



6560-50-P

## ENVIRONMENTAL PROTECTION AGENCY

### 40 CFR Part 52

[EPA-R04-OAR-2013-0563; FRL-9904-89-Region4]

Approval and Promulgation of Implementation Plans; North Carolina:

Non-interference Demonstration for Removal of Federal Low-Reid Vapor Pressure Requirement  
for the Raleigh-Durham-Chapel Hill Area

**AGENCY:** Environmental Protection Agency (EPA).

**ACTION:** Final rule.

**SUMMARY:** EPA is approving the State of North Carolina's March 27, 2013, State Implementation Plan (SIP) revision to the State's approved Maintenance Plan for the Raleigh-Durham-Chapel Hill 1997 8-hour Ozone Maintenance Area (Triangle Area). Specifically, North Carolina's revision, including updated modeling, shows that the Triangle Area would continue to maintain the 1997 8-hour ozone standard if the currently applicable Federal Reid Vapor Pressure (RVP) standard for gasoline of 7.8 pounds per square inch (psi) were modified to 9.0 psi for three portions (Wake and Durham Counties, and a portion of Granville County) of the Triangle Area during the high-ozone season. The State included a technical demonstration with the revision to demonstrate that the less-stringent RVP standard of 9.0 psi in these areas would not interfere with continued maintenance of the 1997 8-hour Ozone National Ambient Air Quality Standards (NAAQS) or any other applicable standard. Approval of this SIP revision is a prerequisite for EPA's consideration of an amendment to the regulations to remove the aforementioned portions of the Triangle Area from the list of areas that are currently subject to the Federal 7.8 psi RVP requirements. In addition, EPA is also approving changes to the motor

vehicle emission budgets (MVEBs) used in the 1997 8-hour ozone maintenance plan for the Triangle Area. EPA has determined that North Carolina's March 27, 2013, SIP revision with respect to the modeling changes and associated technical demonstration, and with respect to the updated MVEBs, is consistent with the applicable provisions of the Clean Air Act (CAA or Act). Should EPA decide to remove the subject portions of the Triangle Area from those areas subject to the 7.8 psi Federal RVP requirements, such action will occur in a subsequent rulemaking.

**DATE:** This rule will be effective on [insert date 30 days after publication in the Federal Register].

**ADDRESSES:** EPA has established a docket for this action under Docket Identification No. EPA-R04-OAR-2013-0563. All documents in the docket are listed on the [www.regulations.gov](http://www.regulations.gov) web site. Although listed in the index, some information is not publicly available, i.e., Confidential Business Information or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are available either electronically through [www.regulations.gov](http://www.regulations.gov) or in hard copy at the Regulatory Development Section, Air Planning Branch, Air, Pesticides and Toxics Management Division, U.S. Environmental Protection Agency, Region 4, 61 Forsyth Street, SW, Atlanta, Georgia 30303-8960. EPA requests that if at all possible, you contact the person listed in the **FOR FURTHER INFORMATION CONTACT** section to schedule your inspection. The Regional Office's official hours of business are Monday through Friday, 8:30 to 4:30 excluding federal holidays.

**FOR FURTHER INFORMATION CONTACT:** Sean Lakeman, Regulatory Development Section, Air Planning Branch, Air, Pesticides and Toxics Management Division, U.S. Environmental Protection Agency, Region 4, 61 Forsyth Street, SW, Atlanta, Georgia 30303-8960. The telephone number is (404) 562-9043. Mr. Lakeman can be reached via electronic mail at [lakeman.sean@epa.gov](mailto:lakeman.sean@epa.gov).

**SUPPLEMENTARY INFORMATION:**

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**I. Background of the Triangle Area.**

In 1991, the Triangle Area was designated as a moderate nonattainment area pursuant to the 1-hour ozone NAAQS. *See* 56 FR 56694 (November 6, 1991). Under the 1-hour ozone

NAAQS, the Triangle nonattainment area was composed of Durham and Wake Counties, and the Dutchville Township portion of Granville County. Among the requirements applicable to nonattainment areas for the 1-hour ozone NAAQS was the requirement to meet certain volatility standards (known as Reid Vapor Pressure or RVP) for gasoline sold commercially. *See* 55 FR 23658 (June 11, 1990). As part of the RVP requirements associated with its nonattainment designation, gasoline sold in the Triangle 1-hour nonattainment area could not exceed 7.8 psi RVP during the high-ozone season months.

