation modes include rail freight, truck, automobile, pedestrian, and bicycle travel.

Brief summary of assumptions and methodology used for conducting analysis

Assumptions:

The 7SGSE project matches the existing roadway at Maritime Street (west end), and at the existing UPRR mainline grade separation and I-880 interchange ramp intersections (east end). There is no change in the number of through lanes (4 lanes existing and future). The signalization and channelization status of the intersections at each end of the 7SGSE project study area is unchanged. Bay Street channelization would be modified due to 7th Street realignment related to new grade separation construction, but will otherwise remain as existing.

Opening Year: 2022
Horizon Year (RTP): 2040

Traffic data (AADT, truck volume/%) are based on:

1. Traffic operational study, Jacobs Engineering, 11/20/2017
2. Alameda CTC traffic volume projections, 12/21/2017

Port activity assumptions are shown in Table 1.

Methodology:

Project is reviewed using Project of Concern criteria in U.S. EPA guidance for particulate matter hot spot analysis under Transportation Conformity: total AADT of 125,000 and 8% trucks (equivalent to 10,000 truck AADT).

Opening Year: If facility is a highway or street, Build and No Build LOS[2], AADT, % and # trucks, truck AADT of proposed facility

OPENING YEAR FOR ANALYSIS: 2022	Build	No Build	Peak Periods
LOS at I-880 Ramps (east end of project)	D	D	AM, Mid, PM
LOS at Maritime Street (west end of project)	D	D	AM, Mid, PM
% trucks at I-880 Number of trucks at I-880 Total AADT at I-880	26% 4,968 19,186	Same	
% trucks at Maritime St. Number of trucks at Maritime St. Total AADT at Maritime St.	60% 12,290 20,493	Same	As stand-alone project
% trucks at Maritime St. Number of trucks at Maritime St. Total AADT at Maritime St.	56% 9,957 17,707	Same	With construction of 7SGSW

Analysis: Total AADT is well under 100,000. Truck percentages of actual total AADT are very high, and truck AADT is over 10,000 at the west end if the separate 7SGSW project is not built. AADT at the west end includes cross traffic on Maritime Street, and no changes are made to the number of through lanes or intersection channelization at Maritime Street. The 7SGSW project eliminates through traffic at the Maritime St. intersection on Maritime St.; the north leg of the intersection serves local traffic only.

RTP Horizon Year / Design Year: If facility is a highway or street, Build and No Build LOS[2], AADT, % and # trucks, truck AADT of proposed facility

HORIZON YEAR FOR ANALYSIS: 2040	Build	No Build	Peak Periods
LOS at I-880 Ramps (east end of project)	D	D	AM, Mid, PM
LOS at Maritime Street (west end of project)	D	D	AM, Mid, PM
% trucks at I-880 Number of trucks at I-880 Total AADT at I-880	32% 7,075 22,247	Same	
% trucks at Maritime St. Number of trucks at Maritime St. Total AADT at Maritime St.	64% 15,129 23,598	Same	As stand-alone project

% trucks at Maritime St. Number of trucks at Maritime St. Total AADT at Maritime St.	62% 13,022 21,022	Same	With construction of 7SGSW

Analysis: Total AADT is well under 100,000. Truck percentages of actual total AADT are very high, and truck AADT is over 10,000 at the west end. AADT at the west end includes cross traffic on Maritime Street, and no changes are made to the number of through lanes or intersection channelization at Maritime Street. The 7SGSW project eliminates through traffic at the Maritime St. intersection on Maritime St.; the north leg of the intersection serves local traffic only.

Opening Year: If facility is an interchange(s) or intersection(s), Build and No Build cross-street AADT, % and # trucks, truck AADT[2]

N/A Does not change channelization or signalization status of intersections.

RTP Horizon Year / Design Year: If facility is an interchange (s) or intersection(s), Build and No Build cross-street AADT, % and # trucks, truck AADT

N/A Does not change channelization or signalization status of intersections.

Opening Year: If facility is a bus, rail or intermodal facility/terminal/transfer point, # of bus arrivals for Build and No Build, % and # of bus arrivals will be diesel buses

N/A Not a transit or intermodal transfer facility.

RTP Horizon Year / Design Year: If facility is a bus, rail or intermodal facility/terminal/transfer point, # of bus arrivals for Build and No Build, % and # of bus arrivals will be diesel buses

N/A Not a transit or intermodal transfer facility.

Describe potential traffic redistribution effects of congestion relief *(impact on other facilities)*

By itself, the 7SGSE project should have little traffic redistribution effect. It replaces an existing grade separation with a new one that's up to structural and roadway design standards, but doesn't add through lanes or change channelization/signalization status of intersections. In combination with the separate 7SGSW project, the 7SGSE may redistribute some truck traffic from other Port access points to the Port access point within the 7SGSE project study area due to reduced conflicts with railroad grade crossings. AADT projections do not suggest a large change due to that effect.

Comments/Explanation/Details (please be brief)

GoPort is a package of landside transportation improvements within the Port, which are critical to the San Francisco Bay regional economy. The 7SGSW, 7SGSE, and PUR projects are identified as projects in the Oakland Army Base Master Plan. Improvements have been organized into projects with independent utility and logical termini, and can be constructed and financed on their own timelines. It is assumed that PUR and FITS shall be complete by 2022, and are thus included in the 7SGSW and 7SGSE 2022 Baseline Scenario. The opening year for all projects is assumed to be 2022 for conformity analysis purposes.

The focus of this discussion is the 7SGSE project. It is located along the eastern shore of San Francisco Bay within the Port's Seaport area, which extends from the east end of the San Francisco-Oakland Bay Bridge in the north to the urban commercial center of Jack London Square to the southeast. The 7SGSE project study area is generally bounded by west of Interstate (I-) 880 to the east, the Union Pacific Railport to the south, the JIT to the west and southwest, and the Outer Harbor Intermodal Terminal (OHIT) to the north, as shown in Figures 1 and 2.

The Port is expected to experience substantial growth in import and export volumes; marine terminal import and export volumes are expected to cumulatively increase by approximately 70 percent from 2.37 million twenty-foot equivalent units (TEUs) in 2016 to 4.05 million TEUs in 2040, resulting in an increase in intermodal railyard demand and daily truck and intermodal trips as shown in Table 1 of Preliminary Environmental Study, submitted to Caltrans 12/20/17. This forecasted growth in cargo volume would place heavy demands on existing transportation infrastructure, which currently exhibits

[2] LOS is referenced to baseline condition, which is the opening year with modifications for intersections affected by other projects. See Traffic report tables 9, 10, 11.

capacity constraints at Port intersections and along Port arterial roadways. 7th Street is one of three Port roadway entrances (West Grand Avenue, 7th Street, and Middle Harbor Road) that, in combination with railroad lines and bicycle and pedestrian facilities, provide goods movement and public access to and from the Port.

The 7SGSE project should be fully exempt from conformity (40 CFR 93.126) as a Railroad/Highway Crossing (grade separation) project. It replaces an existing grade separation with one meeting current roadway geometry and structural standards, and does not add through lanes or change the channelization/signalization status of intersections at either end.

Figure 1 – 7SGSE Project Vicinity Map

Table 1 – Existing and Projected Future Port of Oakland and Railyard Demand[3]

Demand[4]	2016	2040	Change, 2016-	% Change, 2016-
Port Demand (in millions of annual TEUs)	2.37M	4.05M	1.68M	71%
Port Demand (in daily truck trips)*	11,676	19,971	8,295	71%
Port related Railyard Demand (in annual Lifts)	312,985	900,000	587,015	188%
Non-Port related Railyard Demand (in annual Lifts)	48,919	90,933	42,014	86%
Total Railyard Demand (in annual Lifts)	361,904	990,933	629,029	174%
Port related Railyard Demand (in daily truck trips)*	2,685	7,988	5,303	197%
Non-Port related Railyard Demand (in daily truck trips)*	420	807	387	92%
Total Railyard Demand (in daily truck trips)*	3,105	8,795	5,690	183%

Includes inbound and outbound trucks

[3] 2017 Alameda CTC – 7th Street Grade Separation and Port Arterial Improvements Project – Truck and Auto Traffic Projections Methodology and Results Memorandum.

[4] While marine cargo is usually reported in TEUs, intermodal rail volume is reported in lifts. A lift measures a single container being lifted to/from a rail car. Since many marine containers are 40 feet in length, a marine container may be equivalent to 2 TEUs. Most marine containers at the Port are 40 feet in length, but a small portion is 20 feet in length. Taking this into account, the number of lifts at the rail yards can be computed by dividing the number of TEUs by 1.8, a factor obtained from the OAB EIR.

