



NATIONAL CAPITAL REGION

TRANSPORTATION PLANNING BOARD

Item 8

MEMORANDUM

April 16, 2014

To: Transportation Planning Board

From: Gerald Miller and Robert Griffiths
Acting Co-Directors,
Department of Transportation Planning

Subject: Review of Recommended Responses on Project Submissions for Inclusion in the Air Quality Conformity Assessment for the 2014 CLRP and FY 2015-2020 TIP

Background

At the March 19, 2014 meeting the Board was briefed on the project submissions for the draft 2014 CLRP and the FY 2015-2020 TIP, which were released for public comment and agency review at the TPB Citizens Advisory Committee (CAC) meeting on March 13, 2014. This public comment period closed on April 12.

Public comments submitted by individuals, organizations, and businesses were posted as they were received on the TPB web site at www.mwcog.org/transportation/public/comments.asp. The comments received are provided in a separate memorandum. This memorandum provides recommended responses to comments received.

The Board will be briefed on the comments received and recommended responses, and asked to approve project submissions for inclusion in the air quality conformity assessment for the 2014 CLRP and FY 2015-2020 TIP.

Comments and Responses

The comments can be grouped into three categories: A) the 2014 CLRP Must Address Regional Climate Change Goals, B) the MARC Growth and Investment Plan Needs Additional Service Improvements and, C) Virginia Highway Projects Should be Reevaluated.

A. Comments that the 2014 CLRP Must Address Regional Climate Change Goals

1. **Comment:** The TPB should commit to full disclosure of the climate change impact of the CLRP. The TPB is urged to conduct a transparent assessment of the CLRP and its performance with respect to climate change this year, to reevaluate all of the projects in the plan to ensure it achieves significant reductions in per capita vehicle miles traveled, and to reduce carbon emissions from transportation emissions.

Response: The TPB has provided estimates of CO₂ emissions in relation to Metropolitan Washington Council of Governments (COG) Climate Change Steering Committee CO₂ emissions reduction goals in its assessment of the performance of the 2012 CLRP and the 2013 CLRP. The mobile emissions estimates of CO₂ attributable to on-road mobile sources in the National Capital region prepared as part of the 2012 and 2013 CLRP performance assessments were developed in a technical process parallel to the US EPA required air quality conformity analysis. This parallel technical process used the same project inputs, land use assumptions, technical methods and milestone years as the federally required air quality assessment.

A comprehensive performance assessment of all projects collectively included in the 2014 CLRP, similar to the performance assessment carried out for the 2013 CLRP, will be prepared upon completion of the travel demand modeling and air quality conformity analysis this fall. This comprehensive performance assessment will include both estimated changes in vehicle miles traveled per capita and CO₂ emissions. It is anticipated that this comprehensive performance assessment of the 2014 CLRP will be completed and presented to the TPB by December.

- 2. Comment:** The recent analysis of the 2013 CLRP revealed that our currently planned projects, if built, would cause the region's transportation emissions to rise instead of drop to begin to meet the 80% reduction you have committed to. While fuel efficiency and fuel types are improving, there remains a large gap between transportation emissions forecasts and the region's climate goals. In order to get on track to meet our region's climate change goals, we must commit urgently to a dramatic increase in the region's share of trips taken by walking, cycling, and transit.

Response: While the TPB performance analysis for the 2013 CLRP indicates that the CO₂ emissions are forecast to rise by 2040, this is based upon the current EPA emissions model which does not account for the new recently promulgated federal fuel efficiency standards. When the new EPA emissions model is available (anticipated in late 2014) and validated for the region, it is expected that analysis of the 2014 CLRP will show a decrease in the CO₂ emissions by 2040.

