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## Memorandum

TO: Planning Committee

DATE: July 5, 2013

FR: Executive Director

W. I. 1412

RE: Final Transportation Air Quality Conformity Analysis for Plan Bay Area and 2013 Transportation Improvement Program, MTC Resolution No. 4076

MTC has prepared the *Final Transportation Air Quality Conformity Analysis for Plan Bay Area and 2013 Transportation Improvement Program (2013 TIP)* in accordance with the latest U.S. Environmental Protection Agency (US EPA) transportation conformity regulations and the Bay Area Air Quality Conformity Protocol (MTC Resolution No. 3757). The conformity analysis addresses only those projects identified in the financially constrained Plan Bay Area (Plan) and 2013 TIP.

The *Draft Transportation Air Quality Conformity Analysis* was released for public review and comment on March 29, 2013. MTC held nine public hearings throughout the Bay Area and the comment period closed on May 3, 2013. MTC staff, in consultation with the multiagency Air Quality Conformity Task Force, has responded to public comments received and made technical revisions to the report where appropriate. It should be noted that the approach, methodology, draft conformity analysis and findings have been prepared in consultation with the Air Quality Conformity Task Force as stipulated in MTC Resolution No. 3757. These task force meetings, which were open to the public, took place on January 24, 2013, March 28, 2013, April 25, 2013 and June 27, 2013.

This conformity analysis demonstrates that both the Plan and 2013 TIP are consistent with (“conform to”) the federal air quality plan, which is referred to as the State Implementation Plan (SIP), meaning that the transportation activities will not cause new air quality violations, worsen existing violations, or delay timely attainment of the federal air quality standards. Based on the proposed final conformity analysis, MTC staff recommends the following positive conformity findings:

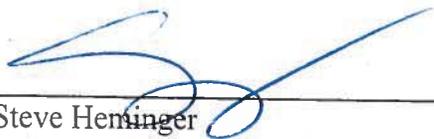
1. This conformity assessment was conducted consistent with US EPA’s transportation conformity regulations and with the Bay Area Air Quality Conformity Protocol adopted by MTC as Resolution No. 3757.
2. The Plan and 2013 TIP provide for the implementation of transportation control measures (TCMs) pursuant to the applicable federal regulations.
3. For the national carbon monoxide standard, motor vehicle emissions in the Plan and TIP are lower than the transportation conformity budget in the SIP.
4. For the national 8-hour ozone standard, motor vehicle emissions in the Plan and 2013 TIP are lower than the transportation conformity budget in the SIP.

5. For the national PM<sub>2.5</sub> standard, motor vehicle emissions in the Plan and TIP conform to the interim emissions test for the national fine particulate matter standard.

See Agenda item 3c for more information regarding Plan Bay Area and Agenda item 3d for more information regarding MTC's 2013 Transportation Improvement Program (TIP).

**Recommendation**

MTC staff recommends that this Committee approve and refer MTC Resolution No. 4076 to the Commission for final action, to find that the Plan Bay Area and 2013 Transportation Improvement Program are in conformance with the federal air quality plan for the national 8-hour ozone standard, national carbon monoxide standard and national PM<sub>2.5</sub> standard, and provide for the timely implementation of TCMs.



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Steve Heninger

Attachment A: Final Transportation Air Quality Conformity Analysis for Plan Bay Area and 2013 Transportation Improvement Program (TIP); Appendices are available at: [http://www.mtc.ca.gov/planning/air\\_quality/](http://www.mtc.ca.gov/planning/air_quality/).

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**TRANSPORTATION-AIR QUALITY CONFORMITY ANALYSIS  
FOR PLAN BAY AREA &  
2013 TRANSPORTATION IMPROVEMENT PROGRAM**

**Final: July 18, 2013**

**Final: \_\_**



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## **I. INTRODUCTION**

The Metropolitan Transportation Commission (MTC) prepares a transportation air quality conformity analysis when MTC amends or updates its long-range regional transportation plan (RTP), or adds or deletes regionally significant, non-exempt projects into the Transportation Improvement Program (TIP).

The purpose of this conformity analysis is to conform Plan Bay Area and the 2013 TIP in accordance with the latest U.S. Environmental Protection Agency (EPA) transportation conformity regulations and the Bay Area Conformity State Implementation Plan (Conformity SIP), which is also known as the Bay Area Air Quality Conformity Protocol (MTC Resolution No. 3757). This conformity analysis addresses the national 8-hour ozone standard, national carbon monoxide standard, and the national 24-hour fine particulate matter (PM<sub>2.5</sub>) standard.

This report explains the basis for the conformity analysis and provides the results used by MTC to make a positive conformity finding on Plan Bay Area and the 2013 TIP.

### **Purpose of Conformity Analysis**

The Federal Clean Air Act, as amended in 1990 (CAAA) outlines requirements for ensuring that federal transportation plans, programs and projects are consistent with (“conform to”) the purpose of the State Implementation Plan (SIP). Conformity to the purpose of the SIP means that transportation activities will not cause new air quality violations, worsen existing violations, or delay timely attainment of the relevant national ambient air quality standards. A conformity finding demonstrates that the total emissions projected for a RTP or TIP are within the emissions limits (“budgets”) established by the SIP, and that transportation control measures (TCMs) are implemented in a timely fashion.

Conformity requirements apply in all nonattainment and maintenance areas for transportation-related criteria pollutants and related precursor emissions. For the Bay Area, the criteria pollutants to be addressed are ground-level ozone, carbon monoxide, and PM<sub>2.5</sub>; and the precursor pollutants to be addressed include volatile organic compounds (VOC) and oxides of nitrogen (NO<sub>x</sub>) for ozone and NO<sub>x</sub> for PM<sub>2.5</sub>. EPA’s most recent revisions to its transportation conformity regulations to implement the 1990 Federal Clean Air Act section 175A were published in the Federal Register on March 14, 2012<sup>1</sup>.

Metropolitan Planning Organizations such as MTC are required to follow these regulations, and any other procedures and criteria contained in the EPA-approved Conformity SIP (Transportation Air Quality Conformity Protocol) for the Bay Area. In the Bay Area,

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<sup>1</sup> The current version of the regulations is available on EPA’s Transportation Conformity website at <http://www.epa.gov/otaq/stateresources/transconf/regs/420b12013.pdf>.

procedures were first adopted in September 1994 to comply with the 1990 CAAA. Four subsequent amendments to the transportation conformity procedures in August 1995, November 1995, August 1997, and July 2006 have been adopted by the three co-lead agencies (MTC, Association of Bay Area Governments (ABAG), and Bay Area Air Quality Management District (BAAQMD)). MTC Resolution 3757 represents the latest San Francisco Bay Area Transportation Air Quality Conformity Protocol adopted by the three agencies in July 2006. Acting on behalf of the three agencies, the BAAQMD submitted this latest Protocol to California Air Resources Board (CARB) as a revision to the Bay Area Conformity SIP. CARB approved this proposed revision to the Bay Area's Conformity SIP in December 2006, and transmitted it to EPA for final action. EPA approved the Bay Area Conformity SIP in December 2007 (40 CFR Part 52).

