



# South Coast Air Quality Management District

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February 19, 2010

Ms. Lynn Terry  
Deputy Executive Officer  
California Air Resource Board  
1001 I Street  
P.O. Box 2815  
Sacramento, CA 95812-2815

Re: South Coast Air Basin PM10 Transportation Conformity Budget

Dear Ms. Terry:

In response to EPA staff's request, SCAQMD staff is providing the following explanation to demonstrate that the proposed PM10 transportation conformity budgets will continue to meet the federal standard with a sufficient margin.

As a component to the Basin PM10 Maintenance Plan adopted by the SCAQMD Governing Board on January 8, 2010, staff evaluated the impact of adding 20 TPD of directly emitted PM10 to the Basin baseline inventory to the PM10 24-hour attainment demonstration. In this scenario, 20 TPD of particulate were added to 2010, 2020, and 2030. The results of the sensitivity analysis, which are summarized in Chapter 3 of the Maintenance Plan, indicate that the additional PM10 emissions would not cause regional PM10 24-hour concentrations to exceed 150 ug/m<sup>3</sup>. The analysis for 2030 projected that the maximum 24-hour average PM10 concentration could potentially reach 141 ug/m<sup>3</sup> (94 percent of the standard) if the 20 TPD were added to the baseline inventory. The peak projected concentration would be 6 percent below the standard. As a consequence, the Maintenance Plan identified that a 20 TPD "compliance margin" could be conservatively applied to the baseline emissions in each milestone years without causing the standard to be exceeded.

SCAG has proposed to add 5 TPD PM10 emissions to the 2030 baseline inventory and 7, 4 and 3 TPD ROG to the budgets in 2010, 2020 and 2030, respectively. Appendix C of the CARB Staff Report for the 2007 South Coast PM2.5 SIP, presented the relative emissions contribution to Basin PM2.5 formation from ROG, NOx, PM2.5 and SOX. Based on the established ratios in the 2007 SIP, requested additional ROG and PM10 emissions translate (with rounding to whole tons) to 1, 1, and 6 TPD of PM10 emissions for 2010, 2020 and 2030, respectively. (Note: the 6

TPD 2030 PM10 emissions includes 1 TPD associated with ROG equivalency and the 5 TPD of directly emitted PM10). The 2010 ROG to PM10 conversion calculation is illustrated below:

$$7 \text{ TPD ROG} \times \frac{1 \text{ PM}_{2.5}}{23 \text{ ROG}} \times \frac{1.77 \text{ PM}_{10}}{1 \text{ PM}_{10}} = 0.54 \text{ TPD PM}_{10} \text{ Equivalent}$$

or,

= 1 TPD with rounding upward.

These additional PM10 emissions (equivalent and directly emitted) are less than the 20 TPD of PM10 simulated in the sensitivity analysis which continued to demonstrate attainment to the federal standard. As a result, staff believes that the additional ROG and PM10 emissions can be added to the proposed PM10 transportation conformity budgets with sufficient compliance margin.

If you have any questions or need additional information, please contact Joe Cassmassi, Planning & Rules Manager at (909) 396-3155 or [jcassmassi@aqmd.gov](mailto:jcassmassi@aqmd.gov).

Sincerely,



Elaine Chang, DrPH  
Deputy Executive Officer  
Planning, Rule Development & Area Sources

- cc: Joseph Cassmassi, SCAQMD
- Kurt Karperos, CARB
- Karen Magliano, CARB
- Dennis Wade, CARB
- Sylvia Zulawnick, CARB