Figure 2 – 7SGSE Project Roadway & Rail Elements

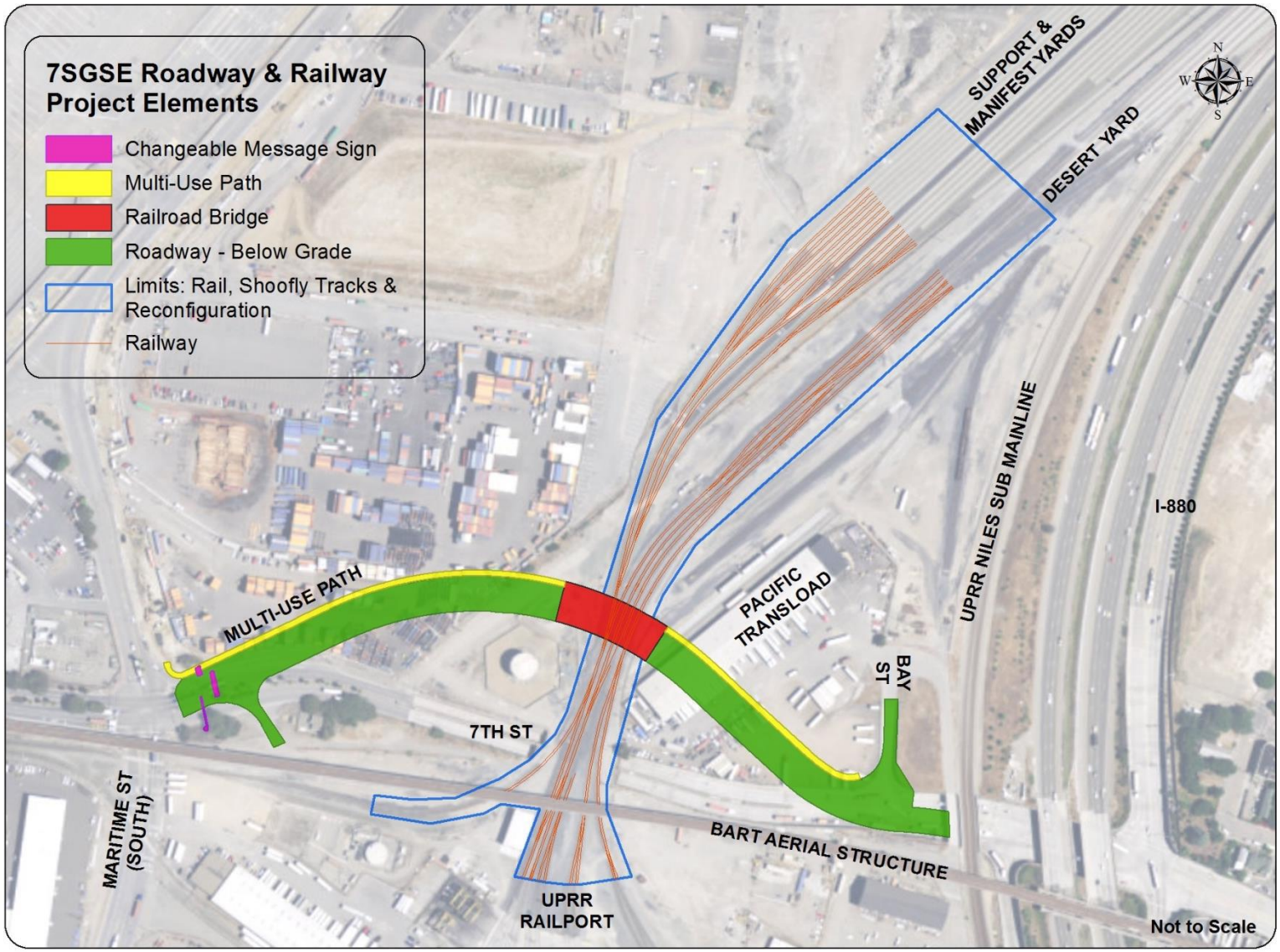
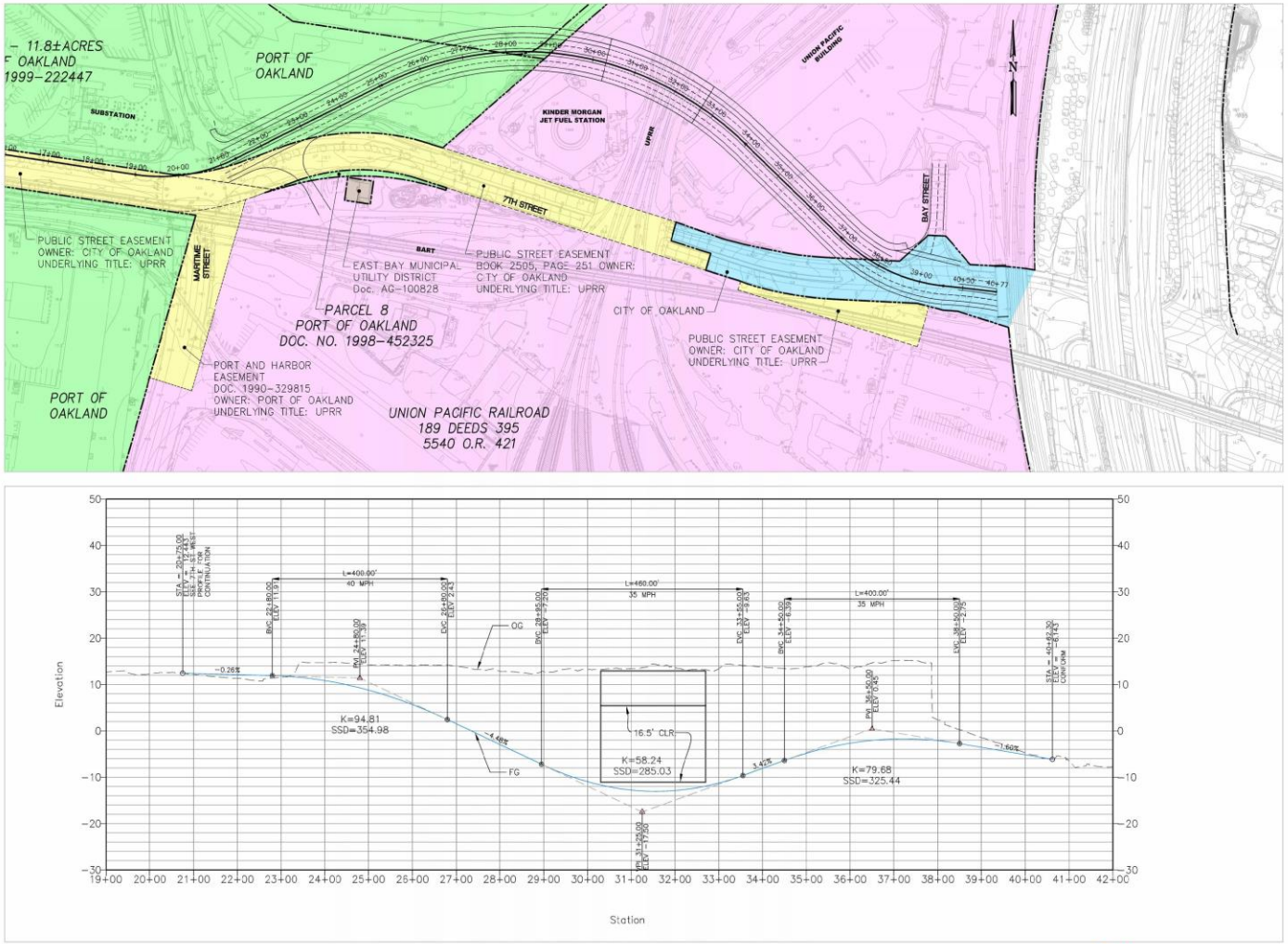


Figure 3 – 7SGSE Plan and Profile



JACOBS

0 50 100 200 300

SCALE IN FEET
HORIZONTAL

Date: 5/01/2017

Plan and Profile
7th Street (East)

ALAMEDA County Transportation Commission

PORT OF OAKLAND

7th Street Grade Separation and
Port Arterial Improvements Project

Application of Criteria for a Project of Air Quality Concern
Project Title: 7th Street Grade Separation West
Project Summary for Air Quality Conformity Task Force Meeting: (February 22, 2018)

Description

The Alameda County Transportation Commission (Alameda CTC), in cooperation with the Port of Oakland (Port) proposes to construct the 7th Street Grade Separation and Port Arterial Improvements Project (GoPort), a package of landside transportation improvements within the Port, which are critical to the San Francisco Bay regional economy. These improvements include the 7th Street Grade Separation West (7SGSW) project, the 7th Street Grade Separation East (7SGSE) project, the Port Utility Relocation (PUR) project, and the Oakland Freight Intelligent Transportation System (FITS) project, consistent with the Intelligent Transportation Systems and Technology (ITST) Master Plan. The 7SGSW project, which is the subject of this application, is located on 7th Street and Maritime Street within the Port of Oakland. Key components of the project include:

- Demolition of the entire existing Navy Roadway, from its northern limit at Maritime Street (North) to its southern limit at 7th Street
- Reconstruction and realignment of 7th Street between Maritime Street (South) and Navy Roadway
- Realignment of Maritime Street (North) and construction of an elevated T-intersection at the new 7th Street and Maritime (North) intersection
- Construction of a rail bridge over the Bay Area Rapid Transit (BART) subway near the western part of the realigned 7SGSW roadway to allow the railroad tracks to pass over the BART subway without impacting the structure
- Installation of a single set of railroad tracks, and related switches and rail infrastructure connecting the Outer Harbor Intermodal Terminal (OHIT) area with the JIT utilizing the new rail bridge over the BART subway (note the new rail track would start approximately 1,300 feet northeast of the Middle Harbor Road and 7th Street intersection and terminate at the Port Support Yard area)
- Reconstruction and widening of the existing multi-use path. The multi-use path reconstruction would begin at the existing at-grade Maritime Street (South) and 7th Street intersection and proceed northwest to the new grade-separated Maritime Street (North) and 7th Street intersection before connecting with existing multi-use path segments in the north at 14th Street and Maritime Street, and in the south at the Middle Harbor Road Shoreline Park entrance
- Replacement of street lighting, signals, and signage
- Connection of utilities installed in the PUR and FITS projects with the elevated structure approaching the new 7th Street and Maritime Street (North) T-intersection
- Provision of utility access for BART, utility maintenance and emergency response
- Provision of local access from eastbound 7th Street just west of the grade separation to the planned logistics facilities area and local streets

The 7SGSW project falls under 40 CFR 93.127 because of the realignment (horizontal and vertical), and new intersection with channelization and signal, involved in the project. Without the extensive realignment and new rail work, the 7SGSW project would probably be fully exempt (under 40 CFR 93.126, Railroad/Highway Crossing) from conformity as a grade separation.

The 7SGSW project is independent from the 7SGSE project, which simply replaces the existing 7th Street grade separation under the rail entrance to the Union Pacific Railroad (UPRR) yard. The existing grade separation is narrow, with substandard lanes for both road and non-motorized traffic, and does not meet current structural standards. Neither the 7SGSW nor the 7SGSE projects adds through lanes – roadway capacity overall is not changed.

7th Street is an urban arterial, as is Maritime Street. Both are major truck routes within the Port, and link to two of the three main road entrances to the Port. Heavy trucks dominate the existing and projected traffic volumes. Projected opening year volumes exceed 10,000 trucks under the baseline scenario, and in 2040 for both baseline and build scenarios. However, total annual average daily traffic (AADT) is well under the total AADT criterion discussed in U.S. EPA conformity analysis guidance.

No public transit lines provide service within the Port (AC Transit online map, accessed 1/23/18). Bay Area Rapid Transit (BART) passes through the project study area just south of and generally parallel to

7th Street, entering the Transbay Tube just west of Maritime Street; the closest BART station is approximately 0.9 mile east of the project study area. Because of the shallow depth of the BART tunnel at the entrance to the Joint Intermodal Terminal (JIT), the 7SGSW project will construct a rail bridge over the BART subway.