These regulations and resolutions state in part that, MTC cannot approve any transportation plan, program or project unless these activities conform to the purpose of the federal air quality plan (officially titled the State Implementation Plan, or SIP). "Transportation plan" refers to the RTP. "Program" refers to the TIP, which is a financially realistic set of highway and transit projects to be funded over the next six years. A "transportation project" is any highway or transit improvement, which is included in the RTP and TIP and requires funding or approval from the Federal Highway Administration (FHWA) or the Federal Transit Administration (FTA). Conformity regulations also affect regionally significant non-federally funded projects which must be included in a conforming transportation plan and program.

### **Status of Regional Transportation Plan**

A Regional Transportation Plan, or RTP, is a long-range plan which includes both long-range and short-range strategies/actions that lead to the development of an integrated multimodal transportation system to facilitate the safe and efficient movement of people and goods in addressing current and future transportation demand. By federal law, the RTP covers a minimum planning horizon of 20 years and is updated every four years in areas which do not meet federal air quality standards. The RTP is financially constrained to the projected transportation revenues that will be reasonably available to the region over the planning period. Once adopted, the RTP guides the development of the TIP for the region.

The latest updated RTP is called Plan Bay Area. Plan Bay Area represents a strategic investment plan to improve asset condition and system performance for Bay Area travelers over the next 28 years. It includes a set of highway, transit, local roadway, bicycle, and pedestrian projects identified through regional and local transportation planning processes. As required by federal and state planning regulations, the long-range plan is financially constrained, identifying investments that are funded within the \$289 billion 28-year revenue estimate.

The Commission adopted the Transportation 2035 Plan in April 2009 (MTC Resolution 3893). The FHWA and FTA approved MTC's conformity determination for the Transportation 2035 Plan and 2009 Transportation Improvement Program/Amendment #09-

06 on May 29, 2009. The Transportation 2035 Plan was subsequently amended on May 25, 2010 via an administrative modification. This administrative modification did not trigger a new conformity determination because there are no changes to project scopes for projects previously identified in the plan and no additions of regionally significant, non-exempt projects to the plan.

This conformity analysis serves to conform Plan Bay Area. Refer to **Appendix A** for detailed project listing of projects/programs included in the proposed Plan Bay Area. See MTC’s Draft Plan Bay Area for full details about the plan<sup>2</sup>.

## **Status of Transportation Improvement Program**

The federally required Transportation Improvement Program, or TIP, is a comprehensive listing of Bay Area surface transportation projects that receive federal funds or are subject to a federally required action, or are considered regionally significant for air quality conformity purposes. MTC and the other Metropolitan Planning Organizations (MPOs) in California have historically followed a Caltrans directed update schedule (that is consistent statewide) to update the TIP every two years. The TIP must cover at least a four-year period and contain a priority list of projects grouped by year. The TIP is also financially constrained – meaning that the amount of funding programmed does not exceed the amount of funding reasonably expected to be available. Adoption of the TIP must be accompanied by an air quality conformity analysis and finding, and all projects included in the TIP must be derived from and/or be consistent with the RTP. Whenever a new RTP is adopted, a new air quality conformity analysis must be prepared for the TIP, to ensure consistency between the current Plan (RTP) and Program (TIP).

The Draft 2013 TIP includes projects “programmed” in six fiscal years: FY 2012-13, FY 2013-14, FY 2014-15, FY 2015-16, FY 2016-17 and FY 2017-18. This conformity analysis serves to conform the draft 2013 TIP and Plan Bay Area.

Refer to **Appendix B** for detailed project listing of projects/programs in the 2013 TIP. Note that specific funding sources are identified in the TIP itself. See MTC’s draft 2013 TIP for full details about the TIP.

## **II. BAY AREA AIR POLLUTANT DESIGNATIONS**

### **National 1-Hour Ozone Standard**

On November 6, 1991, the U.S. Environmental Protection Agency (EPA) designated the Bay Area as a moderate ozone non-attainment area. Based on “clean” air monitoring data from 1990 to 1993, the co-lead agencies—BAAQMD, MTC, and ABAG— determined that no

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<sup>2</sup> See MTC’s *Draft Plan Bay Area* at: <http://onebayarea.org/>

ozone violations had occurred and requested the California Air Resources Board (ARB) to forward a redesignation request and an ozone maintenance plan to U.S. EPA.

On May 25, 1995, the Bay Area was classified as an ozone maintenance area, having attained the 1-hour national ozone standard for five years (1990-1994). However, on July 10, 1998 the U.S. EPA published a Notice of Final Rulemaking redesignating the Bay Area back to an ozone non-attainment (unclassified) area. This action was due to violations of the 1-hour standard that occurred during the summers of 1995 and 1996, and became final on August 10, 1998.

On October 31, 2003, U.S. EPA proposed a finding of attainment of the national 1-hour ozone standard for the Bay Area. The proposed finding was based on air quality monitoring data from the 2001, 2002, and 2003 ozone seasons. In April 2004, U.S. EPA made a final finding that the Bay Area had attained the national 1-hour ozone standard. Because of this finding, some of the elements of the 2001 Ozone Attainment Plan, submitted to EPA to demonstrate attainment of the 1-hour standard, were suspended. The finding of attainment did not mean the Bay Area had been reclassified as an attainment area for the 1-hour standard. To be reclassified, the region would have had to submit a formal redesignation request to EPA, along with a maintenance plan showing how the region would continue to attain the standard for ten years. However, this redesignation request was no longer necessary upon the establishment of the new national 8-hour ozone standard.

### **National 8-Hour Ozone Standard**

On April 15, 2004, EPA issued the first phase of the final implementation rule designating and classifying areas not meeting the federal 8-hour ozone standard. This phase of the implementation rule explained how EPA was classifying areas not meeting the national air quality standard for 8-hour ozone. It also established a process for transitioning from implementing the 1-hour standard for ozone to implementing the more protective 8-hour ozone standard. The rule also established attainment dates for the 8-hour standard and the timing of emissions reductions needed for attainment. The 8-hour designations and classifications took effect on June 15, 2004; and one year following this effective date, EPA revoked the 1-hour standard.

In July 1997, U.S. EPA revised the ozone standard, setting it to 0.08 parts per million in concentration-based form, specifically the 3-year average of the annual 4<sup>th</sup> highest daily maximum 8-hour ozone concentrations. In April 2004, EPA issued final designations for attainment and non-attainment areas. The Bay Area monitoring stations recorded concentrations that exceeded the national 8-hour ozone standard for 2001, 2002 and 2003. In June 2004, EPA formally designated the Bay Area as a non-attainment area for national 8-hour ozone, and classified the region as “marginal” based on five classes of non-attainment areas for ozone, ranging from marginal to extreme. Marginal, non-attainment areas must attain the national 8-hour ozone standard by June 15, 2007.

