

4APT-APB

John E. Hornback, Director
Kentucky Division for Air Quality
803 Schenkel Lane
Frankfort, KY 40601-1403

Dear Mr. Hornback:

Pursuant to Section 93.118(e)(4) of the Transportation Conformity Rule (40 CFR Part 93, Subpart A), the United States Environmental Protection Agency (EPA) Region 4 has reviewed the motor vehicle emissions budgets contained in the Ozone Redesignation Request and Maintenance State Implementation Plan (SIP) dated December 13, 1999, for the Northern Kentucky counties of Boone, Campbell and Kenton and finds the budgets adequate for transportation conformity purposes. The submitted SIP establishes motor vehicle emissions budgets for the year 2010 in the amount of 5.83 tons per day for volatile organic compounds and 15.13 tons per day for oxides of nitrogen. These motor vehicle emissions budgets must be used for transportation conformity purposes upon the effective date of the adequacy determination, which will be 15 days after publication of EPA's adequacy finding in the Federal Register.

EPA opened the public comment period on the adequacy of the submitted Northern Kentucky motor vehicle emissions budgets on November 29, 1999. The comment period closed on December 29, 1999, and no comments were received. However, the final adequacy determination was delayed in order to resolve an issue raised by EPA Region 4 in a letter dated November 26, 1999, to the Kentucky Division for Air Quality regarding the October 29, 1999, prehearing submittal. In that letter, EPA Region 4 commented that EPA's Volume IV guidance recommends that "detailed [vehicle-miles traveled (VMT)] estimates produced by the transportation planning process be made consistent in the aggregate with [Highway Performance Monitoring System (HPMS) data]," which was not done in the development of the Northern Kentucky motor vehicle emissions budgets.

At the request of EPA Regions 4 and 5, the Ohio-Kentucky-Indiana Regional Council of Governments (OKI) compared its travel model output VMT for network year 1995 with HPMS VMT for the same year. The results of this analysis, which OKI supplied to EPA on February 9, 2000, via e-mail, indicated that for network year 1995 the OKI travel model VMT estimates were 33 percent lower than the corresponding HPMS VMT for the Northern Kentucky portion of the non-attainment area, and 27 percent lower than HPMS VMT for the entire non-attainment area.

EPA's Volume IV guidance also states that "[State Implementation Plan] functional systems and the VMT reported thereon may not be identical to those reported to the U.S. [Department of Transportation], if the state demonstrates that HPMS data are sufficiently

uncertain and the competing alternative proposed by the state is more accurate. Consult with divisional or regional [Federal Highway Administration] officials who have direct knowledge of the HPMS data associated with the non-attainment area.” In its December 1, 1999, response to EPA Region 4's comments, OKI stated that “Through the interagency consultation process, the Ohio Department of Transportation (ODOT), EPA Region 5 and OKI have expressed confidence that the OKI urban travel model produces better VMT estimates than the HPMS.” In an unsigned draft letter dated March 17, 2000, OKI points out that “For the [travel model] calibration, OKI used 3,815 traffic counts supplied by the ODOT, the Kentucky Transportation Cabinet, many county and local governments, transportation engineering consultants, and OKI. These traffic counts cover 61 percent of the links in OKI's modeling network. By comparison, the HPMS data set consists of 3,700 traffic counts statewide, with 450 of these in OKI's Ohio counties...”

OKI also provided EPA Regions 4 and 5 a copy of a March 6, 2000, letter from James E. McQuirt, P.E., Administrator of the Office of Technical Services of ODOT to James Duane, Executive Director of OKI, in which Mr. McQuirt states that “...for the OKI region, the travel demand model process employed is the most reasonable method for estimation of vehicle emissions,” and “...reconcil[ing] model results to inconsistent HPMS data sets for redesignation...does not enhance the accuracy of the emission estimate.” Finally, in an April 19, 2000, conference call between EPA Regions 4 and 5, and the Federal Highway Administration (FHWA) Kentucky and Ohio Divisions, FHWA staff stated that they believe that OKI travel model VMT estimates are more reliable than HPMS VMT for the Cincinnati/Northern Kentucky area.

Based on EPA's Volume IV guidance and these letters and conversations, and because the Commonwealth of Kentucky used the identical methodology to estimate motor vehicle emissions in the 1996 Periodic Emissions Inventory for Northern Kentucky on which the Maintenance SIP is based, EPA Region 4 finds that the December 13, 1999, Ozone Redesignation Request and Maintenance SIP for Northern Kentucky meets the requirements of Section 93.118(e)(4) of the Transportation Conformity Rule and is therefore adequate for transportation conformity purposes.

More information on motor vehicle emissions budget adequacy is available on the EPA web site at <http://www.epa.gov/oms/transp/conform/adequacy.htm>. If you have any questions about this adequacy determination, please contact me or have your staff contact Dr. Robert Goodwin of the Region 4 staff at (404) 562-9044.

Sincerely,

Winston A. Smith
Director
Air, Pesticides and Toxics

Management Division

3

cc: James C. Codell, III, KYTC
James Duane, OKI
Jose Sepulveda, FHWA KY Division
Susan Schruth, FTA-R4

Rgoodwin/rb/4APT-APB/404-562-9044/5-16-00/nkyadeq.rg5

-

Kutzman

Smith

Meiburg