Background

NEPA process Categorical Exclusion is expected to be completed in 2018.
The 7SGSW project would include improvements to existing bicycle/pedestrian access.
7th Street within the project study area is an urban arterial.

Not a Project of Air Quality Concern (40 CFR 93.123(b)(1))

(i) New or expanded highway projects with significant number/increase in diesel vehicles?

- Not a new or expanded highway project. The 7SGSW would relocate existing street with no change in through lanes.
- Existing traffic is dominated by diesel vehicles, and projected Opening Year (No Build) and Horizon Year (No Build and Build) traffic will include a significant number of diesel vehicles. Differences in AADT are not caused by increases in capacity; Port activity is the basis for projected changes, as well as reconfiguration of intersections in the build alternative.

(ii) Affects intersections at LOS D, E, or F with a significant number of diesel vehicles?

- Both major intersections (7th Street at Maritime Street South and Maritime Street North) will operate at LOS D or worse during some or all peak periods (AM, midday, PM) under Existing, Opening Year Build and No Build, and Horizon Year Build and No Build). However, the Build alternative results in improvement of at least one LOS level at least at one of the intersections.
- Potential traffic redistribution from the 7SGSW project anticipated to be minimal.
- The 7SGSW project has truck % exceeding 50% in all analysis cases (Existing, Opening Year Build/No Build, Horizon Year Build/No Build). Truck volumes exceed 10,000 AADT for Opening Year No Build and Horizon Year Build and No Build. However, there are no nearby residential or other sensitive land uses (nearest residential uses are to the east across Interstate 880 [I-880], more than 0.5 mile away), and total AADT is well below the EPA criterion for concern.
- The 7SGSW project may help reduce vehicular traffic via modal shift to walking and biking (through improvement of the existing multi-use path) and freight rail (through improved access to the JIT). Encouraging greater use of rail for Port traffic is a goal of the 7SGSW project.

(iii) New bus and rail terminals and transfer points?—Not Applicable

(iv) Expanded bus and rail terminals and transfer points?—Not Applicable

(v) Affects areas identified in PM10 or PM2.5 implementation plan as site of violation?

- The project study area is not in and does not affect locations, areas, or categories of sites that are identified in a PM_{10} or $PM_{2.5}$ implementation plan.
- The immediate project area is not considered to be a site of violation or possible violation in the SIP.

Future Traffic Volumes

The 7SGSW project is primarily a grade separation, with bicycle/pedestrian and rail facilities, that does not add through traffic lanes. Future traffic volumes overall are expected to be similar for Build and No Build alternatives, though with increased congestion in the No Build case.

Recommendation

The 7SGSW project should not be a POAQC because:

- AADTs are well below 125,000
- Truck volumes are significant in both Build and No Build alternatives, but operate at a better level of service under the Build alternative.

- The rail component of the 7SGSW project will encourage diversion of freight traffic from trucks to rail by improving rail operations.
- The 7SGSW project does not add through lanes.

RTIP ID# *(required)*
In progress

TIP ID# *(required)*
In progress

Air Quality Conformity Task Force Consideration Date
2/22/2018

Project Description *(clearly describe project)*
The 7th Street Grade Separation West (7SGSW) project consists of realignment and grade separation of 7th Street within the Port commencing at the intersection of 7th and Maritime streets, installation of a grade separation west of the intersection, and construction of a rail spur underneath that will maximize the operation of the Port's overall roadway system to provide traffic management benefits. The 7SGSW project realigns Maritime Street north of 7th Street, and includes a new intersection with channelization and a signal at the location where the grade separation and Maritime Street (North) meet. See Figure 1 for a Project Vicinity Map and Figure 2 for Street Naming Conventions.

Type of Project:
Grade separation with horizontal and vertical realignment, new intersection with channelization and signal, and improved bicycle/pedestrian facilities.

County	***Narrative Location/Route & Postmiles***
Alameda	On 7th Street and Maritime Street in Port of Oakland

Lead Agency: Alameda CTC

Contact Person (ACTC)	***Phone#***	***Fax#***	***Email***
Bashar Dayoub	(510) 208-7435	(510) 893-6489	bdayoub@alamedactc.org

Federal Action for which Project-Level PM Conformity is Needed *(check appropriate box)*

X *Categorical Exclusion (NEPA)*	**EA or Draft EIS**	**FONSI or Final EIS**	**PS&E or Construction**	*Other*

Scheduled Date of Federal Action: Fall 2018

NEPA Delegation – Project Type *(check appropriate box)*

	X **Section 326 – Categorical Exclusion**	**Section 327 – Non-Categorical Exclusion**

Current Programming Dates *(as appropriate)*

	PE/Environmental	**ENG**	**ROW**	**CON**
Start	11/2017	6/2018	7/2018	11/2020
End	6/2018	4/2020	4/2020	10/2022

Project Purpose and Need (Summary): *(please be brief)*

Alameda CTC proposes to design and construct the 7SGSW project to optimize the mobility of Port users through the 7th Street corridor by providing structural upgrades to meet current roadway and railway design standards. The 7SGSW project would provide improved multi-modal traffic operations consistent with the overall GoPort (described further below) Purpose and Need. Provision of the new grade separation and a continuous bicycle and pedestrian multi-use path (a portion of the San Francisco Bay Trail) would improve traffic and non-motorized travel operation, and the new track underneath the grade separation would provide more direct access to the Joint Intermodal Terminal (JIT) while reducing traffic delays caused by trains blocking grade crossings while accessing the JIT. The limits of the 7SGSW project have been set to provide improved connections to existing roadways, multi-use paths, and terminals at the Port. The completed 7SGSW project would conform to 7th Street

(at Maritime Street [south)] and north of Middle Harbor Road) and Maritime Street (north). See Figure 2 for Street Naming Conventions.

GoPort is a package of landside improvements including 7SGSW project, the 7th Street Grade Separation East (7SGSE) project, the Port Utility Relocation (PUR) project, and the Oakland Freight Intelligent Transportation System (FITS) project. GoPort would support a mode shift from truck to rail and also enable smart solutions to manage operations and improve safety on the Primary Highway Freight System (PHFS) within the Port's Seaport area and the connecting PHFS routes on the National Highway Freight Network. GoPort is included in the Metropolitan Transportation Commission's (MTC) 2017 Regional Transportation Improvement Plan.

The purpose of the 7SGSW project is to provide efficient multi-modal[1] landside access and infrastructure improvements to promote existing and anticipated Port operations, which are critical to the San Francisco Bay Area regional economy.

The 7SGSW project would:

- Improve movements on the PHFS Intermodal Connectors
- Support increased rail freight mode share relative to trucks
    - Reduce congestion on the regional roadway system
    - Improve air quality and reduce greenhouse gas (GHG) emissions
- Provide landside access and infrastructure improvements that meet current design standards and accommodate anticipated uses
- Improve access for emergency responders
- Maintain and expand the Port's market and operational competitiveness
- Support regional economic development and growth

The 7SGSW project is needed to:

- Provide access and infrastructure improvements for effective multi-modal transportation for the following modes:
    - Rail freight
    - Truck and automobile
    - Bicycle and pedestrian traffic
- Improve rail freight operations and manage truck traffic within the Port
    - Increase opportunities to move containers by rail and truck
    - Minimize truck wait times by providing a grade separation at 7th Street and Maritime Street
    - Improve air quality and reduce GHG emissions through reduced congestion
- Support safe transportation system operations
    - Increase safety of truck operations through improved roadway geometry and signalization
    - Provide roadways that support emergency response
    - Separate rail and truck travel modes, reducing potential for traffic accidents
    - Minimize bicycle and pedestrian conflicts with other travel modes by providing reconstructed and improved public bicycle and pedestrian access
- Support regional economic development and Port growth potential
    - Reduce landside infrastructure constraints
    - Improve transportation infrastructure consistent with applicable planning documents
    - Support regional goods movement strategies

7SGSW project improvements include the following key elements, shown in Figure 3:

- Demolition of the entire existing Navy Roadway, from its northern limit at Maritime Street (North) to its southern limit at 7th Street
- Reconstruction and realignment of 7th Street between Maritime Street (South) and Navy Roadway
- Realignment of Maritime Street (North) and construction of an elevated T-intersection at the new 7th Street and Maritime (North) intersection

[1] Transportation modes include rail freight, truck, automobile, pedestrian, and bicycle travel.

- Construction of a rail bridge over the Bay Area Rapid Transit (BART) subway near the western part of the realigned 7SGSW roadway to allow the railroad tracks to pass over the BART subway without impacting the structure
- Installation of a single set of railroad tracks, and related switches and rail infrastructure connecting the Outer Harbor Intermodal Terminal (OHIT) area with the JIT utilizing the new rail bridge over the BART subway (note the new rail track would start approximately 1,300 feet northeast of the Middle Harbor Road and 7th Street intersection and terminate at the Port Support Yard area)
- Reconstruction and widening of the existing multi-use path. The multi-use path reconstruction would begin at the existing at-grade Maritime Street (South) and 7th Street intersection and proceed northwest to the new grade-separated Maritime Street (North) and 7th Street intersection before connecting with existing multi-use path segments in the north at 14th Street and Maritime Street, and in the south at the Middle Harbor Road Shoreline Park entrance
- Replacement of street lighting, signals, and signage
- Connection of utilities installed in the PUR and FITS projects with the elevated structure approaching the new 7th Street and Maritime Street (North) T-intersection
- Provision of utility access for BART, utility maintenance and emergency response
- Provision of local access from eastbound 7th Street just west of the grade separation to the planned logistics facilities area and local streets

Surrounding Land Use/Traffic Generators *(especially effect on diesel traffic)*

The 7SGSW project is within the Port of Oakland, surrounded by warehouse, rail, and intermodal facilities. Trucks dominate the traffic volume, and the 7SGSW project is intended to improve traffic operation by reducing queuing of trucks at railroad crossings and inefficient existing intersections. The Outer Harbor Intermodal Terminal (rail) is north of the project. Port activity generates a large amount of diesel traffic, and heavy trucks make up the majority of vehicles using the roadway under both existing and with-project conditions. There are residential areas to the east across I-880.