On July 1, 2004, EPA published a final rule amending the transportation conformity rule to address the new national 8-hour ozone standard. The amended rule stated that Plans and TIPs in nonattainment areas must be found to conform against the new standard by one year after the effective date of designation – by June 15, 2005 for 8-hour ozone areas. Conformity for the 1-hour ozone standard will no longer apply in existing 1-hour ozone nonattainment and maintenance areas once the 1-hour ozone standard is revoked; this occurred on June 15, 2005. Furthermore, prior to 8-hour budgets being established, all areas with adequate or approved 1-hour motor vehicle emission budgets must use them to demonstrate conformity with the 8-hour ozone standard, unless it is determined through interagency consultation that using the interim emissions tests is more appropriate. The conformity finding in this report is based on the approved 1-hour motor vehicle emissions budget.

In March 2008, EPA lowered the national 8-hour ozone standard from 0.80 parts per million to 0.75 parts per million. On March 12, 2009, ARB submitted its recommendations for area designations for the revised national 8-hour ozone standard. These recommendations were based on ozone air quality data collected during 2006 through 2008. The ARB recommended that the Bay Area be designated as nonattainment for the national 8-hour ozone standard. EPA had one year to review the recommendations and were to notify states by November 12, 2009 if they planned to modify the state-recommended areas. EPA issued final designations by March 12, 2010 based on more up to date monitoring data.

On January 6, 2010, the EPA extended the deadline for designating areas for the March 2008 national ambient air quality standards (NAAQS) for ground-level ozone. This was in light of EPA's decision to reconsider the ground-level ozone standards set in 2008 because the Clean Air Scientific Advisory Committee, EPA's panel of science advisors, found the ozone standards not as protective to the health and welfare of the public as recommended. Based on the scientific studies, EPA proposed to set different primary and secondary 8-hour ozone standards to protect public health.

EPA's final rule designating nonattainment areas for the 2008 ozone NAAQS was published in the Federal Register on May 21, 2012 and was effective July 20, 2012. This rule established initial air quality designations and classifications for the 2008 ozone NAAQS for most areas in the United States, including areas of Indian country.

Concurrent with this designation rule, EPA released an additional final rule that established the approach for classifying nonattainment areas, set attainment deadlines, granted reclassification for selected nonattainment areas in California, and revoked the 1997 ozone standard for transportation conformity purposes. The grace period for showing conformity to the 2008 O<sub>3</sub> standard was started by the May 21, 2012 (77 FR 30088) publication of designations for this standard. The grace period for completing these conformity analysis ends on July 20, 2013 and MTC will need to continue to include conformity to the 1997 ozone standard until the grace period is finished.

### **National PM<sub>2.5</sub> Standard**

In 1987, The EPA established a standard for particle pollution equal to or smaller than 10 micrometers in diameter. A decade later, the 1997 revision to the standard set the stage for change, when a separate standard was set for fine particulate matter, which are 2.5 micrometers in diameter and smaller. Citing the link between serious health problems and premature death in people with heart or lung disease, the 1997 revision ultimately distinguished and set forth regulation on particle pollutants known as particulate matter 2.5 (PM<sub>2.5</sub>) and particulate matter 10 (PM<sub>10</sub>).

In 2006 the EPA revised the air quality standards for particle pollution. Regulations for PM<sub>2.5</sub> were tightened for the 24-hour fine particle standard, which lowered the level from 65 micrograms per cubic meter ( $\mu\text{g}/\text{m}^3$ ) to 35  $\mu\text{g}/\text{m}^3$ . The annual fine particle standard at 15  $\mu\text{g}/\text{m}^3$  remained the same. In that same year, the EPA published a final ruling which established transportation conformity criteria and procedures to determine transportation projects that required analysis for local air quality impacts for PM<sub>2.5</sub> in non-attainment and maintenance areas. From the 2006 revision, EPA had to complete designations of nonattainment areas by December 2009 for national standard for PM<sub>2.5</sub>. The newly established criteria and procedures require those area designated as nonattainment areas must undergo a regional conformity analysis for PM<sub>2.5</sub>. Furthermore, the procedures also mandates areas designated as nonattainment must complete an additional project-level PM<sub>2.5</sub> hot-spot analysis of localized impacts for transportation projects of air quality concern.

On December 14, 2009, EPA designated the Bay Area as nonattainment for the national 24-hour PM<sub>2.5</sub> standard based upon violations of the standard over the three-year period from 2007 through 2009. Pursuant to the Clean Air Act, the Bay Area and MTC were subject to the requirement (beginning on December 14, 2010) to demonstrate that the RTP and TIP conformed to the SIP. In addition, beginning on December 14, 2010, certain roadway and transit projects that involve significant levels of diesel vehicle traffic needed to prepare PM<sub>2.5</sub> hot-spot analyses.

### **National 8-Hour Carbon Monoxide Standard**

In April 1998, the Bay Area was redesignated to a “maintenance area” for the national 8-hour carbon monoxide (CO) standard, having demonstrated attainment of the standards. As a maintenance area, the region must assure continued attainment of the CO standard.

## **Approved Motor Vehicle Emissions Budgets and Conformity Tests**

The Bay Area has conformity requirements for national ozone, CO, and PM<sub>2.5</sub> standards. Under the ozone and CO standard, the Bay Area has to meet a motor vehicle emission “budget” test. Because the Bay Area does not have motor vehicle emission budgets for PM<sub>2.5</sub> that have been determined to be adequate by EPA, it has to meet a motor vehicle emission interim test for the PM<sub>2.5</sub> standard. To make a positive conformity finding for ozone and CO, MTC must demonstrate that the calculated motor vehicle emissions in the region are lower than the approved budgets. To make a positive “interim” conformity finding for PM<sub>2.5</sub>, MTC must meet “build not greater than no build” or “build not greater than baseline year” tests based on PM<sub>2.5</sub> exhaust, tire wear, and brake wear, and NO<sub>x</sub> as a PM<sub>2.5</sub> precursor, emissions.

Motor vehicle emissions budgets for Volatile Organic Compounds (VOC) and Nitrogen Oxides (NO<sub>x</sub>), which are ozone precursors, were developed for the 2006 attainment year as part of the 2001 1-hour Ozone Attainment Plan. The VOC and NO<sub>x</sub> budgets were found to be adequate by EPA on February 14, 2002 (67 FR 8017) and were subsequently approved by EPA on April 22, 2004 (69 FR 21717). The ozone budgets were approved by the Federal Register on March 27, 2008. Note that under EPA’s conformity rule for the national 8-hour ozone standard, the existing 1-hour motor vehicle emission budgets are to be used for conformity analyses until they are replaced.