Following implementation of the 7.8 psi RVP requirement in the Triangle Area, on April 18, 1994, the Area was redesignated to attainment for the 1-hour ozone standard, based on 1989-1992 ambient air quality monitoring data. *See* 59 FR 18300. North Carolina's redesignation request for the 1-hour ozone Triangle Area did not, however, include a request for the Area to be removed from the list of areas subject to the 7.8 psi RVP standard. As such, the 7.8 RVP requirement remained in place for Durham and Wake Counties, and the Dutchville Township portion of Granville County when the Triangle Area was designated nonattainment for the 1997 8-hour ozone NAAQS. Under the 1997 8-hour ozone NAAQS, the Triangle Area was expanded from Durham and Wake Counties, and the Dutchville Township portion of Granville County to also include Franklin, Johnston, Orange, and Person Counties, the remainder of Granville County and Baldwin, Center, New Hope and Williams Townships in Chatham County. *See* 69 FR 23857 (April 30, 2004). In 2007, the Triangle Area was redesignated to attainment for the 1997 8-hour ozone NAAQS. *See* 72 FR 72948, (December 26, 2007). The Triangle Area was later designated as attainment for the 2008 8-hour ozone NAAQS. *See* 77 FR 30088 (May 21, 2012).

## **II. Background of the Gasoline Volatility Requirement.**

On August 19, 1987 (52 FR 31274), EPA determined that gasoline nationwide had become increasingly volatile, causing an increase in evaporative emissions from gasoline-powered vehicles and equipment. Evaporative emissions from gasoline, referred to as volatile organic compounds (VOC), are precursors to the formation of tropospheric ozone and contribute to the nation's ground-level ozone problem. Exposure to ground-level ozone can reduce lung function (thereby aggravating asthma or other respiratory conditions), increase susceptibility to respiratory infection, and may contribute to premature death in people with heart and lung disease.

The most common measure of fuel volatility that is useful in evaluating gasoline evaporative emissions is RVP. Under section 211(c) of CAA, EPA promulgated regulations on March 22, 1989 (54 FR 11868), that set maximum limits for the RVP of gasoline sold during the high ozone season. These regulations constituted Phase I of a two-phase nationwide program, which was designed to reduce the volatility of commercial gasoline during the high ozone season. On June 11, 1990 (55 FR 23658), EPA promulgated more stringent volatility controls as Phase II of the volatility control program. These requirements established maximum RVP standards of 9.0 psi or 7.8 psi (depending on the State, the month, and the area's initial ozone attainment designation with respect to the 1-hour ozone NAAQS during the high ozone season).

The 1990 CAA Amendments established a new section, 211(h), to address fuel volatility. Section 211(h) requires EPA to promulgate regulations making it unlawful to sell, offer for sale, dispense, supply, offer for supply, transport, or introduce into commerce gasoline with an RVP level in excess of 9.0 psi during the high ozone season. Section 211(h) prohibits EPA from establishing a volatility standard more stringent than 9.0 psi in an attainment area, except that

EPA may impose a lower (more stringent) standard in any former ozone nonattainment area redesignated to attainment.

On December 12, 1991 (56 FR 64704), EPA modified the Phase II volatility regulations to be consistent with section 211(h) of the CAA. The modified regulations prohibited the sale of gasoline with an RVP above 9.0 psi in all areas designated attainment for ozone, beginning in 1992. For areas designated as nonattainment, the regulations retained the original Phase II standards published on June 11, 1990 (55 FR 23658).

As stated in the preamble to the Phase II volatility controls and reiterated in the proposed change to the volatility standards published in 1991, EPA will rely on states to initiate changes to EPA's volatility program that they believe will enhance local air quality and/or increase the economic efficiency of the program within the limits of CAA section 211(h).<sup>1</sup> In those rulemakings, EPA explained that the Governor of a State may petition EPA to set a volatility standard less stringent than 7.8 psi for some month or months in a nonattainment area. The petition must demonstrate such a change is appropriate because of a particular local economic impact and that sufficient alternative programs are available to achieve attainment and maintenance of the 1-hour ozone NAAQS. A current listing of the RVP requirements for states can be found on EPA's website at:

<http://www.epa.gov/otaq/fuels/gasolinefuels/volatility/standards.htm>.