Brief summary of assumptions and methodology used for conducting analysis

Assumptions:
The 7SGSW project matches the existing roadway at Maritime Street (east end), 7th Street at Middle Harbor Road (southwest end) and Maritime Street north (north end). There is no change in the number of through lanes (4 lanes existing and future). The railroad/roadway grade separation will result in a new intersection with Maritime Street (north), with new channelization and signalization, local access will be modified for adjoining and nearby properties.

Project is assumed to fall under 40 CFR 93.127 due to realignment (horizontal and vertical) and new intersection with channelization and signalization. The 7SGSW project also includes modification of local access routes, realigned and new multi-use bicycle/pedestrian path, and a new rail track. Full review by the Conformity Task Force is assumed.

Opening Year: 2022
Horizon Year (RTP): 2040

Traffic data (AADT, truck volume/%) are based on:

1. Traffic operational study, Jacobs Engineering, 11/20/2017
2. Alameda CTC traffic volume projections, 12/21/2017

Port activity assumptions are shown in Table 1.

Methodology:
Project is reviewed using Project of Concern criteria in U.S. EPA guidance for particulate matter hot spot analysis under Transportation Conformity: total AADT of 125,000 and 8% trucks (equivalent to 10,000 truck AADT).

Opening Year: If facility is a highway or street, Build and No Build LOS[2], AADT, % and # trucks, truck AADT of proposed facility

OPENING YEAR FOR ANALYSIS: 2022	Build	Baseline	Peak Periods
LOS at existing Maritime St. South (east end of project))	B	D	All
LOS at Maritime Street North (new intersection)	B	n/a	All
LOS at Middle Harbor Rd./7th St. (west of & not part of project)	D	D	Worst (PM)
% trucks at Maritime St. South (east end of project)	56%	60%	
Number of trucks at Maritime St. South	9,957	12,290	
Total AADT at Maritime St. South	17,707	20,493	
% trucks at Maritime St. North (new intersection)	60%		
Number of trucks at Maritime St. North	11,720	n/a	
Total AADT at Maritime St. North	19,549		
% trucks at Middle Harbor/7th St. (west of & not part of project)	76%	Same	
Number of trucks at Middle Harbor/7th St.	6,151		
Total AADT at Middle Harbor/7th St.	8,072		

Maritime St. South is modified in the Build scenario to eliminate through traffic on Maritime St. The north leg of the intersection serves only local access in the Build scenario.

RTP Horizon Year / Design Year: If facility is a highway or street, Build and No Build LOS[2], AADT, % and # trucks, truck AADT of proposed facility

HORIZON YEAR FOR ANALYSIS: 2040	Build	Baseline	Peak Periods
LOS at existing Maritime St. South (east end of project))	C	D	All
LOS at Maritime Street North (new intersection)	B	n/a	All
LOS at Middle Harbor Rd./7th St. (west of project)	D	D	Worst (PM)
% trucks at Maritime St. South (east end of project)	62%	64%	
Number of trucks at Maritime St. South	13,022	15,129	
Total AADT at Maritime St. South	21,022	23,598	
% trucks at Maritime St. North (new intersection)	65%		
Number of trucks at Maritime St. North	14,323	n/a	
Total AADT at Maritime St. North	22,026		
% trucks at Middle Harbor/7th St. (west of & not part of project)	78%	Same	
Number of trucks at Middle Harbor/7th St.	6,882		
Total AADT at Middle Harbor/7th St.	8,882		

Maritime St. South is modified in the Build scenario to eliminate through traffic on Maritime St. The north leg of the intersection serves only local access in the Build scenario.

[2] LOS is referenced to baseline condition, which is the opening year with modifications for intersections affected by other projects. Traffic report tables 9, 10, 11.

Opening Year: If facility is an interchange(s) or intersection(s), Build and No Build cross-street AADT, % and # trucks, truck AADT

OPENING YEAR FOR ANALYSIS: 2022	Build	Baseline
Maritime Street South (east end of project)		
Cross Street Total AADT	11,772	15,771
Cross Street Truck AADT	7,366	10,505
Cross Street Truck %	63%	67%
Maritime Street North (new intersection, west end of grade separation)		
Cross Street Total AADT	5,752	n/a
Cross Street Truck AADT	4,237	
Cross Street Truck %	74%	

* West end of grade separation is a new intersection replacing the north leg of the existing Maritime Street South intersection. North leg of the Maritime Street South intersection will serve local traffic only in the Build scenario.

Cross-street AADT figured as all NB and SB movements, plus EB & WB turning movements. 7th Street runs essentially east-west.

RTP Horizon Year / Design Year: If facility is an interchange (s) or intersection(s), Build and No Build cross-street AADT, % and # trucks, truck AADT

OPENING YEAR FOR ANALYSIS: 2022	Build	Baseline
Maritime Street South (east end of project)		
Cross Street Total AADT	14,086	17,888
Cross Street Truck AADT	9,570	12,419
Cross Street Truck %	68%	70%
Maritime Street North (new intersection, west end of grade separation)		
Cross Street Total AADT	6,234	n/a
Cross Street Truck AADT	4,656	
Cross Street Truck %	75%	

* West end of grade separation is a new intersection replacing the north leg of the existing Maritime Street South intersection. North leg of the Maritime Street South intersection will serve local traffic only in the Build scenario.

Cross-street AADT figured as all NB and SB movements, plus EB & WB turning movements. 7th Street runs essentially east-west.

Opening Year: If facility is a bus, rail or intermodal facility/terminal/transfer point, # of bus arrivals for Build and No Build, % and # of bus arrivals will be diesel buses

N/A Not a transit project.

RTP Horizon Year / Design Year: If facility is a bus, rail or intermodal facility/terminal/transfer point, # of bus arrivals for Build and No Build, % and # of bus arrivals will be diesel buses

N/A Not a transit project.

Describe potential traffic redistribution effects of congestion relief *(impact on other facilities)*

By itself, the 7SGSW project should have a modest traffic redistribution effect. It replaces multiple existing intersections, but doesn't add through lanes. In combination with the 7SGSE project, it may redistribute some truck traffic from other Port access points to this one due to reduced conflicts with railroad grade crossings. AADT projections do not suggest a large change due to that effect.

Comments/Explanation/Details (please be brief)

GoPort is a package of landside transportation improvements within the Port, which are critical to the San Francisco Bay regional economy. The 7SGSW, 7SGSE, and PUR projects are identified as projects in the Oakland Army Base Master Plan. Improvements have been organized into projects with independent utility and logical termini, and can be constructed and financed on their own timelines. It is assumed that PUR and FITS shall be complete by 2022, and are thus included in the 7SGSW and 7SGSE 2022 Baseline Scenario. The opening year for all projects is assumed to be 2022 for conformity analysis purposes.

The focus of this discussion is the 7SGSW project. It is located along the eastern shore of San Francisco Bay within the Port's Seaport area, which extends from the east end of the San Francisco-Oakland Bay Bridge in the north to the urban commercial center of Jack London Square to the southeast. The 7SGSW project study area is generally bounded by Interstate (I-) 880 to the east, the Union Pacific Railport to the south, the JIT to the southwest, and the OHIT to the north. See Figures 1 and 3.

The Port is expected to experience substantial growth in import and export volumes; marine terminal import and export volumes are expected to cumulatively increase by approximately 70 percent from 2.37 million twenty-foot equivalent units (TEUs) in 2016 to 4.05 million TEUs in 2040, resulting in an increase in intermodal railyard demand and daily truck and intermodal trips, as shown in Table 1. This forecasted growth in cargo volume would place heavy demands on existing transportation infrastructure, which currently exhibits capacity constraints at Port intersections and along Port arterial roadways. 7th Street is one of three Port roadway entrances (West Grand Avenue, 7th Street, and Middle Harbor Road) that, in combination with railroad lines and bicycle and pedestrian facilities, provide goods movement and public access to and from the Port.

The 7SGSW project should not be a POAQC. While the truck volumes and % are well above EPA criteria in its PM hot spot guidance, total volumes are well below (less than 25% of) the volumes of concern to EPA. In addition, no through lanes are added; the 7SGSW project primarily reduces congestion at intersections and provides a grade separation for improving both road and rail operations and safety. Finally, the 7SGSW project provides a new track connecting the Oakland Harbor Intermodal Terminal rail yard and the Oakland Joint Intermodal Terminal, allowing more direct routing of rail traffic with less blockage of street traffic by trains at grade crossings; the intent of the new track, and the 7SGSW project as a whole, is to encourage greater use of rail movement of containers.

The 7SGSW project is not located at a hot spot identified in the SIP. The Bay Area is designated nonattainment for PM2.5, but has attained the standard.

Figure 1 – 7SGSW Project Vicinity Map

Table 1 – Existing and Projected Future Port of Oakland and Railyard Demand[3]

Demand[4]	2016	2040	Change, 2016-2040	% Change, 2016-2040
Port Demand (in millions of annual TEUs)	2.37M	4.05M	1.68M	71%
Port Demand (in daily truck trips)*	11,676	19,971	8,295	71%
Port related Railyard Demand (in annual Lifts)	312,985	900,000	587,015	188%
Non-Port related Railyard Demand (in annual Lifts)	48,919	90,933	42,014	86%
Total Railyard Demand (in annual Lifts)	361,904	990,933	629,029	174%
Port related Railyard Demand (in daily truck trips)*	2,685	7,988	5,303	197%
Non-Port related Railyard Demand (in daily truck trips)*	420	807	387	92%
Total Railyard Demand (in daily truck trips)*	3,105	8,795	5,690	183%

Includes inbound and outbound trucks

[3] 2017 Alameda CTC – 7th Street Grade Separation and Port Arterial Improvements Project – Truck and Auto Traffic Projections Methodology and Results Memorandum.

[4] While marine cargo is usually reported in TEUs, intermodal rail volume is reported in lifts. A lift measures a single container being lifted to/from a rail car. Since many marine containers are 40 feet in length, a marine container may be equivalent to 2 TEUs. Most marine containers at the Port are 40 feet in length, but a small portion is 20 feet in length. Taking this into account, the number of lifts at the rail yards can be computed by dividing the number of TEUs by 1.8, a factor obtained from the OAB EIR.