For CO, the applicable motor vehicle emissions budget was developed for the 2004 Revisions to the California State Implementation Plan for Carbon Monoxide (herein referred to as the 2004 Carbon Monoxide Maintenance Plan).

The motor vehicle emission budgets are listed below:

VOC:	164 tons per day (2006 and beyond)
NO <sub>x</sub> :	270.3 tons per day (2006 and beyond)
CO:	1,850 tons per day (2003 and 2018 and beyond)

For PM<sub>2.5</sub>, initially the Bay Area was required to prepare a SIP by December 2012 to show how the region would attain the standard by December 2014. In addition, although the Bay Area was designated as non-attainment for the national 24-hour PM<sub>2.5</sub> standard based on monitoring data for the 2006-2008 period, the region exceeded the standard by only a slight margin. Since then, Bay Area PM<sub>2.5</sub> levels have continued to decline. Air quality data from the regional monitoring network shows that the Bay Area met the national 24-hour PM<sub>2.5</sub> standard during the three-year period from 2008 through 2010, as well as the three-year period from 2009 through 2011.

Under US EPA guidelines, a region with monitoring data showing that it currently attains an air quality standard can submit a “redesignation request” and a “maintenance plan” in lieu of a SIP attainment plan. However, the BAAQMD believes that it would be premature to submit a PM<sub>2.5</sub> redesignation request for the Bay Area at this time. Instead, the BAAQMD has

pursued another option provided by US EPA guidelines for areas with monitoring data showing that they currently meet the PM<sub>2.5</sub> standard. In December 2011, the Air Resources Board submitted a “clean data finding” request on behalf of the Bay Area. On January 9, 2013, EPA took final action and determined that the Bay Area attained the 2006 24-hour PM<sub>2.5</sub> standard. EPA’s determination was based on complete, quality-assured, and certified ambient air monitoring data showing that the area monitored attainment based on the 2009-2011 monitoring period<sup>3</sup>. Based on EPA’s determination, the requirements for the Bay Area to submit an attainment demonstration, together with reasonably available control measures (RACM), a reasonable further progress (RFP) plan, and contingency measures for failure to meet RFP and attainment deadlines are suspended for so long as the region continues to attain the 2006 24-hour PM<sub>2.5</sub> standard.

Since an approved motor vehicle emissions budget for PM<sub>2.5</sub> is not available for use in this conformity analysis, MTC must complete one of the two interim emissions tests:

- the build-no-greater-than-no-build test (“build/no-build test”) found at 40 CFR 93.119(e)(1), or
- the no-greater-than-baseline year emissions test (“baseline year test”), described at 40 CFR 93.119(e)(2).

Per the interagency consultation via the Air Quality Conformity Task Force meeting dated March 28, 2013, MTC elects to use the baseline year test. In this test, conformity would be demonstrated if in each analysis year, the transportation emissions reflected the RTP or TIP (the “build” scenario) are less than or equal to emissions from the transportation system in the “baseline year” on-road source emission inventory.

Under a determination of conformity, the following criteria are applied:

1. The latest planning assumptions and emission models are used.
2. The transportation plan and program pass an emissions budget test using a budget that has been found adequate by EPA or an interim emissions test when budgets have not been established.
3. The transportation plan and program provide for the timely implementation of transportation control measures (TCMs).
4. Interagency and public consultation is part of the process.

### **III. CONFORMITY ANALYSIS & RESULTS**

#### **Approach to Conformity Analysis**

MTC has used the latest planning assumptions for the purpose of preparing this conformity analysis. Regional on-road motor vehicle emissions for future years are estimated using MTC’s travel demand forecast model *Travel Model One* (version 0.3), released in spring

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<sup>3</sup> See <http://www.gpo.gov/fdsys/pkg/FR-2013-01-09/pdf/2013-00170.pdf>

2012, calibrated to a 2000 base year, and validated against both year 2000 and year 2005 observed conditions with the most up to date highway and transit networks. In conjunction with *Travel Model One*, MTC will also use the ARB’s latest model for determining motor vehicle emissions (EMFAC2011-SG).

The MTC travel demand model requires various inputs – demographic assumptions, pricing assumptions, travel behavior assumptions and highway and transit network assumptions. This conformity analysis uses the latest socio-economic/land use forecast data from the Association of Bay Area Government’s (ABAG’s) *Jobs/Housing Connection*<sup>4</sup> and the latest validated version of *Travel Model One*.

A separate process was employed to develop socio-economic/land use data for the PM<sub>2.5</sub> “baseline year” of 2008 and PM<sub>2.5</sub> attainment year of 2014. The standard Transportation Analysis Zone (TAZ)-level data set provided to MTC by ABAG includes forecasted data in 5-year increments. The calculation of data for the interim years 2008 and 2014 in the proposed Plan Bay Area requires a multi-stop process. First, regional control totals for each attribute for each of the years 2008 and 2014 are calculated using a straight line extrapolation between the two adjacent 5-year increments. Next each TAZ's share of the regional total is calculated by extrapolation of the two adjacent 5-year increments. Finally, individual TAZ totals are calculated by multiplying the interim year TAZ share of the regional total by the regional control total.

In addition, pricing assumptions applied in the travel demand model include projected parking prices, gasoline and non-gasoline auto operating costs, fuel economy, bridge tolls, transit fares, and express lanes. Travel behavior assumptions include trip peaking factors, vehicle occupancy factors, and estimates of interregional commuters. Highway and transit networks were updated for each analysis year to reflect investments in the proposed Plan Bay Area (see Appendix A) and 2013 TIP (see Appendix B).

Regional VMT and engine starts (which are needed for emission calculations) are forecasted using a combination of output from MTC’s travel demand forecasting model and base year (2000) VMT information provided by the ARB. For conformity purposes, MTC agreed to follow ARB’s protocol for estimating VMT.

Refer to **Appendix C** for detailed travel modeling assumptions used in this conformity analysis.

### **Analysis Years**

The analysis years for the budget and baseline year tests are to be a year within five years from the date the analysis is done, the last year of the RTP and intermediate years as necessary so that analysis years are not more than 10 years apart. For this conformity analysis,

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<sup>4</sup> <http://onebayarea.org/related-materials/Document-Archive.html>

the analysis years are 2015, 2020, 2030 and 2035 for the 1997 and 2008 ozone and PM<sub>2.5</sub> standards. The attainment year for the 1997 ozone standard is the year 2007 and the attainment year for the 2008 ozone standard is 2015. The attainment year for the 2006 PM<sub>2.5</sub> standard is 2014. For CO, the analysis years are 2015, 2018, 2020, 2030 and 2040. Travel forecast data for year 2018 were interpolated between 2015 and 2020. MTC has prepared separate travel forecasts for the Bay Area for each of these years. These travel forecasts are then applied to calculate motor vehicle emissions.

