

**Compilation of Questions to EPA from Stakeholders in the Metropolitan
Washington-DC-MD-VA Planning Area Regarding EPA's Proposal to Designate
Montgomery and Prince George's County as part of the Baltimore Nonattainment
Area for the 2006 24-hour PM_{2.5} NAAQS**

December 17, 2008

Background/Summary

This document is a compilation of questions from various stakeholders in the metropolitan Washington, DC-MD-VA air quality and transportation planning area regarding EPA's December 5, 2008 proposal to designate Montgomery and Prince George's County as part of the Baltimore Nonattainment Area for the 2006 24-hour PM_{2.5} NAAQS. These questions were a result of a discussion with EPA Region III officials at the Metropolitan Washington Air Quality Committee (MWAQC) Technical Advisory Committee (TAC) held on December 9, 2008.

The questions are primarily focused on developing a better understanding of the basis and technical merits of EPA's 9-factor analysis and the implications of the proposed designation on air quality and transportation planning activities in the region.

Specific Questions

District Department of Transportation (DDOT)

In general, DDOT questions are related to gaining a better understanding of any impacts to the TPB's transportation planning and conformity processes should the EPA's area designation proposal be finalized. Specific questions include:

1. How would the TPB's current conformity requirements change under EPA's proposed area designation (i.e., new budgets, schedules, etc.)?
2. What alternatives are available for meeting any new requirements?
3. Are there any other examples of counties that have been removed from one nonattainment area and placed in another and cases of EPA setting different area designations involving multiple MPO's?
4. How might problems with the Baltimore region's SIP and conformity impact the TPB?

Virginia Department of Transportation (VDOT)

The implications of a decision to specify overlapping nonattainment areas between two MPO areas that are also in nonattainment for other pollutants are significant for both transportation planning and air quality planning. The 9-factor analysis provided by EPA only presented a superficial analysis of the implications (under factor 8) and does not provide an adequate basis for decision making purposes. Before a final decision is made, please conduct a more thorough and comprehensive review of the potential implications

for both transportation and air quality planning for both the Baltimore and DC-MD-VA planning areas.

Sample questions of interest that would need to be addressed as part of this review include but are not limited to:

1. As indicated at the December MWAQC TAC meeting, an “early SIP” submittal can be used to expedite the process of setting up sub-regional mobile budgets for Prince Georges and Montgomery counties, and once they’re approved, TPB can complete conformity determinations to the daily PM2.5 standard without transportation planning and conformity coordination with the BMC. How does an “early SIP” submittal differ from a traditional SIP submittal, and what are its advantages and disadvantages?
2. If a build-less-than-baseline interim conformity test for the new daily PM2.5 standard is selected, what baseline year should be used?
3. If the out-year of TPB’s LRP is 2040 and BMC’s is 2035, would TPB only need to demonstrate conformity to the out-year of 2040 once the sub-regional budgets are in place, or would TPB still need to demonstrate conformity to both 2035 and 2040?
4. Will TPB and BMC need to coordinate on interim conformity analysis years, either before or after sub-regional budgets are in place?
5. Is there any way to separate the TPB and BMC transportation planning and conformity activities prior to the approval of sub-regional mobile budgets, such as while the interim emission tests are still being used?
6. With sub-regional mobile budgets in place for Prince Georges and Montgomery counties, please explain how control strategy implementation failures or conformity failures in the BMC region would affect the TPB region. What are the potential interactions for SIP revisions for other pollutants (e.g., ozone)? Would a conformity lapse or freeze or highway funding sanctions applied for the BMC area cause projects to be delayed or funding lost in an unrelated portion of the TPB area?
7. Can an “early SIP” submittal be used to set out-year mobile budgets beyond the attainment date?
8. Since elevated mobile PM2.5 emissions could occur during any season of the year, what units or timeframe should we use when setting daily mobile budgets and performing conformity determinations for the daily PM2.5 standard? For example, would the daily PM2.5 mobile budget represent PM2.5 emissions for an average annual day, an average annual weekday, etc., (as opposed to an average summer weekday as currently done for the 8-hour ozone standard)? We would also need guidance on developing the appropriate inputs for use in mobile modeling, such as for temperature and humidity values representative of “daily” PM2.5.

9. In light of these questions, which may be expanded significantly and require an iterative series of question and answers to resolve, it may be more constructive to hold one or more workshops with the affected MPOs (BMC and TPB), state, and local agencies to identify all concerns and potential issues and come to an understanding about how those issues would be resolved should they arise. This would help ensure that all stakeholders are appropriately informed and any decisions made are the best possible.

Maryland Department of Transportation (MDOT)

1. If one of the Baltimore SIPs is disapproved for any reason, would that affect the ability to determine Conformity for Prince George's and Montgomery Counties? How about the remainder of the Washington region?