Figure 2 – Roadway Naming Convention Map

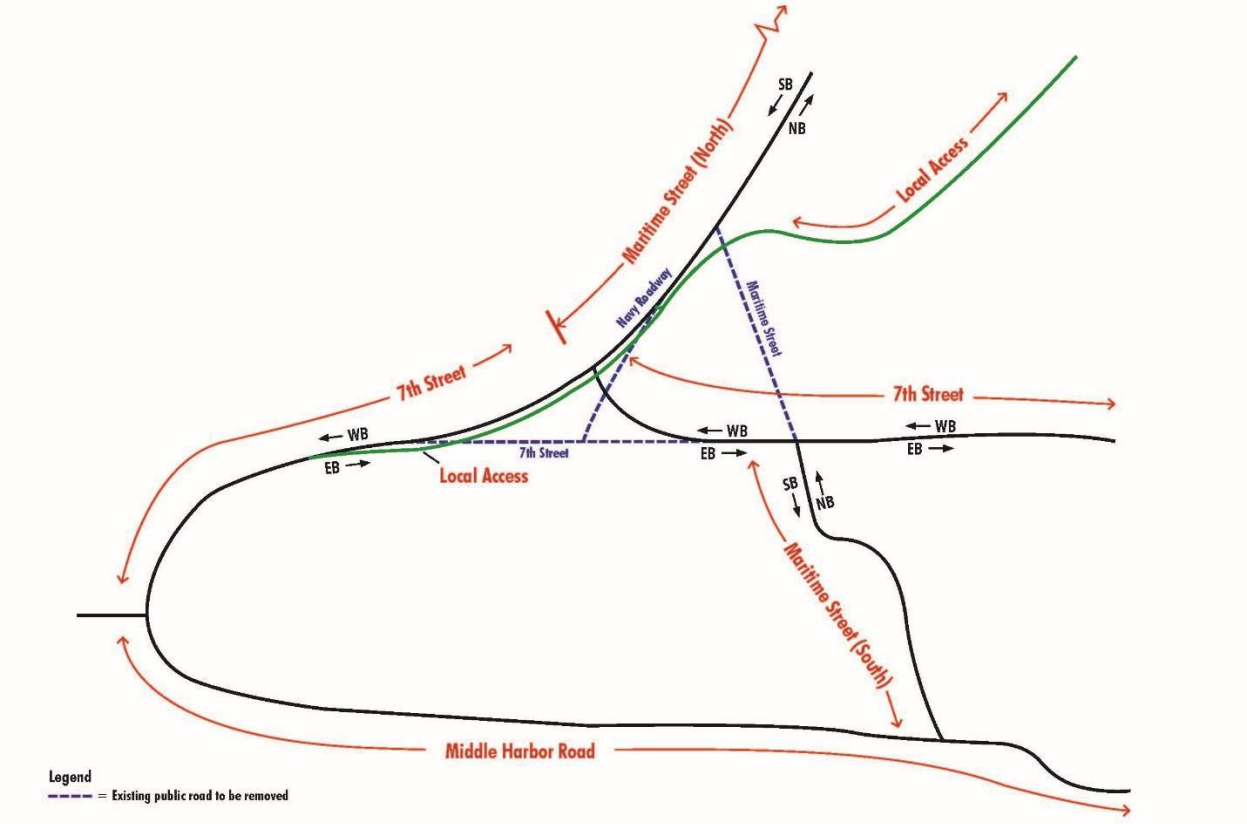
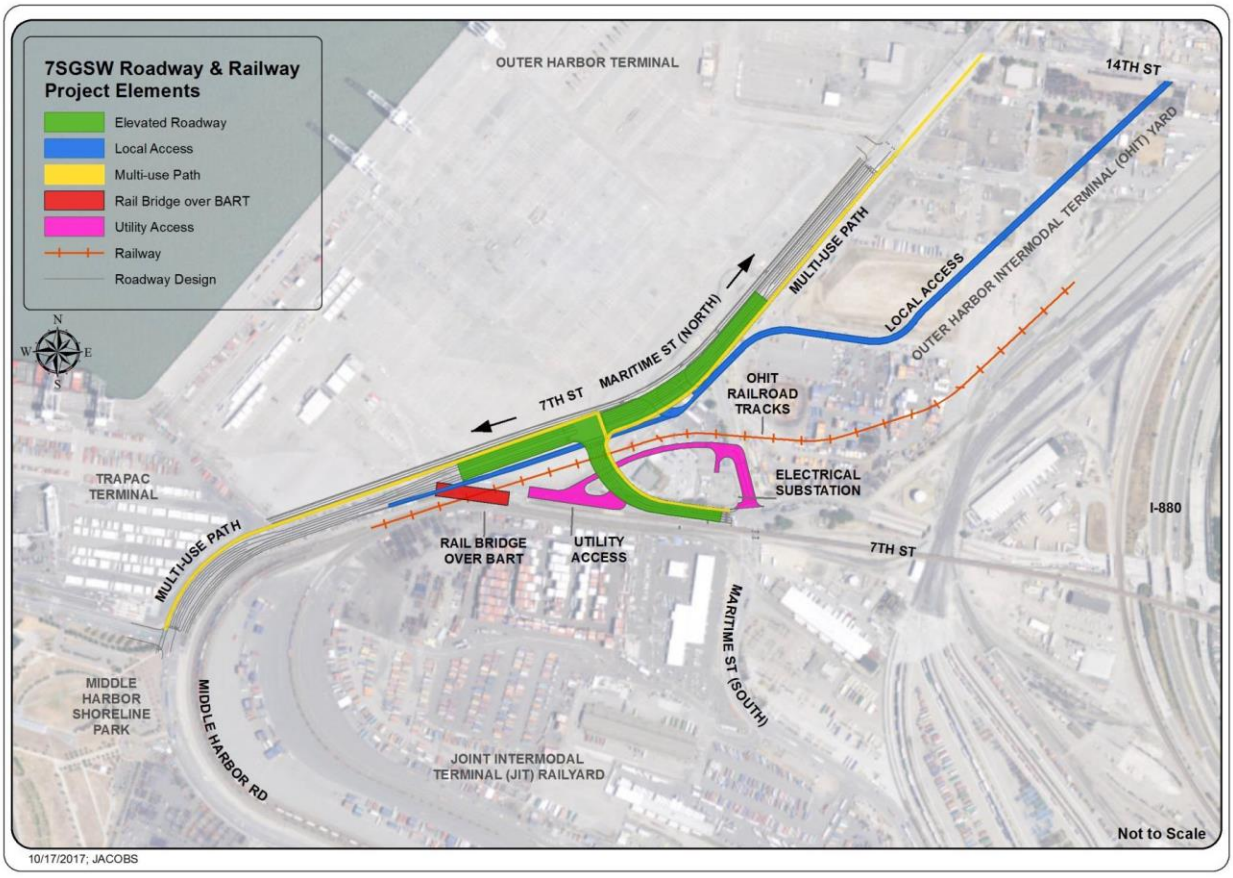


Figure 3 – 7SGSW Project Roadway and Rail Elements



ALAMEDA COUNTY TRANSPORTATION COMMISSION

7th Street Grade Separation East (7SGSE) Project

(LPPSB1L 6480 [015])

7th Street Grade Separation West (7SGSW) Project

(RPS0 6480 [016])

Alameda CTC Project #:1442000, Contract #: A17-0004

A presentation to the

MTC Air Quality Conformity Taskforce

Angelina Leong, Alameda CTC

Mike Brady, ICF

February 22, 2018

7th Street Grade Separation Projects

- The 7th Street Grade Separation and Port Arterial Improvements Project (GoPort), is a package of landside transportation improvements within the Port of Oakland (Port). This includes:
  - **7th Street Grade Separation East (7SGSE) Project**
  - **7th Street Grade Separation West (7SGSW) Project**
- Other projects included in GoPort (assumed complete by 2022) that are included in the 7SGSE and 7SGSW baseline are:
  - **Freight Intelligent Transportation System (FITS)**
  - **Port Utility Relocation (PUR) Project**
- GoPort would improve efficiency and reliability of both truck and rail access to and from the Port by routing trains from the Joint Intermodal Terminal (JIT), reduce congestion/air pollution, and support a mode shift from truck to rail, enabling smart solutions to manage operations and improve safety.

7th Street Grade Separation Project Locations

Key Project Partners

- Alameda CTC (Project sponsor)
- City of Oakland (CEQA lead agency)
- Port of Oakland (CEQA responsible agency)
- Caltrans (NEPA lead agency)