## **Consultation Process**

MTC has consulted on the preparation of this conformity analysis and other conformity related issues with the Bay Area's Air Quality Conformity Task Force. The Conformity Task Force is composed of representatives of U.S. EPA, ARB, FHWA, FTA, Caltrans, MTC, BAAQMD, ABAG, the nine county Congestion Management Agencies, and Bay Area transit operators. The Conformity Task Force reviews the assumptions going into the analysis, consults on TCM implementation issues, and reviews the results of the conformity analysis. The task force meetings are open to the public. Topics covered in past meetings of the Air Quality Conformity Task Force include the following:

### **December 2012**

- PM<sub>2.5</sub> Project Conformity Interagency Consultations
- Transportation Air Quality Conformity Redetermination

### **January 2013**

- PM<sub>2.5</sub> Project Conformity Interagency Consultations
- Transportation Air Quality Conformity Analysis for Transportation 2035 and 2011 TIP (Redetermination)
- Plan Bay Area Modeling Tools (with presentations)

### **February 2013**

- PM<sub>2.5</sub> Project Conformity Interagency Consultations

### **March 2013**

- Draft Transportation Air Quality Conformity Analysis for Plan Bay Area/2013 TIP

### **April 2013**

- PM<sub>2.5</sub> Project Conformity Interagency Consultations
- Draft Transportation Air Quality Conformity Analysis for Plan Bay Area/2013 TIP

### **May 2013**

- PM<sub>2.5</sub> Project Conformity Interagency Consultations

## Comparison of Motor Vehicle Emissions to Budgets

As explained earlier, motor vehicle emissions budgets are established in the SIP for VOCs, NO<sub>x</sub> and carbon monoxide (CO). To make a positive conformity finding, the regional motor vehicle emissions must be equal to or less than these budgets. The results of the vehicle activity forecasts and motor vehicle emission calculations are shown below for each separate analysis year.

### Ozone Motor Vehicle Emission Budgets

For VOC and NO<sub>x</sub>, the motor vehicle emission budget also reflects anticipated emission reductions from five Transportation Control Measures (TCMs) incorporated in the 2001 Ozone Attainment Plan (Table 1).

**TABLE 1  
VOC AND NO<sub>x</sub> EMISSIONS BUDGETS FROM 2001 OZONE ATTAINMENT PLAN (TONS/DAY)**

<b>VOC</b>	
2006 On Road Motor Vehicle Emissions	168.5
2006 Mobile Source Control Measure Benefits	(4.0)
2006 TCM Benefits	<u>(0.5)</u>
2006 Emissions Budget	164.0
<b>NO<sub>x</sub></b>	
2006 On Road Motor Vehicle Emissions	271.0
2006 TCM Benefits	<u>(0.7)</u>
2006 Emissions Budget	270.3

**TABLE 2  
VEHICLE ACTIVITY FORECASTS**

	<b>2015</b>	<b>2020</b>	<b>2030</b>	<b>2040</b>
<b>VEHICLES IN USE</b>	4,740,063	4,900,323	5,168,834	5,463,106
<b>Daily VMT (1000s)</b>	170,152	176,429	185,830	196,911
<b>Daily Engine Starts</b>	30,140,124	32,631,760	32,631,760	34,443,678

**Carbon Monoxide Maintenance Plan Budget**

The budget for carbon monoxide is derived from the 2004 Carbon Monoxide Maintenance Plan. The emission budget for the Bay Area is 1,850 tons per day. This budget applies to all subsequent analysis years as required by federal conformity regulation, including: any interim year conformity analyses, the 2018 horizon year, and years beyond 2018.

**Comparison of Estimated Regional Motor Vehicle Emissions to the Ozone Precursor and CO Budgets**

The motor vehicle activity forecasts for Plan Bay Area and the 2013 TIP for the various horizon years are converted to motor vehicle emission estimates by MTC using EMFAC2011.

Table 3A and 3B compares the results of the various analyses with the applicable budgets. The analyses indicate that the motor vehicle emissions are substantially below the budget, due in large part to the effects of cleaner vehicles in the California fleet and the enhanced Smog Check program now in effect in the Bay Area and reflected in the EMFAC model. With respect to the new Maintenance Plan motor vehicle emission budget for CO, Table 3B shows that calculated motor vehicle emissions will be well below the new budget of 1,850 tons per day in 2018 as well.

The estimated effectiveness of the various Transportation Control Measures, given their current implementation status is shown in Table 4. TCMs A through E are fully implemented. They have achieved the required cumulative total emission reductions of 0.5 tons per day of VOC and 0.7 tons per day of NO<sub>x</sub> by 2006.

**TABLE 3A  
EMISSIONS BUDGET COMPARISONS FOR OZONE PRECUSORS  
(TONS/DAY)\***

<b>Year</b>	<b>VOC Budget**</b>	<b>On-Road Motor Vehicles VOC</b>	<b>TCMs***</b>	<b>Net Emissions</b>
2015	164.0	55.56	(0.3)	55.26
2020	164.0	46.87	(0.3)	46.57
2030	164.0	37.56	(0.3)	37.26
2040	164.0	36.53	(0.3)	36.23

<b>Year</b>	<b>NO<sub>x</sub> Budget</b>	<b>On-Road Motor Vehicles NO<sub>x</sub></b>	<b>TCMs***</b>	<b>Net Emissions</b>
2015	270.3	110.50	(0.5)	110.00
2020	270.3	74.60	(0.5)	74.10
2030	270.3	49.60	(0.5)	49.10
2040	270.3	48.51	(0.5)	48.01

\* Emissions for summertime conditions

\*\*2001 Ozone Attainment Plan

\*\*\*The transit services for TCM A Regional Express Bus Program were modeled. The emission benefits from TCM A are therefore included in the On-Road Motor Vehicles VOC and NO<sub>x</sub> emission inventories for 2006 and beyond.

**TABLE 3B  
EMISSIONS BUDGET COMPARISONS FOR CARBON MONOXIDE  
(TONS/DAY)\***

Year	2004 CO Budget**	Estimated CO
2015	1,850	526.93
2018	1,850	421.99***
2020	1,850	352.02
2030	1,850	248.56
2040	1,850	240.98

\*Emissions for wintertime conditions

\*\*2004 Revision to the California State Implementation Plan for Carbon Monoxide, Updated Maintenance Plan for 10 Federal Planning Areas

\*\*\*Estimated CO emissions for 2018 are extrapolated from the 2015 and 2020 analysis years.

**TABLE 4  
EMISSIONS REDUCTIONS FOR TRANSPORTATION CONTROL MEASURES (TCMS) A – E IN  
STATE IMPLEMENTATION PLAN THROUGH DECEMBER 2006 (TONS PER DAY)**

TCM	VOC Emission Reductions through December 2006	NOx Emission Reductions through December 2006
TCM A Regional Express Bus Program	0.20	0.20
TCM B Bicycle/Pedestrian Program	0.04	0.03
TCM C Transportation for Livable Communities	0.08	0.12
TCM D Expansion of Freeway Service Patrol	0.10	0.25
TCM E Transit Access to Airports	0.09	0.13
<b>Total Reductions</b>	<b>0.5</b>	<b>0.7</b>

### Baseline Year Emissions Test for PM<sub>2.5</sub>

For the Baseline Year test, emissions for both directly emitted PM<sub>2.5</sub> and NO<sub>x</sub> (as the precursor to PM<sub>2.5</sub> emissions) were compared to the analysis years of 2015, 2020, 2030 and 2040. The analysis used inputs for the winter season, during which the Bay Area experiences its highest levels of PM<sub>2.5</sub> concentrations.

