Note: The following rule is being submitted for publication in the Federal Register. While EPA has taken steps to ensure the accuracy of this Internet version of the rule, it is not the official version. Upon publication in the Federal Register, the official version will be available at http://www.access.gpo.gov/su_docs/aces140.html. When using this site, note that "text" files may be incomplete because they do not include graphics. Instead, select "Adobe Portable Document" or ".pdf" files.

6560-50-P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 51

[FRL-]

RIN 2060-AJ99

Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard

AGENCY: Environmental Protection Agency (EPA).

ACTION: Proposed rulemaking.

SUMMARY: In this document, EPA is proposing two discrete frameworks to implement the 8-hour ozone national ambient air quality standard (NAAQS or standard). We are proposing this rule so that States may know which statutory requirements apply for purposes of developing State implementation plans (SIPs) under the Clean Air Act (CAA) to implement the 8-hour ozone NAAQS. The intended effect of the rule is to provide certainty to States regarding their planning obligations such that States may begin SIP

development upon designation and classification for the 8hour standard. Following are the principles that guided us in the development of these frameworks to implement the 8hour ozone standard: to protect public health, provide incentives for expeditious attainment of the 8-hour ozone standard and avoid incentives for delay; to provide reasonable but expeditious attainment deadlines; to have a basic, straightforward structure that can be communicated easily; to provide flexibility to States and EPA on implementation approaches and control measures while ensuring that the implementation strategy is supported by the CAA; to emphasize national and regional measures to help areas come into attainment and, where possible, reduce the need for those local controls that are more expensive than national and regional measures; and to provide a smooth transition from implementation of the 1-hour ozone NAAQS to implementation of the 8-hour ozone NAAQS. In addition, we intend to clarify the role of Tribes in implementing the 8hour ozone NAAOS.

The two frameworks we are proposing are based on two different classification options, which affect the requirements that would apply to individual nonattainment areas. We prefer classification option 2 because it provides more flexibility to States and Tribes as they

address their unique air quality problems. This is likely to allow some areas to attain the standard at a lower cost. However, we are also soliciting comments on option 1, in part because it is less complex and may be easier to communicate, as well as on other ways to classify nonattainment areas.

This proposed rulemaking does not propose to establish attainment/nonattainment designations nor does it address the principles that will be considered in the designation process; we have already issued guidance on the principles that States should consider in making designation recommendations, and we will issue further guidance separate from this rulemaking if appropriate. Finally, we are not taking comment at this time on appropriate tests under the 8-hour standard for demonstrating conformity of Federal actions to SIPs. We intend to conduct a separate rulemaking on this issue prior to designating areas under the 8-hour ozone standard.

In this proposal, we do not yet propose regulatory text, primarily because a number of options are being proposed for many of the implementation elements, and we believe it would be better to obtain public comment on the options conceptually first. After we receive and consider comment on the proposed options, but before publishing a

final rule, we will issue proposed regulatory text.

DATES: Comments must be received on or before [insert date 60 days from date of publication]. We have scheduled public hearings on this proposal for June 17, 2003, June 19, 2003, and June 27, 2003.

ADDRESSES: All comments should be submitted to Docket #OAR 2003-0079. When mailing documents, comments, or requests to the EPA Docket Center through the U.S. Postal Service, please use the following address: U.S. Environmental Protection Agency, EPA West (Air Docket), 1200 Pennsylvania Avenue, N.W., Room: B108; Mail Code: 6102T, Washington, DC 20460. To mail comments or documents through a courier service, the mailing address is: EPA Docket Center (Air Docket), U.S. Environmental Protection Agency, 1301 Constitution Avenue, N.W., Room: B108; Mail Code: 6102T, Washington, DC 20460. The normal business hours are 8:30 a.m. to 4:30 p.m., Monday through Friday, excluding Federal holidays. Comments can be submitted to the address above, by fax (202) 566-1741, or by e-mail to $\underline{A-and-R-}$ <u>Docket@epa.gov</u>. The voice telephone number is (202) 566-1742. In addition, we have placed a variety of materials regarding implementation options on the web site: www.epa.gov/ttn/naags/ozone/o3imp8hr. While this web site is not an exact duplicate of the Air Docket, we have placed

materials that we have generated and materials that have been submitted in an electronic format on the web site. We request that comments be submitted by e-mail to facilitate expeditious distribution within EPA and placement on the web site.