ALAMEDA County Transportation Commission

City of OAKLAND California

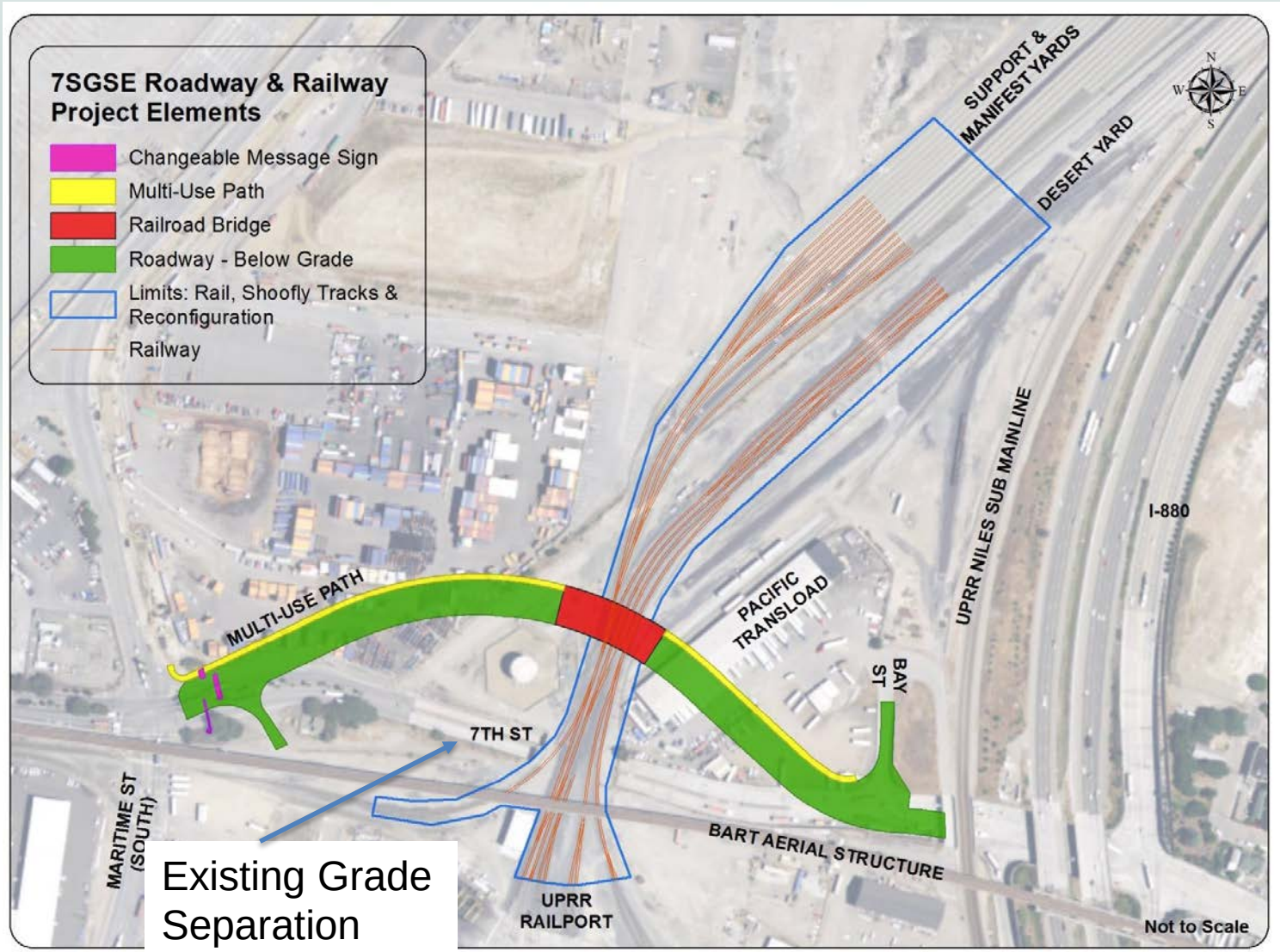
PORT OF OAKLAND

Caltrans

Purpose and Need

- Alameda CTC proposes to design and construct the 7th Street Grade Separation projects to optimize the mobility of Port users through the 7th Street corridor by providing structural upgrades to meet current roadway and railway design standards.
- Projects will have independent utility and logical termini
  - The **7SGSE Project** will reconstruct an existing, deficient grade separation with one that meets current structural, roadway, and multi-use path standards.
  - The **7SGSW Project** will improve rail access to the Joint Intermodal Terminal, reduce traffic congestion in the vicinity of 7th Street and Maritime Street with road realignments and a grade separation, and improve a multi-use path (part of the Bay Trail) to meet current standards.

7th Street Grade Separation East



7th Street Grade Separation East

(view of existing route from the pedestrian path, looking east)

(view of existing route looking west, Bay Street on the right)

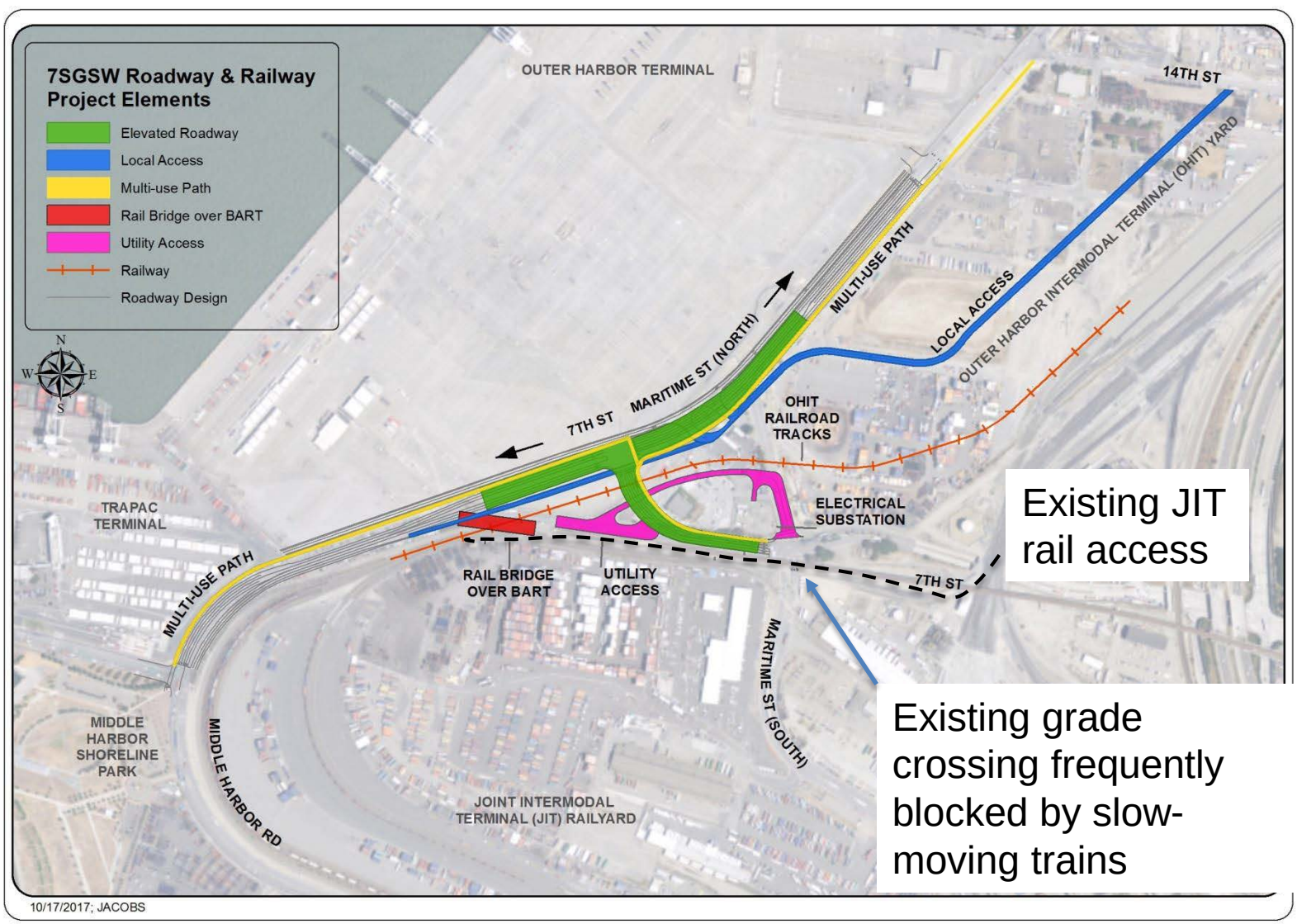
7th Street Grade Separation East Project Characteristics

- Replaces existing 4-lane grade separation under the Union Pacific Railroad (UP) railroad tracks at entrance to UP's intermodal yard
  - Existing structure is substandard structurally and has narrow lanes
- Project does not add through lanes
- Project does not modify existing channelization or signals at each end
- Includes separated multi-use path
  - Part of San Francisco Bay Trail
  - Replaces existing pedestrian path, brings up to current standards

7SGSE Project-Level Conformity Considerations

- The new 7SGSE Project replaces an existing grade separation with one that meets current standards for roadway, structure, and multi-use path
- No added lanes, matches existing road each end
- Existing left turn lane at Bay Street is realigned to match new alignment; no other intersection changes
- Old separation to be demolished or filled in after the new one opens
- Recommend that 7SGSE Project is **fully exempt** (40 CFR 93.126) as a Rail/Highway Crossing (exempt grade separation) Project

7th Street Grade Separation West



7th Street Grade Separation West

(Maritime Street at-grade rail crossing, south of 7th Street)

7th Street Grade Separation West Project Characteristics

- Adds new rail connection between JIT and Outer Harbor Intermodal railroad yards under new grade separation
- New grade separation and grade changes between existing Maritime Street (south) and realigned Maritime Street (north) connection
- New local traffic connections for properties affected by reconfiguration of local streets
- Reduces truck idling due to trains blocking grade crossing on Maritime Street just south of 7th Street

7SGSW – Changes Affecting Traffic

- No added through lanes
  - 7th Street & Maritime Street 4 lanes now; will remain 4 lanes
- Existing Maritime St. north of 7th Street removed
  - Allows construction of new rail connection
  - Becomes local access to several properties
- Navy Road removed
- 7th Street alignment modified along with bridge
- Maritime Street (north) realigned to allow standard "T" intersection with 7th Street and continue as 7th Street toward Middle Harbor Road
- Channelization & new signal at new intersection

7SGSW - Intersection LOS Summary

- Five (5) intersections in & near the 7SGSW Project were analyzed in the overall GoPort traffic study
- "Baseline" conditions used rather than No Project due to effect of other work around the Port area that will be completed before these projects
- Analysis years 2022 (Opening) and 2040 (RTP Horizon) for the five (5) intersections in/near the projects, worst of 2 peak periods (AM, mid-day, PM):
  - None at LOS A, B, or C in baseline conditions
  - Three (3) at LOS D at baseline and remain the same
  - One (1) at LOS E at baseline and improves to LOS C
  - One (1) new intersection will operate at LOS B
  - None decline to LOS D or worse from baseline

7SGSW Project – Heavy Vehicles

- All 7SGSW Project intersections have high truck %
  - All intersections are located within the Port
  - Includes both Port access and intra-Port traffic
- Some intersections exceed 10,000 truck AADT
  - Several in opening year
  - Most in horizon year
- However, total AADT at all intersections is well below 125,000 in both opening and horizon years
- No through lanes added
- The 7SGSW and 7SGSE Projects would support modal shift to bicycle, pedestrian, and freight rail modes

POAQC Criteria
40 CFR 93.123(b)(1)

- (i) New or expanded highway projects that have a significant number of or significant increase in diesel vehicles
  - Projects are not a new or expanded highway
    - No increase in the number of through lanes
  - Existing land use is industrial – the developed Port area
  - Roadway realignment (horizontal and vertical) in addition to the grade separation (40 CFR 93.127)
  - New intersection with channelization and signal (also 127)
  - Diesel (HD) vehicles over 10K AADT and very high %, but relatively low total AADT
  - Little or no change in AADT with or without the project
  - Break in Maritime Street affects i/s volumes & improves LOS

POAQC Criteria
40 CFR 93.123(b)(1)