COG Transportation Planning Board (TPB) Staff

1. The '9 factor analysis' associated with EPA's August 18, 2008 letter to MDE proposing nonattainment for the Baltimore region concluded that counties in the Washington area did not significantly contribute to Baltimore's nonattainment status. However, this same '9 factor analysis' accompanied EPA's December 5, 2008 letter, and based upon these same data, EPA concluded that Montgomery and Prince George's counties were significant contributors to Baltimore's nonattainment status. How can the same data be used to justify opposite conclusions?

2. If EPA concluded that contiguous counties in the Washington area in a southwesterly direction from Baltimore significantly contribute, why didn't their analysis continue looking at contiguous jurisdictions further southwesterly, i.e., the District of Columbia and Virginia jurisdictions?

3. The '9 factor analysis' reports VMT change between 1996 and 2005 at 37% in Prince George's and 16% in Montgomery County. However, growth rates for these two counties, based upon MD SHA's published HPMS data, are 24% and 16%, respectively. Charles County also is reported at a much higher rate than HPMS data indicate. Is this a mistake in calculation or were other data used for this work?

4. How would the transportation conformity process proceed under this proposed area designation, given that two separate MPOs would be involved in such determinations?

Maryland Department of the Environment (MDE)

1. How does this affect the ozone designations where both areas will be nonattainment. Does this set a precedent that DC contributes to Baltimore that will drive them to designate 1 giant area for the new O3 standard.

Montgomery County

1. I would like to see an EPA report discussing the different options the Baltimore Planning Organization and Washington TPB have as far as the coordination of transportation and conformity planning if EPA designates Prince Georges and Montgomery counties part of the Baltimore nonattainment region. Martin Kotsch from

EPA discussed the options briefly at the TAC meeting, and I would like to see his proposed solutions in writing.

2. How will incorporating Montgomery and Prince Georges counties into the Baltimore nonattainment area affect the counties themselves? Will there be consequences for transportation projects in PG and Montgomery counties?
3. The PM2.5 design values for monitors in the Washington region for 2005-2007 show that the River Terrace monitor in DC is right at the 35 ug/m3. The design value for the entire region is 35 ug/m3, according to COG's analysis. EPA determined in its nine factor analysis for the Baltimore region that winds tend to come from the southwest during warm days with the highest measured PM2.5 concentration values. Did the EPA consider whether emissions from the entire Washington metropolitan region contribute to elevated PM2.5 levels in the Baltimore nonattainment region?

Questions Raised at the December 9, 2008 Technical Advisory Committee Meeting

1. Did EPA conduct any modeling to determine which areas significantly contribute to the PM2.5 nonattainment situation in Baltimore?
2. Is the Contributing Emissions Score (CES) based on modeling, or is it a mathematical calculation? Please explain how it works.
3. Does EPA have a national policy setting the threshold for significant contributor to nonattainment of the 24-hour PM2.5 NAAQS based on the 9-factor and CES approach?
4. Please provide a detailed summary of available and EPA recommended air quality and transportation planning process options if the December 5, 2008 EPA proposal is finalized, including details on how to handle transportation conformity in the interim and long range time frame?

Additional Questions from COG Air Quality Staff

1. Please provide technical and national policy documentation that scientifically and technically supports the policy decision to exclude from further consideration those counties that are not contiguous to the Baltimore region's existing NAA.
2. Please provide detailed technical documentation on how it develops Contributing Emissions Score (CES) for the 9-factor analysis?
3. Is EPA legally able to designate the entire Washington, DC-MD-VA MSA as nonattainment (separate from the Baltimore NAA) if the Design Value (DV) for the Washington Region is below the 2006 24-hour NAAQS? In other words can a nonattainment area be designated based solely on significant contribution.
4. If all jurisdictions in the entire Washington, DC-MD-VA MSA recommended to be designated as a nonattainment area for the 2006 24-hour PM2.5 NAAQS, would it be

possible/feasible for EPA to subsequently issue a Clean Data Determination as they recently did for the 1997 annual PM2.5 NAAQS?

5. If the December 5, 2008 EPA proposal is finalized, will the Clean Data Determination for the 1997 annual PM2.5 NAAQS for the Washington, DC-MD-VA MSA be affected?

6. Please explain EPA's rationale for issuing a Clean Data Determination for Montgomery and Prince George's Counties for the 1997 annual PM2.5 NAAQS while at the same time asserting that it believes these two counties contribute significantly to the nonattainment situation in the Baltimore NAA for the 2006 24-hour PM2.5 NAAQS.

7. Please provide scientific and technical justification for why EPA considered Charles County (which is not contiguous to the existing Baltimore NAA) in the 9-factor analysis but excluded from further considerations jurisdictions such as the District of Columbia, the City of Alexandria, and Arlington, Fairfax, and Loudoun Counties?