The public hearings will be held from 8:30 a.m. to 5:00 p.m. at the following locations: Marriott Dallas/Ft. Worth Airport North, 8440 Freeport Parkway, Irving, Texas, 75063, on June 17, 2003; Palace Hotel, 2 New Montgomery Street, San Francisco, California 94105, on June 19, 2003; and Holiday Inn Select Old Town Alexandria, 480 King Street, Alexandria, Virginia 22314, on June 27, 2003. Persons wishing to speak at the public hearings should contact: Ms. Barbara Bauer, E. H. Pechan, at phone number 919) 493-3144 ext. 188 or by email at <u>barbara.bauer@pechan.com</u>. Oral testimony may be limited to 3 to 5 minutes depending on the number of people who sign up to speak. Commenters may also supplement their oral testimony with written comments. The hearing will be limited to the subject matter of the proposal, the scope of which is discussed below. The public hearing schedule, including lists of speakers, will be posted on EPA's web site at http://www.epa.gov/ttn/naags/ozone/o3imp8hr. verbatim transcript of the hearing and written statements will be made available for copying during normal working

hours at the Office of Air and Radiation Docket and Information Center at the above address listed for inspection of documents.

FOR FURTHER INFORMATION CONTACT: Mr. John Silvasi, Office of Air Quality Planning and Standards, U.S. Environmental Protection Agency, Mail Code C539-02, Research Triangle Park, NC 27711, phone number (919) 541-5666 or by e-mail at: silvasi.john@epa.gov or Ms. Denise Gerth, Office of Air Quality Planning and Standards, U.S. Environmental Protection Agency, Mail Code C539-02, Research Triangle Park, NC 27711, phone number (919) 541-5550 or by e-mail at: gerth.denise@epa.gov.

SUPPLEMENTARY INFORMATION:

This notice uses a number of acronyms and terms that are defined when first used. A list appears in appendix D for convenience.

In a number of places, this document refers to time periods (e.g., so many years) after designation or after the designation date. By this, we mean the effective date of designation.

OUTLINE

- I. What is the 8-hour ozone problem and EPA's strategy for addressing it?
 - A. What is the ozone standard and the health problem?
 - B. What is the geographic extent of the 8-hour ozone problem?
 - C. What is EPA's overall strategy for reducing ozone

pollution?

- 1. The SIP system
- 2. National rule.
- D. What is the relationship between the SIP system proposed and the proposed Clear Skies legislation?
- II. What is the background on the 8-hour ozone standard?
 - A. What is the legal background?
 - B. What technical work influenced EPA's implementation approach?
- III. How did EPA obtain stakeholder input for this effort?
- IV. What is EPA's schedule for issuing an 8-hour ozone implementation rule?
- V. In short, what does this proposed rulemaking contain?
 - A. Classification of areas
 - B. Attainment deadlines
 - C. How will EPA implement the transition from the 1-hour to the 8-hour standard in a way to ensure continued momentum in States' efforts toward cleaner air?
 - D. Mandatory measures
 - E. Consequences of failure to attain
 - F. Interstate transport
 - G. Modeling and attainment demonstration
 - H. Reasonable Further Progress (RFP)
 - 1. Requirement for 15 percent VOC reductions for moderate and above areas during the first 6 years after the base year
 - 2. Base year
 - I. RACM/RACT
 - J. Conformity
 - K. New Source Review
- VI. What are EPA's proposed frameworks for implementing the 8-hour ozone standard?
 - A. How will EPA reconcile subparts 1 and 2? How will EPA classify nonattainment areas for the 8-hour standard? What attainment dates would apply?
 - 1. Statutory framework and Supreme Court decision
 - 2. EPA's development of options
 - 3. Options for classification
 - 4. Under classification option 2, how would EPA classify subpart 1 areas?
 - 5. Rationale for regulating all "gap" areas under subpart 1 only