The current emissions estimating model – MOVES2010 – does not capture the vehicle efficiency improvements associated with the federal CAFE standard, the federal mandate for lower sulfur content and other technologies associated with the federal Tier 3 standard. When the next generation model – MOVES2014 – is released by EPA in late 2014 and tested thoroughly from a technical standpoint, the beneficial influences of both federal standards on CO₂ emissions will be captured for the first time. It is anticipated that CO₂ emissions estimates will decline from the levels estimated by the MOVES2010 emissions model.

In 2010 the TPB conducted a planning study titled "What would it take?" to estimate likely CO₂ emissions reductions from a variety of strategies with the potential to achieve overall CO₂ reductions set by the MWCOC. This study examined potential CO₂ emissions reductions from a range of over 50 strategies (i.e., higher federal fuel-efficiency standards, national gas price increases and a range of short and long term transportation emissions mitigating actions by state and local governments). It concluded that the new federal fuel-efficiency standards would have the greatest potential in reducing the region's CO₂ emissions by 2040. The study also indicated that in order for the transportation sector to achieve such large CO₂ reductions, major fuel efficiency and alternative fuel technology

changes for private vehicles, trucks and buses together with a range of short-term travel efficiency strategies would be necessary.

3. **Comment:** The TPB should take action to align the CLRP with the region's climate change goals.

Response: In 2008 the Metropolitan Washington Council of Governments (COG) adopted a regional CO₂ emissions reduction goal applicable to all sectors (area, point, non-road and on road), but there were no separate CO₂ emissions reductions goals by sector. In 2010 Region Forward adopted the overall goal to reduce 2050 CO₂ emissions by 80% from 2005 levels and indicated that strategies to meet it should include energy conservation; adopting and scaling new technologies that produce renewable energy and relying less on oil and coal; retrofitting and designing new efficient green buildings; concentrating new development in Regional Activity Centers; and relying more on alternative modes of transportation such as walking, biking, and transit.

In early 2014, the TPB approved the Regional Transportation Priorities Plan (RTPP), which identifies specific strategies to achieve the region's transportation goals. The RTPP calls for concentrated land-use patterns and actions by state and local jurisdictions to promote more transit, walking and biking in order to reduce total vehicle-miles traveled region-wide. The RTPP also calls for the support of more electric and hybrid vehicles. As these strategies are more fully implemented by the state and local jurisdictions where land use and most project selection and funding decisions take place, it is anticipated that the CO₂ estimates for future CLRPs will be lower than the current estimates. An initial assessment of the 2014 CLRP and the RTPP will be presented to the TPB at its April 16 meeting. The full assessment with all available information will be presented in September prior to the approval of the 2014 CLRP.

4. **Comment:** The conformity process in the Washington region uses outdated mobile emissions budgets that have little relationship to either the new ozone standards or the more stringent ones that are likely to be adopted in the near future. The process does not support emission reductions from the transportation sector sufficient to bring the region into attainment "as expeditiously as practicable," as required by the Clean Air Act.

Response: The TPB conformity process meets all federal requirements. Each year that the CLRP and TIP are updated, TPB staff tests the draft CLRP and TIP to ensure that collectively the projects in the plan meet all federal regulatory requirements, as well as specific requirements for each air quality plan (called a State Implementation Plan, or SIP) promulgated under the Clean Air Act Amendments of 1990.

The conformity assessment conducted by the TPB demonstrates that mobile source emissions for the region, estimated for the TIP and for each analysis year of the long range plan, adhere to all carbon monoxide (CO) and ozone season volatile organic compound (VOC) and nitrogen oxides (NO_x) budgets established by the Metropolitan Washington Air Quality Committee (MWAQC) and approved by the EPA. Tests are also done to ensure that PM_{2.5} pollutant (direct PM_{2.5} and precursor NO_x) emissions are not greater than base year 2002 emissions.