- (ii) Projects affecting intersections that are at level of service (LOS) D, E, or F with a significant number of diesel vehicles or those that will change to LOS D, E, or F because of increased traffic volumes from a significant number of diesel vehicles related to the project
  - Heavy (assume all diesel) vehicles are 50% or more in both baseline and with project conditions, opening and horizon years
  - AADTs in baseline condition are <30,000 in horizon year
    - Highest AADT is in the No-Project condition, horizon year, at the existing Maritime/7th St. intersection
  - 7th/Maritime Street intersections are at LOS D in baseline and horizon years, with or without the projects, in at least one peak period
  - LOS does not worsen at any intersections with project
    - Stays the same or improves at all project intersections

POAQC Criteria
40 CFR 93.123(b)(1)

- (iii) New bus and rail terminals and transfer points that have a significant number of diesel vehicles congregating at a single location
- (iv) Expanded bus and rail terminals and transfer points that significantly increase the number of diesel vehicles congregating at a single location
  - Projects are not a new or expanded bus or rail terminal or transfer point

POAQC Criteria
40 CFR 93.123(b)(1)

- (v) Projects in or affecting locations, areas, or categories of sites that are identified in the PM2.5- or PM10- applicable implementation plan or implementation plan submission, as appropriate, as sites of violation or possible violation
  - The Project sites are neither in nor affects locations, areas, or categories of violation sites that are identified in a PM10 or PM2.5 implementation plan
  - Bay Area presently attains the PM10 & PM2.5 NAAQS
    - Region is designated nonattainment for PM2.5, but was found to attain in 2013 and continues to attain. Some SIP planning requirements suspended while in attainment.

Recommendations

- The 7SGSE Project should be **exempt** – Rail/Highway Crossing (exempt grade separation). Meets EPA & Caltrans criteria.
- The 7SGSW Project should **not be a project of air quality concern**
  - Does not meet all criteria in EPA Rules and Guidance for being a Project of Air Quality Concern
  - Purpose of the Projects are not to provide increased motor vehicle capacity
    - Main purpose is to allow construction of a new rail connection for JIT, improving local rail operations, and encouraging shift of freight movement to rail
    - No added through lanes
  - Improves bicycle, pedestrian, and freight rail connections

Thank You

GoPort Fact Sheet - https://www.alamedactc.org/files/managed/Document/21178/1442000_7StGradeSep_PortArterial_Improvements.pdf

40 CFR 93.126 Exempt Projects List

County	TIP ID	Sponsor	Project Name	Project Description	Expanded Description	Project Type under 40 CFR 93.126
ALA	ALA170080	AC Transit	AC Transit: Purchase (10) 24ft Cut-aways	AC Transit:(10) 24ft Cut-away vans: Purchase vehicles to replace existing fleet at end-of-life.	AC Transit:(10) 24ft Cut-away vans: Purchase vehicles to replace existing fleet at end-of-life.	Mass Transit - Purchase of new busses and rail cars to replace existing vehicles or for minor expansions of the fleet
ALA	ALA170081	AC Transit	AC Transit: Purchase (24) 60ft Artic Hybrid Buses	AC Transit: Purchase (24) 60ft Artic Hybrid Buses. Replace existing bus fleet to keep fleet in state of good repair.	AC Transit: Purchase (24) 60ft Artic Hybrid Buses. Replace existing bus fleet to keep fleet in state of good repair.	Mass Transit - Purchase of new busses and rail cars to replace existing vehicles or for minor expansions of the fleet
ALA	ALA170082	AC Transit	AC Transit: Purchase (59) 40ft Diesel Buses	AC Transit: Purchase (59) 40-ft Diesel Buses: Purchase buses to keep AC Transit's fleet in a state of good repair.	AC Transit: Purchase (59) 40-ft Diesel Buses: Purchase buses to keep AC Transit's fleet in a state of good repair.	Mass Transit - Purchase of new busses and rail cars to replace existing vehicles or for minor expansions of the fleet
MRN	MRN170024	GGBHTD	Replace 14 - 22' Gas Body-on-Chassis Vehicles	GGBHTD: 14 paratransit vehicles: Routine replacement of paratransit vehicles that have reached end of useful life	GGBHTD: 14 paratransit vehicles: Routine replacement of paratransit vehicles that have reached end of useful life	Mass Transit - Purchase of new busses and rail cars to replace existing vehicles or for minor expansions of the fleet
MRN	MRN170025	San Rafael	Southern Heights Bridge Replacement-27C0148	BRIDGE NO. 27C0148, SOUTHRN HEIGHTS BL, OVER HILLSIDE, JCT MEYER RD IN SAN RAFEL. Replace existing one-lane bridge with a new one-lane bridge	Replace the existing wood structure Southern Heights Blvd Bridge with a new concrete or steel bridge (type yet to be determined).	Safety - Widening narrow pavements or reconstructing bridges (no additional travel lanes)
SOL	SOL170011	Benicia	Benicia - Park Road Improvements	Benicia: Park Road between I-780 and Bayshore Road: Resurface roadway and construct Class II/IV bicycle lane facilities and storm drain improvements	Benicia: Park Road between I-780 and Bayshore Road: Resurface roadway and construct Class II/IV bicycle lane facilities and storm drain improvements	Safety - Shoulder improvements

METROPOLITAN
TRANSPORTATION
COMMISSION

Joseph P. Bort MetroCenter
101 Eighth Street
Oakland, CA 94607-4700
TEL 510.817.5700
TDD/TTY 510.817.5769
FAX 510.817.5848
E-MAIL info@mtc.ca.gov
WEB www.mtc.ca.gov

Memorandum

TO: Air Quality Conformity Task Force DATE: February 14, 2017

FR: Adam Crenshaw

RE: Review of the Regional Conformity Status for New and Revised Projects

Staff has prepared the following information in an effort to streamline the review of the regional air quality conformity implications of projects that staff proposes to revise or add into the 2017 TIP through current or future revisions. This item is for advisory purposes only. The inclusion of these projects and project changes in a proposed revision to the TIP is subject to Commission approval in the case of amendments and MTC's Executive Director or Deputy Executive Director in the case of administrative modifications. The final determination of the regional air quality conformity status of these projects will be made by the Federal Highway Administration, the Federal Transit Administration and the Environmental Protection Agency as part of their review of proposed final TIP amendments and by the Executive Director or Deputy Executive Director as part of their review for TIP administrative modifications.

Projects Staff is Proposing to Include or Revise in the 2017 TIP

Staff has received requests from sponsors to add six new individually listed projects and six new grouped listed projects to the 2017 TIP.

Attachment A includes a list of the remaining projects along with the regional air quality category that staff believes best describes the projects.

MTC staff is not seeking a determination on the status of these projects for project-level conformity purposes with this item.

J:\SECTION\PLANNING\AIRQUAL\TSKFORCE\2017\8-24-17\Draft\3a_Regional_AQ_Conformity_Review_Updated_082417.docx

Item 3a - Attachment A						
County	**TIP ID/FMS ID**	**Sponsor**	**Project Name**	**Project Description**	**Project Expanded Description**	**Project Type**
Proposed New Individually Listed Projects for Regional Air Quality Conformity Status Review						
CC	6861	BART	Concord BART Station Modernization	Concord: Concord BART Station: Make access, placemaking, and state-of-good repair, improvements based on BART's 2016 Station Modernization Plan	Concord: Concord BART Station: Make access, placemaking, and state-of-good repair, improvements based on BART's 2016 Station Modernization Plan, focusing on addressing state-of-good repair issues; improving station lighting; improving passenger circulation; expanding bicycle access; reducing fare evasion; and adding new architectural finishes, wayfinding, and public art to enhance customer experience, sense of safety, and placemaking.	EXEMPT (40 CFR 93.126) - Reconstruction or renovation of transit buildings and structures (e.g., rail or bus buildings, storage and maintenance facilities, stations, terminals, and ancillary structures)
SCL	6829	Sunnyvale	Sunnyvale Safe Routes to School Improvements	Sunnyvale: In the vicinity of Bishop Elementary School: Install bike lanes, high visibility crosswalks, raised crosswalks, and curb extensions; Provide bicycle and pedestrian education and encouragement programs	Sunnyvale: In the vicinity of Bishop Elementary School: Install bike lanes, high visibility crosswalks, raised crosswalks, and curb extensions; Provide bicycle and pedestrian education and encouragement programs; On Maude Ave between Pastoria Ave and Wolfe Ave: install bike lanes to improve safety. This new facility will connect surrounding neighborhoods to Bishop Elementary and other destinations like Fair Oaks Park, Sunnyvale High and the commercial corridor on Mathilda Avenue. Despite this new bikeway, barriers will remain for students traveling along Sunnyvale Avenue. Therefore project will remove slip lanes to eliminate conflicts and reduce the crossing distances, upgrade traffic signals and install ADA complaints pedestrian signals, infrared bike detection systems, green bike box, high visibility cross walks, and will also consider installing of a raised crosswalk in front of the school.	EXEMPT (40 CFR 93.126) - Projects that correct, improve, or eliminate a hazardous location or feature.
SCL	6856	Gilroy	Gilroy: Downtown Monterey Road Rehabilitation	Gilroy: Monterey Rd between 1st St and 8th St: Pavement rehabilitation, resurfacing, roadway reconstruction, and/or spot reconstruction.	Gilroy: Monterey Rd between 1st St and 8th St: Pavement rehabilitation, resurfacing, roadway reconstruction, and/or spot reconstruction. Consultant shall, consistent with the project budget, recommend feasible treatments with consideration given to mill and pave, wedge grind and overlay, slurry seal, microsurfacing, and/or pavement recycling such as cold-in-place, hot-in-place, and full depth recycling. Improvements shall also include construction of missing and/or damaged concrete curbs, gutters, and the installation of ADA compliant curb ramps where needed at intersections within the Project limits.	EXEMPT (40 CFR 93.126) - Pavement resurfacing and/or rehabilitation
SCL	6860	VTA	I-280 Soundwalls - Bird Avenue to Los Gatos Creek	In San Jose: On both sides of I-280 between Bird Ave and Los Gatos Creek Bridge: Construct new soundwalls, modifying the existing irrigation system, landscaping, and traffic control	In San Jose: On both sides of I-280 between Bird Ave and Los Gatos Creek Bridge: Construct new soundwalls, modifying the existing irrigation system, landscaping, and traffic control	EXEMPT (40 CFR 93.126) - Noise attenuation
SM	6845	CCAG	ITS Improvements in SM County Northern Cities	San Mateo County: Along the US 101 corridor from Smart Corridors Ph 1 limits to the SF County line, and on I-280 from I-380 to the San Francisco County Line: Implement ITS Improvements in San Mateo northern cities including Daly City, Brisbane, and Colma	San Mateo County: In San Mateo County Northern Cities Daly City, Brisbane, and Colma along the US 101 corridor to the SF County line, and on I-280 from I-380 to the San Francisco County Line: Continue the ITS improvement implementation efforts of City/County Association of Governments of San Mateo County (C/CAG), California Department of Transportation (Caltrans District 4) and the partner agencies that was initiated with the Phase 1 of the San Mateo County Smart Corridors	EXEMPT (40 CFR 93.126) - Traffic control devices and operating assistance other than signalization projects