- 6. Proposed incentive feature
- 7. Other options EPA considered
- 8. Implications for the options
- 9. Other considerations
- B. How will EPA treat attainment dates and other dates including SIP submittal dates for the 8-hour ozone standard?
 - 1. Background
 - 2. How will EPA address the provision regarding 1-year extensions?
 - 3. How do attainment dates apply to Indian country?
 - 4. How will EPA establish attainment dates for areas classified as marginal under the "incentive" feature proposed under the classification section or areas covered under subpart 1 with a requested attainment date of 3 years or less after the designation date?
- C. How will EPA implement the transition from the 1-hour to the 8-hour standard in a way to ensure continued momentum in States' efforts toward cleaner air?
 - 1. Background
 - 2. When will EPA revoke the 1-hour standard?
 - 3. What obligations should continue to apply as an area begins to implement the 8-hour ozone NAAQS and what obligations should no longer apply?
 - 4. Does the requirement for continued implementation of the obligations addressed above expire at some point?
 - 5. How will EPA ensure that the public knows which areas must continue provisions under the 1-hour SIPs if EPA revokes the 1-hour standard?
- D. Should prescribed requirements of subpart 2 apply in all 8-hour nonattainment areas classified under subpart 2, or is there flexibility in application in certain narrowly defined circumstances?
 - 1. Background
 - 2. Approach being proposed
 - 3. Other approaches considered
- E. What is the required timeframe for obtaining emissions reductions to ensure attainment by the attainment date?
- F. How will EPA address long-range transport of ground-level ozone and its precursors when implementing the 8-hour ozone standard?
 - 1. Background
 - 2. The EPA's anticipated approach

- 3. Other concerns about transport
- 4. Other options considered
- G. How will EPA address transport of ground-level ozone and its precursors for rural nonattainment areas, multi-State nonattainment areas, areas affected by intrastate transport, and international transport?
 - 1. Rural transport nonattainment areas
 - 2. Multi-state nonattainment areas
 - 3. Intrastate transport
 - 4. International transport
 - 5. Additional ways of addressing transport
 - 6. State-Tribal transport
- H. How will EPA address requirements for modeling and attainment demonstration SIPs when implementing the 8-hour ozone standard?
 - 1. Multi-pollutant assessments (one-atmosphere modeling)
 - 2. Areas with early attainment dates
 - 3. Areas with later attainment dates
 - 4. Modeling guidance
 - 5. Mid-Course review
- I. What requirements for RFP should apply under the 8-hour ozone standard?
 - 1. Background
 - 2. Proposed features in general
 - 3. For subpart 2 areas, should the initial 15 percent RFP requirement be limited to VOC emissions?
 - 4. What baseline year should be required for the emission inventory for the RFP requirement?
 - 5. Should moderate areas be subject to prescribed additional RFP requirements prior to their attainment date?
 - 6. What is the timing of the submission of the ROP plan?
 - 7. How should CAA restrictions on creditable measures be interpreted? Which national measures should count as generating emissions reductions credit toward RFP requirements?
 - 8. For areas covered by subpart 1 instead of subpart 2, how should the RFP requirement be structured?
 - 9. How should the RFP requirements be implemented for areas designated for the 8-hour ozone standard that entirely or in part encompass an area that was designated nonattainment for the 1-hour ozone standard?
 - 10. Will EPA's "Clean Data Policy" continue to