As explained in the December 12, 1991 (56 FR 64704), Phase II rulemaking, EPA believes that relaxation of an applicable RVP standard in a nonattainment area is best accomplished in conjunction with the redesignation process. In order for an ozone nonattainment area to be redesignated as an attainment area, section 107(d)(3) of the Act requires

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<sup>1</sup> See 55 FR 23658 (June 11, 1990), 56 FR 24242 (May 29, 1991) and 56 FR 64704 (Dec. 12, 1991).

the state to make a showing, pursuant to section 175A of the Act, that the area is capable of maintaining attainment for the ozone NAAQS for ten years after redesignation. Depending on the area's circumstances, this maintenance plan will either demonstrate that the area is capable of maintaining attainment for ten years without the more stringent volatility standard or that the more stringent volatility standard may be necessary for the area to maintain its attainment with the ozone NAAQS. Therefore, in the context of a request for redesignation, EPA will not relax the volatility standard unless the state requests a relaxation and the maintenance plan demonstrates, to the satisfaction of EPA, that the area will maintain attainment for ten years without the need for the more stringent volatility standard. As noted above, however, North Carolina did not request relaxation of the applicable 7.8 psi RVP standard when the Triangle Area was redesignated to attainment for the either the 1-hour or the 1997 8-hour ozone NAAQS. Rather, North Carolina is now seeking to relax the 7.8 psi RVP standard after the Triangle Area has been redesignated to attainment for the 1997 8-hour ozone NAAQS. Accordingly, the original modeling and maintenance demonstration supporting the 1997 8-hour ozone maintenance plan must be revised to reflect continued attainment under the relaxed 9.0 psi RVP standard that the State has requested.

### **III. Background of Mobile Source Inventories and Motor Vehicle Emission Budgets Update.**

On June 7, 2007, the State of North Carolina, through NC DENR, submitted a final request for EPA to: (1) Redesignate the Triangle Area to attainment for the 1997 8-hour ozone standard; and (2) approve a North Carolina SIP revision containing a maintenance plan for the

Triangle Area. On December 26, 2007 (72 FR 72948), EPA approved the redesignation request for the Triangle Area. Additionally, EPA approved the 1997 8-hour ozone maintenance plan including nitrogen oxides (NO<sub>x</sub>) MVEBs for the Triangle Area.<sup>2</sup> These approvals were based on EPA's determination that the State of North Carolina had demonstrated that the Triangle Area met the criteria for redesignation to attainment specified in the CAA, including the determination that the entire Triangle Area had attained the 1997 8-hour ozone NAAQS.

At the time of original redesignation request, the on-road motor vehicle inventory was generated by the MOBILE6.2 model, which at the time was the current MVEB model. The change to the maintenance plan discussed above includes a MVEB generated by the MOVES model which has since replaced the MOBILE6.2 model. In addition, the model used to calculate the original non-road inventory (NONROAD2005c) has also since been updated by a new non-road inventory model (NONROAD2008a).

As a result of these new models and the revised emission associated with a relaxed RVP standard, the safety margin<sup>3</sup> calculations provided in the revised maintenance plan have changes from the previous margins included with the original maintenance plan. Therefore, North Carolina's revision includes a reallocation of the safety margin to the NO<sub>x</sub> MVEB based upon the revised calculations.

NC DENR is currently allocating portions of the available safety margin to the MVEBs to allow for unanticipated vehicle miles traveled growth as well as changes to future vehicle mix

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<sup>2</sup> In the December 26, 2007, final rule EPA also approved NC DENR's determination that on-road emissions of VOC are insignificant for transportation conformity purposes. We are not addressing that insignificance finding in today's rule.

<sup>3</sup> A safety margin is the difference between the attainment level of emissions from all source categories (i.e., point, area, and mobile) and the projected level of emissions from all source categories. The State may choose to allocate some of the safety margin to the MVEBs, for transportation conformity purposes, so long as the total level of emissions from all source categories remains equal to or less than the attainment level of emissions. (40 CFR 93.124(a))



assumptions that influence the emission estimations. A total of 14,396 kilograms (kg) (15.87 tons per day (tpd)) and 13,563 kg (14.95 tpd) from the available NO<sub>x</sub> safety margins in 2008 and 2017, respectively, were added to the MVEBs for the Triangle Area.

#### **IV. This Action**

On October 30, 2013 (78 FR 64896), EPA proposed approval of North Carolina's March 27, 2013, revision to the State's approved 1997 8-hour ozone maintenance plan for the Triangle Area. Specifically, North Carolina's revision, including updated modeling, shows that the Triangle Area would continue to maintain the 1997 8-hour ozone standard if the currently applicable RVP standard for gasoline of 7.8 psi were modified to 9.0 psi during the high-ozone season. In addition, the revision included changes to the MVEBs used in the 1997 8-hour ozone maintenance plan for the Triangle Area. No adverse comments were received on this proposed action and EPA is hereby finalizing approval of the revision.