Item 3a - Attachment A						
County	**TIP ID/FMS ID**	**Sponsor**	**Project Name**	**Project Description**	**Project Expanded Description**	**Project Type**
SOL	6807	Suisun City	New Railroad Avenue Pavement Rehabilitation	In Suisun City: On the eastbound lanes on New Railroad Avenue from Village Drive to Sunset Avenue, rehabilitate roadway including striping for Class 2 bikeway.	In Suisun City: On the eastbound lanes on New Railroad Avenue from Village Drive to Sunset Avenue, rehabilitate roadway, including striping for Class 2 bikeway. Work scope will include AC overlay with ancillary work including pavement grinding, full depth asphalt repairs, adjusting frames and grates, replacing pavement markings/striping, upgrading curb ramps, and replacing damaged curbs adjacent to pavement to be rehabilitated.	EXEMPT (40 CFR 93.126) - Pavement resurfacing and/or rehabilitation
Proposed New Group Listed Projects for Regional Air Quality Conformity Status Review						
Alameda	VAR170010	Caltrans	GL: SHOPP Bridge Preservation	In Oakland, I-880 at East Creek Slough Bridge No. 33-0143. Mitigate eroded channel side-slope tidal scour and replace bridge approach slabs.	In Oakland, I-880 at East Creek Slough Bridge No. 33-0143. Mitigate eroded channel side-slope tidal scour and replace bridge approach slabs.	EXEMPT (40 CFR 93.126) - Pavement resurfacing and/or rehabilitation
Marin	VAR170010	Caltrans	GL: SHOPP Bridge Preservation	In San Rafael, US-101 at Irwin Creek Bridge No. 27-0097. Rehabilitate corrugated metal arch culvert bridge and adjoining deteriorated culvert structures.	In San Rafael, US-101 at Irwin Creek Bridge No. 27-0097. Rehabilitate corrugated metal arch culvert bridge and adjoining deteriorated culvert structures.	EXEMPT (40 CFR 93.126) - Projects that correct, improve, or eliminate a hazardous location or feature.
San Mateo	VAR170010	Caltrans	GL: SHOPP Bridge Preservation	In and near Menlo Park and San Bruno, SR-280 from Alpine Road to Route 380 at Alpine Road Undercrossing No. 35-0009L/R (PM R0.05), SR-280 Sand Hill Road Overcrossing (OC) (South) No. 35-0007 (PM R1.56), SR-280 Sand Hill Road OC (North) No. 35-0008 (PM R1.62), and Route 280/380 Separation No. 35-0217L/R (PM R20.97). Structure seismic retrofit.	In and near Menlo Park and San Bruno, SR-280 from Alpine Road to Route 380 at Alpine Road Undercrossing No. 35-0009L/R (PM R0.05), SR-280 Sand Hill Road Overcrossing (OC) (South) No. 35-0007 (PM R1.56), SR-280 Sand Hill Road OC (North) No. 35-0008 (PM R1.62), and Route 280/380 Separation No. 35-0217L/R (PM R20.97). Structure seismic retrofit.	EXEMPT (40 CFR 93.126) - Projects that correct, improve, or eliminate a hazardous location or feature.
Sonoma	VAR170010	Caltrans	GL: SHOPP Bridge Preservation	Near Petaluma, US-101 at San Antonio Creek Bridges No. 20-0019R/L. Abutment scour mitigation and channel sediment cleaning to address flooding.	Near Petaluma, US-101 at San Antonio Creek Bridges No. 20-0019R/L. Abutment scour mitigation and channel sediment cleaning to address flooding.	EXEMPT (40 CFR 93.126) - Projects that correct, improve, or eliminate a hazardous location or feature.
Alameda	VAR170010	Caltrans	GL: SHOPP Bridge Preservation	In Oakland, I-580 at Foothill Boulevard Undercrossing No. 33-0334K. Bridge deck rehabilitation.	In Oakland, I-580 at Foothill Boulevard Undercrossing No. 33-0334K. Bridge deck rehabilitation.	EXEMPT (40 CFR 93.126) - Pavement resurfacing and/or rehabilitation
Alameda/ Contra Costa	VAR170007	Caltrans	GL: SHOPP Collision Reduction	In various cities, I-80 from Alameda County line to 0.6 mile west of Solano County line; also, in Alameda County in Albany, I-880 from 0.4 mile west to the Contra Costa County line (PM R7.6/8.0). Install lighting and upgrade concrete barrier.	In various cities, I-80 from Alameda County line to 0.6 mile west of Solano County line; also, in Alameda County in Albany, I-880 from 0.4 mile west to the Contra Costa County line (PM R7.6/8.0). Install lighting and upgrade concrete barrier.	EXEMPT (40 CFR 93.126) - Projects that correct, improve, or eliminate a hazardous location or feature.

Air Quality Conformity Task Force
Summary Meeting Notes
January 25, 2018

Participants:

Rodney Tavitas – Caltrans
Lucas Sanchez – Caltrans
Ginger Vagenas – EPA
Dick Fahey – Caltrans
Stew Sonnenberg – FHWA
Adam Noelting – MTC
Adam Crenshaw – MTC
Harold Brazil – MTC

1. Welcome and Self Introductions: Harold Brazil (MTC) called the meeting to order at 9:35 am.

2. $PM_{2.5}$ Project Conformity Interagency Consultations

a. Confirm Projects Are Exempt from $PM_{2.5}$ Conformity

i. Projects Exempt Under 40 CFR 93.126 – Not of Air Quality Concern

Harold Brazil (MTC) heard minor comments from the Task Force on the **2b_Exempt List 011218.pdf** list of projects. Rodney Tavitas (Caltrans) asked Ginger Vagenas (EPA) about the project-level conformity consultation needed for 43 ramp metering projects (HOV bypass lanes) Caltrans plans to install along the I-580 corridor to lessen congestion. Specifically, Mr. Tavitas wanted to know if Caltrans could use the 40 CFR 93.126 "Projects that correct, improve, or eliminate a hazardous location or feature," exemption. Ms. Vagenas asked for a description of the Caltrans ramp metering projects (in writing) and she would develop an EPA response designating these projects as exempt.

> ***Final Determination:*** With input from FTA, EPA, Caltrans and FHWA, the Task Force agreed the projects on the exempt list **(2b_Exempt List 011218.pdf)** were exempt from $PM_{2.5}$ project level analysis.

3. Approach to the Conformity Analysis for the Amended Plan Bay Area 2040 and the Amended 2017 Transportation Improvement Program

Harold Brazil (MTC) notified the Task Force that MTC staff is preparing an amendment to its Regional Transportation Plan (called Plan Bay Area 2040) and, therefore, is also conducting a conformity analysis on the Amended Plan Bay Area 2040 and the Amended 2017 Transportation Improvement Program (TIP). MTC staff is seeking the Task Force's review of the proposed approach to conform the Amended Plan Bay Area 2040 and the Amended 2017 TIP in accordance with federal conformity regulations.

Adam Noelting (MTC) explained the reasons why the U.S. Highway 101 Managed Lanes Project (in San Mateo County) needed to be amended in Plan Bay Area 2040 – the reasons being:

- When Plan Bay Area 2040 was completed in the summer of 2017, the project sponsors did not have a preferred alternative identified. When the project sponsors determined the preferred alternative for this project, the lane configuration of the

project needed to be revised in MTC travel demand model network coding and (consequentially) a new conformity analysis needed to be conducted.

- The preferred alternative also included an updated project cost which needed to be amended in both the 2017 TIP and Plan Bay Area 2040.

Mr. Noelting went onto say that MTC intends to bring this amendment to the 2017 TIP and Plan Bay Area 2040 to the March 2018 MTC Planning Committee and Commission, as well as the ABAG Executive Board for their final approval. MTC released the Draft Conformity Analysis for the Amended Plan Bay Area 2040 and the Amended 2017 TIP on February 6, 2018.

Ginger Vagenas (EPA) and Rodney Tavitas (Caltrans) began a discussion as to what the effective end date of the second 10-year maintenance period for carbon monoxide (CO) for the region's nonattainment area. After the meeting (via email), Ms. Vagenas followed up on this discussion by indicating that in original maintenance plan approval back in 1998, EPA incorrectly listed April 30, 1998 in the CFR as the effective date of the redesignation. Ms. Vagenas went on to say that EPA corrected this mistake when they approved the second 10-year maintenance plan – consequently, CO conformity is required until June 1st, 2018.

For more info, please see:
https://www.gpo.gov/fdsys/pkg/FR-2005-11-30/pdf/05-23502.pdf#page=1

4. MTC/SACOG Air Quality Planning/Conformity MOU – (Update)

Harold Brazil (MTC) updated the Task Force on the status of the MTC/SACOG Memorandum of Understanding (MOU) and indicated that a discussion between EPA, SACOG and MTC occurred earlier in the month and the next steps in the process which would include a revision to MTC's existing consultation procedures included in its conformity SIP. Once the update to the MOU is approved at the regional levels (for both the MTC and SACOG regions), Ginger Vagenas (EPA) indicated that EPA would do work to minimize the potential time gap between when the revised MOU is approved at the regional levels and when the revision to MTC's conformity SIP's consultation procedures are approved at the federal level.

5. Consent Calendar

a. December 7, 2017 Air Quality Conformity Task Force Meeting Summary

With input from all members, the Task Force concluded that the consent calendar was approved.

6. Other Items