- apply under the 8-hour standard for RFP?
- 11. How will RFP be addressed in Tribal areas?
- 12. How will RFP targets be calculated?
- J. Are contingency measures required in the event of failure to meet a milestone or attain the 8-hour ozone NAAOS?
 - 1. Background
 - 2. Proposal
- K. What requirements should apply for RACM and RACT for 8-hour ozone nonattainment areas?
 - 1. Background
 - 2. Proposed approach for RACT in general for areas covered under subpart 2
 - 3. Proposed approach for RACT in general for areas covered under subpart 1
 - 4. Proposed approach for previous source-specific major source RACT determinations
 - 5. Proposed approach for NO_{x} RACT determinations in areas affected by the NO_{x} SIP Call
 - 6. Proposed approach for $\ensuremath{\text{NO}_x}$ as an ozone precursor
 - 7. Proposed approach for RACM
 - 8. Proposed submission date for RACT and RACM requirements
- L. How will the section 182(f) NO_x provisions be handled under the 8-hour ozone standard?
- M. What aspects of transportation conformity and the 8-hour ozone standard are addressed in this proposal?
 - 1. What is transportation conformity?
 - 2. Why is EPA discussing transportation conformity in this proposed rulemaking?
 - 3. Are any changes being made to transportation conformity in this proposed rulemaking?
 - 4. When does transportation conformity apply to 8-hour ozone nonattainment areas?
 - 5. How does the 1-year grace period apply in metropolitan areas?
 - 6. How does the 1-year grace period apply in "donut" areas?
 - 7. How does the 1-year grace period apply in isolated rural areas?
 - 8. Does conformity apply for the 1-hour ozone standard once the 1-hour ozone standard is revoked?
 - 9. What are EPA's plans for amending the conformity rule to address the 8-hour ozone standard?
 - 10 What impact will the implementation of the 8-

hour ozone standard have on a State's Transportation Conformity SIP?

- 11 What other parts of this proposal could affect transportation conformity determinations?
- N. What requirements for General Conformity should apply to the 8-hour ozone standard?
 - 1. What is the purpose of the General Conformity regulations?
 - 2. How is the General Conformity program currently structured?
 - 3. Who runs the General Conformity program?
 - 4. How does an agency demonstrate conformity?
 - 5. General Conformity regulation revisions for the 8-hour ozone standard
 - 6. How does the 1-year grace period apply to General Conformity determinations?
- O. How should the NSR Program be implemented under the 8-hour ozone NAAQS?
 - 1. Background
 - 2. Nonattainment NSR under the 8-hour ozone standard
 - 3. Under what circumstances is a transitional program needed during the interim period?
 - 4. Elements of the Appendix S transitional program
 - 5. Will a State be required to assure that the increased emissions from a new major source do not cause or contribute to a violation in a nearby nonattainment area before it issues a preconstruction permit under Appendix S?
 - 6. What happens at the end of the interim period?
 - 7. What is the legal basis for providing this transitional program?
 - 8. How should the NSR requirements be implemented for new 8-hour ozone areas that encompass the old 1-hour ozone nonattainment areas after EPA revokes the 1-hour ozone standard?
 - 9. NSR option to encourage development patterns that reduce overall emissions--Clean Air Development Communities
 - 10. Tribal concerns
- P. How will EPA ensure that the 8-hour ozone standard will be implemented in a way which allows an optimal mix of controls for ozone, $PM_{2.5}$, and regional haze?
 - 1. Could an area's 8-hour ozone strategy affect its $PM_{2.5}$ and/or regional haze strategy?
 - 2. What guidance has EPA provided regarding ozone, $PM_{2.5}$ and regional haze interaction?

- 3. What is EPA proposing?
- Q. What emission inventory requirements should apply under the 8-hour ozone NAAQS?
- R. What guidance should be provided that is specific to Tribes?
- S. What are the requirements for OTRs under the 8-hour ozone standard?
- T. Are there any additional requirements related to enforcement and compliance?
- U. What requirements should apply to emergency episodes?
- V. What ambient monitoring requirements will apply under the 8-hour ozone NAAQS?
- W. When will EPA require 8-hour attainment demonstration SIP submissions?
 - 1. Background
 - 2. Option being proposed
- VII. Proposal of integrated frameworks using various options
- VIII. Other Considerations
 - A. Will EPA be contemplating incentives for areas that want to take early action for reducing ozone under the 8-hour standard?
 - 1. What are the Ozone Flex Guidelines for the 1-hour ozone NAAQS?
 - 2. What is the "Early Action Compact" for implementing the 8-hour ozone NAAQS?
 - 3. What is EPA's response to the Texas "Early Action Compact?"
 - 4. Did EPA consider other options for incentives for areas that take early actions for reducing ozone?
 - 5. What is the difference between the early action compact program and the transitional NSR program?
 - B. Clarification of how transition from 1-hour to 8-hour standard will work for early action compact areas, for conformity, and for NSR and PSD.
 - C. How will EPA's proposal affect funding under the Congestion Mitigation and Air Quality Improvement (CMAQ) Program?
 - D. Are there any environmental impact differences between the two major classification options being proposed?
- IX. Statutory and Executive Order Reviews