The Triangle Area is currently designated attainment for the 1997 8-hour ozone NAAQS. The Area was redesignated from nonattainment of the 1997 8-hour ozone NAAQS on December 26, 2007. *See* 72 FR 72948. This rulemaking approves a revision to the 1997 8-hour ozone Maintenance Plan for the Triangle Area submitted by the NC DENR. Specifically, EPA is approving changes to the maintenance plan, including updated modeling, that shows that the Triangle Area can continue to maintain the 1997 ozone standard without reliance on emission reductions based upon the use of gasoline with an RVP of 7.8 psi in any of the Triangle Area counties during the high ozone season – June 1 through September 15. EPA is also concluding that the new modeling demonstrates that the Triangle Area would continue to attain the 1997 8-hour ozone standard with the use of gasoline with an RVP of 9.0 psi throughout the Triangle

Area during the high ozone season. Consistent with section 110(l) of the Act, EPA also concludes that the use of gasoline with an RVP of 9.0 psi throughout the Maintenance Plan Areas during the high ozone season would not interfere with other applicable requirements of the Act.

Section 110(l) requires that a revision to the SIP not interfere with any applicable requirement concerning attainment and reasonable further progress (as defined in section 171), or any other applicable requirement of the Act. Because the modeling associated with the current maintenance plan for North Carolina is premised in part upon the 7.8 psi RVP requirements, a request to revise the maintenance plan modeling to no longer rely on the 7.8 psi RVP requirement is subject to the requirements of CAA section 110(l). Therefore, the State must demonstrate that this revision will not interfere with the attainment or maintenance of any of the NAAQS or any other applicable requirement of the CAA.

This section 110(l) non-interference demonstration is a case-by-case determination based upon the circumstances of each SIP revision. EPA interprets 110(l) as applying to all NAAQS that are in effect, including those that have been promulgated but for which the EPA has not yet made designations. The specific elements of the 110(l) analysis contained in the SIP revision depend on the circumstances and emissions analyses associated with that revision. EPA's analysis of North Carolina's March 27, 2013, SIP revision, including review of section 110(l) requirements can be found in the proposed rule published on October 30, 2013, at 78 FR 64896.

This rulemaking approves the State's revision to its existing maintenance plan for the Triangle Area demonstrating that the Area can continue to maintain the standard without relying upon gasoline with an RVP of 7.8 psi being sold in the Triangle area during the high ozone season. Consistent with CAA section 211(h) and the Phase II volatility regulations a separate

rulemaking is required for relaxation of the current requirement to use gasoline with an RVP of 7.8 psi in the Triangle Area.<sup>4</sup> Additionally, the new modeling conducted by North Carolina to account for the requested relaxation of the applicable RVP standard in a portion of the Triangle Area also results in changes to the safety margin associated with the maintenance plan.<sup>5</sup> As such, the North Carolina revision includes a reallocation of the safety margin among the NO<sub>x</sub> MVEBs for the Triangle Area, which EPA is also approving today.

## **V. Final Action**

EPA is approving the State of North Carolina's March 27, 2013, revision to its Maintenance Plan for the Triangle 1997 8-hour Ozone Maintenance Area. Specifically, EPA is approving the State's showing that the Triangle Area can continue to maintain the 1997 ozone standard without emissions reductions associated with the use of 7.8 psi RVP gasoline in the three portions of the Triangle Area currently subject to the 7.8 psi RVP standard during the high ozone season – June 1 through September 15.

EPA is approving the revised and updated modeling submitted by the State, which shows that the Triangle Area can continue to maintain the 1997 ozone standard if the applicable RVP standard in the three portions of the Triangle Area. EPA is also approving the revised NO<sub>x</sub> MVEBs for 2008 and 2017 including the revised and reallocated safety margin among the NO<sub>x</sub> MVEBs for the Triangle Area.

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<sup>4</sup> The decision regarding removal of Federal RVP requirements pursuant to section 211(h) in the Triangle Area includes other considerations evaluated at the discretion of the Administrator. As such, the determination regarding whether to remove the Area from those areas subject to the section 211(h) requirements is made through a separate rule making action.

<sup>5</sup> In addition to a less stringent RVP standard, the new modeling also utilizes updated models for on-road and off-road mobile emission sources.

EPA has determined that North Carolina's March 27, 2013, SIP revision, including the technical demonstration associated with the State's request for the removal of the Federal RVP requirements, and the updated MVEBs are consistent with the applicable provisions of the CAA. Should EPA decide to remove the subject portions of the Triangle Area from those areas subject to the 7.8 psi Federal RVP requirements, such action will occur in a separate, subsequent rulemaking.