The motor vehicle activity forecasts for Plan Bay Area and the 2013 TIP for the planned transportation system scenarios across the various horizon years, the PM<sub>2.5</sub> baseline year (2008) and the PM<sub>2.5</sub> attainment year (2014) are shown in Table 5. These forecasts are converted to motor vehicle emission estimates by MTC using EMFAC2011.

Table 6 presents the results of the Baseline Year test for the PM<sub>2.5</sub> emissions and the NO<sub>x</sub> precursor. The analyses indicate that the motor vehicle emissions are lower in the analysis years than in the Baseline Year. This is due in large part to the transportation investments included in the Plan and Program (such as transit services, express lanes, freeway operational

improvements, roadway improvements, etc.) and its responsiveness to growth in population and associated travel demand over the next 28 years.

**TABLE 5  
VEHICLE ACTIVITY FORECASTS FOR THE PM<sub>2.5</sub> BASELINE YEAR TEST**

	<b>2008</b> Baseline Year	<b>2014</b> Attainment Year	<b>2015</b>	<b>2020</b>	<b>2030</b>	<b>2040</b>
<b>Vehicles In Use</b>	4,596,718	4,710,130	4,740,063	4,900,323	5,168,834	5,463,106
<b>Daily VMT (1000s)</b>	166,041	168,861	170,152	176,429	185,830	196,911
<b>Engine Starts</b>	29,321,651	29,964,074	30,140,124	31,121,589	32,631,760	34,443,678

**TABLE 6  
EMISSIONS COMPARISON FOR THE PM<sub>2.5</sub> BASELINE YEAR TEST \***

	<b>2008</b> Baseline Year	<b>2014</b> Attainment Year	<b>2015</b>	<b>2020</b>	<b>2030</b>	<b>2040</b>
<b>PM<sub>2.5</sub></b>	7.63	5.51	5.25	5.03	5.30	5.64
<b>NO<sub>x</sub></b>	217.85	136.04	123.71	82.44	54.38	52.91

\*Emissions for wintertime only

## **IV. TRANSPORTATION CONTROL MEASURES**

### **History of Transportation Control Measures**

Transportation control measures (TCMs) are strategies to reduce vehicle emissions. They include such strategies as improved transit service and transit coordination, ridesharing services and new carpool lanes, signal timing, freeway incident management, increased gas taxes and bridge tolls to encourage use of alternative modes, etc. The original set of TCMs plus the five most recent TCMs (A-E) have been fully implemented. The TCMs were added over successive revisions to the SIP (see Table 7). For more information on TCMs 1-28, which are completed, see the *Transportation Air Quality Conformity Analysis for the 2001 Regional Transportation Plan and FY 2001 Transportation Improvement Program Amendment 01-32 (February 2002)*. This report can be found in the MTC/ABAG Library.

- Twelve (12) ozone measures were originally listed in the 1982 Bay Area Air Quality Plan.
- In response to a 1990 lawsuit in the federal District Court, sixteen (16) additional TCMs were subsequently adopted by MTC in February 1990 as contingency measures to bring the region back on the “Reasonable Further Progress” (RFP) line. The Federal District order issued on May 11, 1992, found that these contingency TCMs were sufficient to bring the region back on the RFP track anticipated in the SIP. These measures became part of the SIP when U.S. EPA approved the 1994 Ozone Maintenance Plan.

- Two (2) transportation control measures from the 1982 Bay Area Air Quality Plan apply to Carbon Monoxide control strategies, for which the region is in attainment with the federal standard, and primarily targeted downtown San Jose (which had the most significant CO problem at that time.) MTC also adopted a set of TCM enhancements in November 1991 to eliminate a shortfall in regional carbon monoxide emissions identified in the District Court's April 19, 1991 order. Carbon monoxide standards have been achieved primarily through the use of oxygenated/reformulated fuels in cars and with improvements in the Smog Check program.
- As part of EPA's partial approval/partial disapproval of the 1999 Ozone Attainment Plan, four (4) TCMs were deleted from the ozone plan (but two of these remain in the Carbon Monoxide Maintenance Plan).
- Five (5) new Transportation Control Measures were adopted as part of the new 2001 1-Hour Ozone Attainment Plan and were fully funded in the 2001 TIP and 2001 Regional Transportation Plan.

With respect to TCM 2 from the 1982 SIP, there was a protracted debate, leading to a citizens lawsuit in federal court, about the obligations associated with this TCM. On April 6, 2004 MTC prevailed in the U.S. Court of Appeals for the Ninth Circuit which concluded that TCM 2 does not impose any additional enforceable obligation on MTC to increase ridership on public transit ridership by 15% over 1982-83 levels by November 2006 (Bayview Hunters Point Community Advocates v. Metropolitan Transportation Com'n, (2004 WL 728247, 4 Cal. Daily Op. Serv. 2919, 2004 Daily Journal D.A.R. 4209, 9<sup>th</sup> Cir.(Cal.), Apr 06, 2004)). Thus TCM 2 has been resolved, and there are no further implementation issues to address in this TCM.

**TABLE 7  
Transportation Control Measures (TCMs) in the State Implementation Plan**

<i>TCM</i>	<i>Description</i>
<b><i>Original TCMs from 1982 Bay Area Air Quality Plan</i></b>	
TCM 1	Reaffirm Commitment to 28 percent Transit Ridership Increase Between 1978 and 1983
TCM 2	Support Post-1983 Improvements in the Operators' Five-Year Plans and, After Consultation with the Operators, Adopt Ridership Increase Target for the Period 1983 through 1987
TCM 3	Seek to Expand and Improve Public Transit Beyond Committed Levels
TCM 4	High Occupancy Vehicle (HOV) Lanes and Ramp Metering
TCM 5	Support RIDES Efforts
TCM 6*	Continue Efforts to Obtain Funding to Support Long Range Transit Improvements
TCM 7	Preferential Parking
TCM 8	Shared Use Park and Ride Lots
TCM 9	Expand Commute Alternatives Program
TCM 10	Information Program for Local Governments
TCM 11**	Gasoline Conservation Awareness Program (GasCAP)
TCM 12**	Santa Clara County Commuter Transportation Program
<b><i>Contingency Plan TCMs Adopted by MTC in February 1990 (MTC Resolution 2131)</i></b>	
TCM 13	Increase Bridge Tolls to \$1.00 on All Bridges
TCM 14	Bay Bridge Surcharge of \$1.00
TCM 15	Increase State Gas Tax by 9 Cents
TCM 16*	Implement MTC Resolution 1876, Revised — New Rail Starts
TCM 17	Continue Post-Earthquake Transit Services
TCM 18	Sacramento-Bay Area Amtrak Service
TCM 19	Upgrade Caltrain Service
TCM 20	Regional HOV System Plan
TCM 21	Regional Transit Coordination
TCM 22	Expand Regional Transit Connection Ticket Distribution
TCM 23	Employer Audits
TCM 24	Expand Signal Timing Program to New Cities
TCM 25	Maintain Existing Signal Timing Programs
TCM 26	Incident Management on Bay Area Freeways
TCM 27	Update MTC Guidance on Development of Local TSM Programs
TCM 28	Local Transportation Systems Management (TSM) Initiatives
<b><i>New TCMs in 2001 Ozone Attainment Plan</i></b>	
TCM A	Regional Express Bus Program
TCM B	Bicycle/Pedestrian Program
TCM C	Transportation for Livable Communities
TCM D	Expansion of Freeway Service Patrol
TCM E	Transit Access to Airports