- A. Executive Order 12866: Regulatory Planning and Review
- B. Paperwork Reduction Act
- C. Regulatory Flexibility Act
- D. Unfunded Mandates Reform Act
- E. Executive Order 13132: Federalism
- F. Executive Order 13175: Consultation and Coordination with Indian Tribal Governments
- G. Executive Order 13045: Protection of Children from Environmental Health and Safety Risks
- H. Executive Order 13211: Actions That Significantly Affect Energy Supply, Distribution, or Use
- I. National Technology Transfer Advancement Act
- J. Executive Order 12898: Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations

X. Appendices

Appendix A--Comparison of Subpart 1 & 2 Requirements

Appendix B--"Applicable Requirements" under Subpart 2

Appendix C--Comparison of Transitional NSR and Early Action Compact Programs

Appendix D-Glossary of Terms and Acronyms

Appendix E--Application of Conformity, New Source Review and Prevention of Significant Deterioration under Various Transition Cases

I. WHAT IS THE 8-HOUR OZONE PROBLEM AND EPA'S STRATEGY FOR ADDRESSING IT?

A. What is the ozone standard and the health problem?

Ground-level ozone pollution is formed by the reaction of volatile organic compounds (VOC) and nitrogen oxides (NO $_{\rm x}$) in the atmosphere in the presence of sunlight. These two pollutants, often referred to as ozone precursors, are emitted by many types of pollution sources, including onroad and off-road motor vehicles and engines, power plants and industrial facilities, and smaller "area" sources.

In 1979, we promulgated the 0.12 ppm, 1-hour ozone

standard, (44 FR 8202, February 8, 1979). On July 18, 1997, we promulgated a revised standard of 0.08 ppm, measured over an 8-hour period (i.e., the 8-hour standard). In general, the 8-hour standard is more protective of public health and more stringent than the 1-hour standard, and there are more areas that do not meet the 8-hour standard than there are areas that do not meet the 1-hour standard. At the time that we promulgated the revised 8-hour standard, we also promulgated a rule providing for the phase-out of the 1-hour standard, (62 FR 38856 (codified at 50.9(b)). That rule provided that the 1-hour standard would no longer apply to an area once we determined that the area had attained the 1-hour standard.

Ozone can irritate the respiratory system, causing coughing, throat irritation, and/or uncomfortable sensation in the chest. Ozone can reduce lung function and make it more difficult to breathe deeply, and breathing may become more rapid and shallow than normal, thereby limiting a person's normal activity. Ozone also can aggravate asthma, leading to more asthma attacks that require a doctor's

¹Due to the continued litigation over the 8-hour standard, EPA revised 40 CFR 50.9(b) in July 2000, to limit its authority to revoke the 1-hour standard until such time as the 8-hour standard became fully enforceable and no longer subject to legal challenge. (65 FR 45182, July 20, 2000).

attention and/or the use of additional medication. In addition, ozone can inflame and damage the lining of the lungs, which may lead to permanent changes in lung tissue, irreversible reductions in lung function, and a lower quality of life if the inflammation occurs repeatedly over a long time period (months, years, a lifetime). People who are particularly susceptible to the effects of ozone include children and adults who are active outdoors, people with respiratory disease, such as asthma, and people with unusual sensitivity to ozone.

More detailed information on health effects of ozone can be found at the following web site:

http://www.epa.gov/ttn/naaqs/standards/ozone/s_o3_index.html

The focus of today's proposed rule is implementation of the revised 8-hour ozone air quality standard issued by EPA in 1997, including the transition from implementation of the 1-hour standard to implementation of the 8-hour standard.

B. What is the geographic extent of the 8-hour ozone problem?

Although the nation as a whole has made significant progress since 1970 in reducing ground-level ozone pollution (sometimes called "smog"), ozone remains a significant public health concern. At present, unhealthy ozone levels-

exceeding the 8-hour standard--occur over wide geographic areas including most of the nation's major population centers. These areas include much of the eastern half of the United States and large areas of California.