Once the TPB finds that the CLRP meets regional air quality requirements, federal agencies certify that the plan is "in conformity." In other words, the TPB ensures that the CLRP "conforms" to air quality improvement requirements.. In a January 22, 2014 letter to the TPB, the Federal Transit Administration (FTA) and the Federal Highway Administration (FHWA) found that the analytical results provided by the TPB for the 2013 CLRP and FY

2013-2018 TIP demonstrate conformity and are consistent with EPA's Transportation Conformity Rule.

5. **Comment:** The TPB should work with COG staff to bring together the political leadership necessary to determine a path forward for aligning our transportation plans with our region's climate change goals.

Response: The TPB looks forward to working with COG and MWAQC and its environmental partners to find the most cost-effective ways to reduce emissions from all sources in order to clean the air while continuing to provide the mobility needed to support a strong regional economy. In support of TPB and COG policies, TPB staff have worked over the past years with members of MWAQC to prepare material assessing NO_x and CO₂ challenges and update the "Gold Book" identifying actions to reduce emissions at the local and regional level. This work has been undertaken with input from a wide variety of stakeholders, including TPB; MWAQC and its Technical Advisory Committee; the Air and Climate Public Advisory Committee; the Climate, Energy and Environment Policy Committee; and others. COG is planning to continue these efforts through fiscal year 2015 and beyond. COG staff expect this to include activities such as building off of the "Gold Book" to make it easier for localities to implement recommended practices and using the new MOVES2014 emissions model as part of a scenario analysis, building off of the 2010 "What Would It Take?" study to provide more information to decision makers about what is needed to fill the gap between current conditions and the projections of reduced future emission levels.

B. The MARC Growth and Investment Plan Needs Additional Service Improvements

Comment: MARC's Growth and Investment Plan (MGIP) is underfunded and should include aspirational goals from the 2007 plan such as run-through service, all-day two-way service and weekend service, and a third track on the Brunswick line.

Response: MDOT has set aside \$1.06 billion for MARC projects identified in the 2013 Draft Maryland Transit Administration MARC Growth and Investment Plan (MGIP) in the CLRP based on the initial draft of the plan. The comments have been forwarded to MTA for consideration in their process. The CLRP is not an aspirational plan like the MGIP; it must be fiscally constrained. For the purposes of the CLRP document, these projects will not be included in the 2014 update. If and when additional funding can be identified, the CLRP can be amended at that time.

C. Virginia Highway Projects Should be Reevaluated for the 2014 CLRP

Comment: The TPB should not include in the air quality conformity analysis for the 2014 CLRP several projects, including the newly-proposed Dulles Air Cargo, Passenger, Metro Access Highway, the widening of VA 123 from VA 7 to I-495, and the widening of US 1 from Fuller Road to Russell Road; and should also remove the Bi-County Parkway (nee Tri-County Parkway) and Manassas Battlefield Bypass projects.

Response: These newly-submitted highway projects for the CLRP as well as the Bi-County Parkway are included in the state and locally-approved transportation plans. They have gone through extensive planning and public comment phases at the local, state and federal levels and have been approved by the Commonwealth Transportation Board for inclusion in

the 2014 CLRP. The projects meet the financial constraint criteria for being included in the CLRP. The conformity analysis to be completed in September will determine if the new CLRP which includes all of the newly submitted highway and transit projects meet federal air quality conformity requirements.

In a letter dated April 16, 2014 VDOT has requested that all three of the alternatives submitted for the Dulles Air Cargo, Passenger, Metro Access Highway project be withdrawn from consideration for inclusion in the Air Quality Conformity Assessment of the 2014 CLRP and FY 2015-2020 TIP.

The Virginia Department of Transportation and the Department of Rail and Public Transportation continue to work with Northern Virginia local governments and transit providers to make significant investments in public transit, pedestrian and bicycle facilities, transportation demand management, and operational improvements. VDOT is also working with local governments to better coordinate land use planning and transportation planning to reduce travel volumes. Even with Virginia's high level of investment in non-highway projects, it is still necessary to provide some major highway improvements in this thriving region with high rates of job and population growth.