## **VI. Statutory and Executive Order Reviews**

Under the CAA, the Administrator is required to approve a SIP submittal that complies with the provisions of the Act and applicable federal regulations. 42 U.S.C. 7410(k); 40 CFR 52.02(a). Thus, in reviewing SIP submissions, EPA's role is to approve state choices, provided that they meet the criteria of the CAA. Accordingly, this action merely approves state law as meeting Federal requirements and does not impose additional requirements beyond those imposed by state law. For that reason, this action:

- is not a "significant regulatory action" subject to review by the Office of Management and Budget under Executive Order 12866 (58 FR 51735, October 4, 1993);
- does not impose an information collection burden under the provisions of the Paperwork Reduction Act (44 U.S.C. 3501 *et seq.*);
- is certified as not having a significant economic impact on a substantial number of small entities under the Regulatory Flexibility Act (5 U.S.C. 601 *et seq.*);
- does not contain any unfunded mandate or significantly or uniquely affect small governments, as described in the Unfunded Mandates Reform Act of 1995 (Public Law 104-4);

- does not have Federalism implications as specified in Executive Order 13132 (64 FR 43255, October 7, 1999);
- is not an economically significant regulatory action based on health or safety risks subject to Executive Order 13045 (62 FR 19885, April 23, 1997);
- is not a significant regulatory action subject to Executive Order 13211 (66 FR 28355, May 22, 2001);
- is not subject to requirements of Section 12(d) of the National Technology Transfer and Advancement Act of 1995 (15 U.S.C. 272 note) because application of those requirements would be inconsistent with the CAA; and
- does not provide EPA with the discretionary authority to address, as appropriate, disproportionate human health or environmental effects, using practicable and legally permissible methods, under Executive Order 12898 (59 FR 7629, February 16, 1994).

In addition, this rule does not have tribal implications as specified by Executive Order 13175 (65 FR 67249, November 9, 2000), because the SIP is not approved to apply in Indian country located in the state, and EPA notes that it will not impose substantial direct costs on tribal governments or preempt tribal law.

The Congressional Review Act, 5 U.S.C. 801 *et seq.*, as added by the Small Business Regulatory Enforcement Fairness Act of 1996, generally provides that before a rule may take effect, the agency promulgating the rule must submit a rule report, which includes a copy of the rule, to each House of the Congress and to the Comptroller General of the United States. EPA will submit a report containing this action and other required information to the U.S. Senate, the U.S. House of Representatives, and the Comptroller General of the United States prior to

publication of the rule in the Federal Register. A major rule cannot take effect until 60 days after it is published in the Federal Register. This action is not a “major rule” as defined by 5 U.S.C. 804(2).

Under section 307(b)(1) of the CAA, petitions for judicial review of this action must be filed in the United States Court of Appeals for the appropriate circuit by [insert date 60 days from date of publication of this document in the Federal Register]. Filing a petition for reconsideration by the Administrator of this final rule does not affect the finality of this action for the purposes of judicial review nor does it extend the time within which a petition for judicial review may be filed, and shall not postpone the effectiveness of such rule or action. This action may not be challenged later in proceedings to enforce its requirements. *See* section 307(b)(2).

#### **List of Subjects in 40 CFR Part 52**

Environmental protection, Air pollution control, Incorporation by reference, Intergovernmental relations, Lead, Nitrogen dioxide, Reporting and recordkeeping requirements and Volatile organic compounds.

Dated: December 18, 2013.

Beverly H. Banister,  
Acting Regional Administrator,  
Region 4.

40 CFR part 52, is amended as follows:

**PART 52--[APPROVAL AND PROMULGATION OF IMPLEMENTATION PLANS]**

1. The authority citation for part 52 continues to read as follows:

Authority: 42 U.S.C. 7401 *et seq.*

**Subpart II—North Carolina**

2. Section 52.1770(e), is amended by adding a new entry for “Supplement Maintenance Plan for the Raleigh-Durham-Chapel Hill, NC 1997 8-hour Ozone Maintenance Area.” at the end of the table to read as follows:

**§ 52.1770 Identification of plan.**

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(e) \* \* \*

**EPA-Approved North Carolina non-regulatory provisions**

<b>Provision</b>	<b>State effective date</b>	<b>EPA approval date</b>	<b>Federal Register citation</b>	<b>Explanation</b>
**	**	*	*	*
Supplement Maintenance Plan for the Raleigh-Durham-Chapel Hill, NC 1997 8-hour Ozone Maintenance Area and RVP Standard.	3/27/2013	[Insert date of publication in <u>Federal Register</u> ]	[Insert citation of publication]	

[FR Doc. 2013-31250 Filed 12/31/2013 at 8:45 am; Publication Date: 01/02/2014]