The geographic extent of the 8-hour ozone problem is expected to shrink between now and 2020 due to existing regulatory requirements. We estimate that existing control measures (e.g., Federal motor vehicle standards, EPA's regional NO_x rule known as the NO_x SIP Call, and local measures already adopted under the CAA) will dramatically reduce the number of areas² not attaining the 8-hour ozone standard--from 122 in 2000 (using data from 1998, 1999, and 2000), to 51 in 2007, to 30 in 2010 and 13 in 2020. See

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²See discussion below on how EPA has developed hypothetical nonattainment areas for purposes of analysis of this proposed rulemaking and options. Modeling analyses for projections to 2007 are found in: U.S. Environmental Protection Agency, Office of Air and Radiation, Technical Support Document for the Heavy-Duty Engine and Vehicle Standards and Highway Diesel Fuel Sulfur Control Requirements: Air Quality Modeling Analyses. EPA420-R-00-028. December 2000. Located at: http://www.epa.gov/otag/regs/hd2007/frm/r00028.pdf.

Information on the modeling analyses for projections to 2010 and 2020 are found in "Technical Addendum: Methodologies for the Benefit Analysis of the Clear Skies Initiative." September 2002. This can be found at the following web site:

http://www.epa.gov/clearskies/Tech_adden.PDF. Results are summarized in "Human Health and Environmental Benefits Achieved by the Clear Skies Initiative." July 1, 2002. http://www.epa.gov/clearskies/CSIhealth env benefits7-01.ppt

Table 1 below.

The total population living in areas that we have hypothesized may be designated nonattainment is also projected to decline over time--from 178 million in 2000, to 143 million in 2007, to 116 million in 2010, to 82 million in 2020. However, the number of people living in areas with excessive ozone levels remains high for the foreseeable future because existing control programs alone will not eliminate unhealthy ozone levels in some of the nation's largest population centers.

Based on information in EPA's Trends Report issued in 2002, over the past 20 years, national ambient ozone levels decreased 18 percent based on 1-hour data and 11 percent based on 8-hour data. Between 1982 and 2001, emissions of VOCs decreased 16 percent. During that same time period, emissions of NO_x increased 9 percent. For the period 1982 to 2001, the downward trend in 1-hour ozone levels seen nationally is reflected in every broad geographic area in the country. The Northeast and West exhibited the most substantial improvement, while the South and North Central

³Latest Findings on National Air Quality--2001 Status and Trends. U.S. EPA; Office of Air Quality Planning and Standards; Emissions, Monitoring and Analysis Division; Research Triangle Park, NC. September 2002. EPA 454/K-02-001. Found at: http://www.epa.gov/airtrends/ozone.html.

regions experienced the least rapid progress in lowering ozone concentrations. Similar to the 1-hour ozone trends, all regions experienced improvements in 8-hour ozone levels between 1982 and 2001 except the North Central region, which showed little change during this period. Again, the West and Northeast have exhibited the most substantial reductions in 8-hour ozone levels for the past 20 years.

TABLE 1

8-HOUR OZONE HYPOTHETICAL NONATTAINMENT AREAS AND POPULATION (projected by modeling)

Note: The number of areas¹ projected to each future year is based on modeled projections without consideration of application of new emission control measures that would be required under the SIP process for areas designated nonattainment for the 8-hour NAAQS.

	2000	2007	2010	2020
Number of areas-base case (without Clear Skies Act controls)	122	51	30	13
Number of areas with Clear Skies Act controls	122	51	24	12
Population (millions)-base case (without Clear Skies Act controls)	178	143	116	82.4
Population (millions) - with Clear Skies Act controls	178	143	103	82.1

¹See discussion below on how we have developed hypothetical nonattainment areas for purposes of analysis of this proposed rulemaking and options.

C. What is EPA's overall strategy for reducing ozone pollution?

Our overall strategy for achieving the 8-hour ozone standard is based on the structure outlined in the CAA. The CAA gives both the States and EPA important roles in implementing national air quality standards.