\*Deleted by EPA action from ozone plan

\*\*Deleted by EPA action from ozone plan, but retained in Carbon Monoxide Maintenance Plan.

*Source: Bay Area Air Quality Management District, Metropolitan Transportation Commission, 2001.*

**Status of Transportation Control Measures**

TCMs A-E were approved into the SIP as part of EPA's Finding of Attainment for the San Francisco Bay Area (April 2004). The conformity analysis must demonstrate that TCMs are being implemented on schedule (40 CFR 93.113). TCMs A-E have specific implementation steps which are used to determine progress in advancing these TCMs (see Table 8). TCMs A-E are now fully implemented.

**TABLE 8  
 IMPLEMENTATION STATUS OF FEDERAL TRANSPORTATION CONTROL MEASURES FOR OZONE (TCMS A – E)**

#	TCM	Description	Ozone Attainment Plan Implementation Schedule	Implementation Status
A	Regional Express Bus Program	Program includes purchase of approximately 90 low emission buses to operate new or enhanced express bus services. Buses will meet all applicable ARB standards, and will include particulate traps or filters. MTC will approve \$40 million in funding to various transit operators for bus acquisition. Program assumes transit operators can sustain service for a five year period. Actual emission reductions will be determined based on routes selected by MTC.	FY 2003. Complete once \$40 million in funding pursuant to Government Code Section 14556.40 is approved by the California Transportation Commission and obligated by bus operators	\$40 million for this program was allocated by the CTC in August 2001. The participating transit operators have ordered and received a total of 94 buses. All buses are currently in operations.  TCM A is fully implemented.
B	Bicycle / Pedestrian Program	Fund high priority projects in countywide plans consistent with TDA funding availability. MTC would fund only projects that are exempt from CEQA, have no significant environmental impacts, or adequately mitigate any adverse environmental impacts. Actual emission reductions will be determined based on the projects funded.	FY 2004 – 2006. Complete once \$15 million in TDA Article 3 is allocated by MTC.	MTC allocated over \$20 million in TDA Article 3 funds during FY2004, FY2005, and FY2006.  TCM B is fully implemented.

*Final Transportation-Air Quality Conformity Analysis  
Plan Bay Area and 2013 Transportation Improvement Program*

#	TCM	Description	Ozone Attainment Plan Implementation Schedule	Implementation Status
C	Transportation for Livable Communities (TLC)	Program provides planning grants, technical assistance, and capital grants to help cities and nonprofit agencies link transportation projects with community plans. MTC would fund only projects that are exempt from CEQA, have no significant environmental impacts, or adequately mitigate any adverse environmental impacts. Actual emission reductions will be based on the projects funded.	FY 2004 – 2006. Complete once \$27 million in TLC grant funding is approved by MTC	In December 2003, the Commission reaffirmed its commitment of \$27 million annually over 25 years for the TLC program as part of Phase 1 of the Transportation 2030 Plan.  MTC and the county Congestion Management Agencies (CMAs) have approved over \$27 million in TLC grant funding by FY 2006. In November 2004, MTC approved \$500,000 for regional TLC Community Design Planning Program, and in December 2004, MTC approved \$18.4 million in TLC funding for the regional TLC Capital program. As of December 2006, CMAs in Alameda, Marin and Sonoma counties approved an additional \$12.4 million in their county-level TLC Capital programs for a regional total of \$31.2 million.
D	Additional Freeway Service Patrol	Operation of 55 lane miles of new roving tow truck patrols beyond routes which existed in 2000. TCM commitment would be satisfied by any combination for routes adding 55 miles. Tow trucks used in service are new vehicles meeting all applicable ARB standards.	FY 2001. Complete by maintaining increase in FSP mileage through December 2006	FSP continues to maintain the operation of the 55 lane miles of new roving tow truck coverage. This level of service was maintained through 2006. FSP continues to expand its service areas.  TCM D is fully implemented.
E	Transit Access to Airports	Take credit for emission reductions from air passengers who use BART to SFO, as these reductions are not included in the Baseline.	BART – SFO service to start in FY 2003. Complete by maintaining service through December 2006	Service began June 2003. Service adjustments have been made since start of revenue service. The BART to SFO service has been maintained through 2006 and is continued.  TCM E is fully implemented.

## **V. RESPONSE TO PUBLIC COMMENTS**

Based on the two-year update schedule mandated by Caltrans, the Draft 2013 TIP and accompanying Transportation-Air Quality Conformity Analysis were released for public review and comment on June 22, 2012, with a public hearing held on July 11, 2012.

Several commenters noted the timing mismatch between the scheduled adoption of the 2013 TIP and the region's RTP, and Sustainable Communities Strategy (SCS) Plan Bay Area. In September 2012, MTC postponed the final adoption of the new TIP to more closely align with development and adoption of Plan Bay Area. Plan Bay Area is currently slated for adoption in July 2013. Therefore, MTC is currently developing the six-year 2013 TIP (FY2012-13 through FY2017-18), which includes both a financial constraint analysis and an air quality conformity analysis.

MTC's Programming and Allocations Committee released the Draft Conformity Analysis for a 30-day public review period from March 29, 2013 to May 3, 2013. Nine public hearings were held throughout the region on Plan Bay Area, including the Draft Conformity Analysis of the Plan and the 2013 TIP between April 8, 2013 and May 2, 2013.

MTC received one comment on the Draft Conformity Analysis during the comment period. However, upon review, this comment was not related to the Draft Conformity Analysis and will be addressed as part of the Draft Plan Bay Area Environmental Impact Report comment process (Appendix E).

Several changes were made since the Draft Conformity Analysis was released on March 29, 2013; a description of these changes is indicated in the memo addressed to the Air Quality Conformity Task Force Memo dated June 25, 2013 (Appendix G). These changes do not result in any changes to the conformity findings.

