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TEXAS COMMISSION ON ENVIRONMENTAL QUALITY

Protecting Texas by Reducing and Preventing Pollution

July 8, 2016

Achille Alonzi, Division Administrator
Federal Highway Administration, Texas Division
300 E. 8th Street, Rm 826
Austin, Texas 78701

Subject: Transportation conformity review and concurrence

Dear Mr. Alonzi:

Thank you for the opportunity to review the *Transportation Air Quality Conformity Report for the Houston-Brazoria-Galveston Region for Amendments to the 2040 Regional Transportation Plan and 2015-2018 Transportation Improvement Program* and supporting documents submitted by the Houston-Galveston Area Council (H-GAC). The purpose of this conformity analysis was to determine if amendments to the H-GAC's 2040 Regional Transportation Plan and the 2015-2018 Transportation Improvement Program are consistent with area emissions requirements for ozone. An eight-county area in the Houston-Galveston-Brazoria (HGB) region is designated nonattainment for ozone: Brazoria, Chambers, Fort Bend, Galveston, Harris, Liberty, Montgomery, and Waller Counties.

In order for conformity to be demonstrated for the HGB ozone nonattainment area, projected emissions of nitrogen oxides (NO_x) and volatile organic compounds (VOC) from the transportation plan and transportation improvement program must be no greater than the applicable motor vehicle emissions budgets (MVEB) for NO_x and VOC, as required under Title 40 Code of Federal Regulations Part 93, Subpart A. Regional transportation emissions were projected for analysis years 2015, 2017, 2018, 2025, 2035, and 2040 and then compared to the NO_x and VOC MVEB established in the *Houston-Galveston-Brazoria 1997 Eight-Hour Ozone Standard Nonattainment Area Motor Vehicle Emissions Budgets Update State Implementation Plan Revision*, which was approved by the United States Environmental Protection Agency (EPA) effective February 3, 2014.

Texas Commission on Environmental Quality (TCEQ) staff reviewed the transportation conformity determination documents submitted by the H-GAC. The H-GAC used a methodology for its regional emissions analysis that deviates from the methodology used to calculate MVEB for the applicable SIP revision. While both methodologies employed the Motor Vehicle Emission Simulator (MOVES) model to estimate on-road emissions, the MVEB was calculated with utilities developed by the Texas A&M University Transportation Institute that utilizes MOVES in a mode that categorizes emission rates based on 1 mile-per-hour (mph) vehicle speed increments. For its regional emissions analysis, the H-GAC relied on the Spatial Emission Estimator (SEE) modeling framework, which utilizes MOVES in a mode that categorizes emission rates based on 5 mph vehicle speed increments. The SEE tool can be programmed to bin speeds at the 1 mph level, but the TCEQ determined that to be unnecessary for this conformity analysis because the regional emission estimates were sufficiently below the applicable MVEB.

Mr. Alonzi
July 8, 2016

All issues with this conformity analysis were addressed and resolved in a series of meetings, consultative calls, and e-mails with the H-GAC, the Federal Highway Administration, the EPA, the Texas Department of Transportation, and the TCEQ. The TCEQ is satisfied that all requirements have been met and transportation conformity has been demonstrated. If you have any questions about our review, please contact me at 512-239-1725 or david.brymer@tceq.texas.gov or Jamie Zech at 512-239-3935 or jamie.zech@tceq.texas.gov.

Sincerely,



David Brymer, Director
Air Quality Division
Texas Commission on Environmental Quality

DB/jz

Cc: Jose Campos, Federal Highway Administration
Barbara Maley, Federal Highway Administration
Guy Donaldson, U.S. Environmental Protection Agency
Jeffrey Riley, U.S. Environmental Protection Agency
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Alan Clark, Houston-Galveston Area Council