## VI. Conformity Findings

Based on the analysis, the following conformity findings are made:

- This conformity assessment was conducted consistent with U.S. EPA's transportation conformity regulations and with the Bay Area Air Quality Conformity Protocol adopted by MTC as Resolution No. 4076.
- Plan Bay Area and the 2013 Transportation Improvement Program provide for implementation of TCMs pursuant to the following federal regulation:
  - (1) *An examination of the specific steps and funding source(s) needed to fully implement each TCM indicates that TCMs which are eligible for funding under title 23 U.S.C. or the Federal Transit Laws are on or ahead of the schedule established in the applicable implementation plan, or, if such TCMs are behind the schedule established in the applicable implementation plan, the MPO and DOT have determined that past obstacles to implementation of the TCMs have been identified and have been or are being overcome, and that all State and local agencies with influence over approvals or funding for TCMs are given maximum priority to approval or funding to TCMs over other projects within their control, including projects in locations outside the non-attainment or maintenance area.*
  - (2) *If TCMs in the applicable implementation plan have previously been programmed for Federal funding but the funds have not been obligated and the TCMs are behind the schedule in the implementation plan, then the TIP cannot be found to conform if the funds intended for those TCMs are reallocated to projects in the TIP other than TCMs, or if there are no other TCMs in the TIP, if the funds are reallocated to projects in the TIP other than projects which are eligible for Federal funding intended for air quality improvements projects, e.g., the Congestion Mitigation and Air Quality Improvement Program.*
  - (3) *Nothing in the TIP may interfere with the implementation of any TCM in the applicable implementation plan. (40 CFR Part 93.113(c)).*
- For the two ground-level ozone precursors (VOC and NO<sub>x</sub>), motor vehicle emissions in Plan Bay Area and the 2013 Transportation Improvement Program are lower than the applicable motor vehicle emission budgets for the 1997 and the 2008 national 8-hour ozone standards.
- For carbon monoxide, motor vehicle emissions in Plan Bay Area and the 2013 Transportation Improvement Program are lower than the transportation conformity budget in the SIP.

- For PM<sub>2.5</sub> and NO<sub>x</sub>, the Baseline Year test shows that the motor vehicle emissions are lower under the Build scenario for the various analysis years when compared to the baseline year emissions scenario.

Date: July 18, 2013  
W.I.: 1412  
Referred by: Planning

ABSTRACT

Resolution No. 4076

This resolution finds that the Plan Bay Area and 2013 Transportation Improvement Program is in conformance with the State Implementation Plan (SIP) to achieve National Ambient Air Quality Standards.

Further discussion of this subject is contained in the Executive Director's memorandum to the Planning Committee dated July 5, 2013.

Date: July 18, 2013  
W.I.: 1412  
Referred by: Planning

Re: Approval of the Transportation-Air Quality Conformity of Plan Bay Area and 2013 Transportation Improvement Program to the State Implementation Plan for Achieving and Maintaining National Ambient Air Quality Standards

METROPOLITAN TRANSPORTATION COMMISSION  
RESOLUTION NO. 4076

WHEREAS, the Metropolitan Transportation Commission (MTC) is the regional transportation planning agency for the San Francisco Bay Area pursuant to California Government Code Section 66500 et seq.; and

WHEREAS, MTC is the federally designated Metropolitan Planning Organization (MPO), pursuant to Section 134(d) of Title 23 of the United States Code (USC) for the nine-county San Francisco Bay Area region (the region); and

WHEREAS, Part 450 of Title 23 of the Code of Federal Regulations (CFR), require MTC as the MPO to prepare and update a long-range Regional Transportation Plan (RTP) every four years; and

WHEREAS, California Government Code § 65080 *et seq.* requires MTC to prepare and update a long-range RTP, including a Sustainable Communities Strategy (SCS) prepared in conjunction with the Association of Bay Area Governments (ABAG), every four years; and

WHEREAS, beginning in 2010 MTC commenced a comprehensive and coordinated transportation planning process to develop its 2013 RTP with a 2040 horizon year known as Plan Bay Area (Plan), in conformance with all applicable federal and state requirements including Senate Bill 375; and

WHEREAS, the Plan is to be adopted (MTC Resolution 4111) on the same day as this Resolution; and

WHEREAS, MTC has prepared the 2013 Transportation Improvement Program (TIP) (MTC Resolution 4075), to be approved the same day as this Resolution; and

WHEREAS, the Plan and the 2013 TIP must conform to the federal air quality plan, which is also referred to as the State Implementation Plan (SIP); and

WHEREAS, the San Francisco Bay Area air basin was designated by U.S. Environmental Protection Agency (U.S. EPA) as nonattainment for the fine particulate matter (PM<sub>2.5</sub>) standard in December 2009, and so MTC must demonstrate conformance to this standard through an interim emission test until a PM<sub>2.5</sub> SIP is approved by U.S. EPA:

WHEREAS, MTC has conducted a transportation air quality conformity analysis for the Plan and 2013 TIP in accordance with U.S. EPA conformity regulations and the Bay Area Air Quality Conformity Protocol (MTC Resolution No. 3757); and

WHEREAS, said conformity analysis is included as Attachment A of this resolution, and is incorporated herein as though set forth at length; and

WHEREAS, the conformity analysis has been circulated for 30-day public review period from March 29, 2013 through May 3, 2013; now, therefore be it

RESOLVED, that MTC makes the following conformity findings for Plan Bay Area and 2013 Transportation Improvement Program:

- (A) Conforms to the applicable provisions of the State Implementation Plan and the applicable transportation conformity budgets in the State Implementation Plan approved for the national 8-hour ozone standard and carbon monoxide standard, and to the interim emissions test for the national fine particulate matter standard; and

- (B) Provides for the timely implementation of transportation control measures (TCMs) pursuant to the applicable State Implementation Plan;

RESOLVED, that Executive Director shall forward a copy of this Resolution to the U.S. Department of Transportation for its approval of MTC's conformity findings, along with a copy of Plan Bay Area and the 2013 Transportation Improvement Program and to such other agencies as appropriate.

METROPOLITAN TRANSPORTATION COMMISSION

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Amy Rein Worth, Chair

This resolution was entered into by the Metropolitan Transportation Commission at a special meeting of the Commission held in Oakland, California on July 18, 2013.

Date: July 18, 2013  
W.I.: 1412  
Referred by: Planning

Attachment A  
Resolution No. 4076  
Page 1 of 1

**Final Transportation-Air Quality Conformity Analysis for Plan Bay Area and 2013  
Transportation Improvement Program**

The Final Transportation-Air Quality Conformity Analysis for Plan Bay Area and 2013  
Transportation Improvement Program is on file in the offices  
of the Metropolitan Transportation Commission, MetroCenter,  
101 Eighth Street, Oakland, CA 94607.