States have primary responsibility for developing and implementing SIPs that contain local and in-State measures needed to achieve the air quality standards in each area. We assist States by providing technical assistance and guidance, including guidance on control measures. In addition, we set national emissions limits for sources such as motor vehicles. Where upwind sources contribute to downwind problems in other States, we can also ensure that the upwind States address these contributing emissions or regulate them federally, where a State fails to act to address them.

We intend to work closely with States and Tribes to use an appropriate combination of national, regional and local pollution reduction measures to meet the standard expeditiously and in a cost-effective manner.

1. The SIP system

States use the SIP process to identify the emissions sources that contribute to the nonattainment problem in a

particular area, and to select the emissions reductions measures most appropriate for that area, considering costs and a variety of local factors. Under the CAA, SIPs must ensure that areas reach attainment as expeditiously as practicable. However, other programs, such as Federal controls, also provide reductions, and States may rely on those reductions when developing their attainment plans.

The SIP system for nonattainment areas is an important component of the CAA's overall strategy for meeting the 8-hour ozone standard, but it is not the only component. As noted below, the CAA also requires or anticipates the use of national rules that will reduce emissions and help achieve cleaner air.

2. National rules

For the States to be successful in developing local plans showing attainment of standards, EPA must do its part to control the sources that are more effectively and efficiently controlled at the national level and to ensure that interstate transport is addressed through SIPs or other means. We already have issued key national and regional control requirements for motor vehicles, power plants and other sources that will enable many areas to meet the 8-hour standard in the near term.

Current emissions standards for new cars, trucks and

buses are reducing motor vehicle emissions of VOCs (sometimes referred to as hydrocarbons) and NO_x as older vehicles are retired. Other rules are reducing emissions from several categories of non-road engines. The EPA's Tier 2 motor vehicle emission standards, together with the associated sulfur in gasoline requirements, will provide additional benefits nationally within the time period of many 8-hour ozone nonattainment areas' anticipated attainment dates (65 FR 6698, February 10, 2000). Also, we published the heavy duty diesel rule on January 18, 2001 (66 FR 5002), which will contribute to reductions needed to meet the 8-hour ozone standard in areas with later attainment dates.

In the eastern U.S., dramatic reductions in NO_x emissions from power plants and large industrial sources will occur by May 2004 under our rules to reduce interstate transport of ozone pollution in the East. These rules are the NO_x SIP Call, published October 27, 1998 (63 FR 57356), and the Section 126 Rule, published January 18, 2000 (65 FR 2674).

Also, under the requirements of section 183(e) of the CAA, we are contemplating either Federal rules or control techniques guidelines (CTGs) for controlling VOCs from 15 additional categories of consumer and commercial products.

The CTGs assist States in determining required controls for facilities in nonattainment areas. The 15 categories are in addition to six CTGs already published under this provision of the CAA (consumer products, architectural coatings, automobile refinishing coatings, aerospace coatings, wood furniture coatings, and shipbuilding and ship repair coatings). These additional rules or CTGs are expected to be completed over the next few years.

Control measures targeting hazardous air pollutants (HAPs) also result in control of VOCs and, in some cases, NO_{x} . Under section 112 of the CAA, EPA was required to identify and list categories of industrial facilities that emit significant quantities of one or more of 188 HAPs and establish maximum achievable control technology (MACT) standards for each category of sources. Because most of the organic HAPs are also VOCs, in many cases, control of organic HAP emissions also achieves reductions in VOC emissions.

Rules for most of the listed MACT categories have been promulgated. Although many of the earlier promulgated rules have already resulted in emissions reductions of VOCs, the more recent rules will not begin achieving reductions until the compliance date, which is generally 3 years following promulgation. Therefore, the amount of reductions achieved

through control of HAPs that are VOCs will continue to grow over the next several years.

We see the potential for significant further emissions reductions from power plants and non-road engines at the national level. The Administration has proposed nationwide legislation, the "Clear Skies Act" (CSA), to reduce power plant emissions of NO_x nationwide, as well as sulfur dioxide and mercury. We are also proposing a national rule that would significantly reduce NO_x emissions from non-road diesel-powered equipment. These non-road sources constitute an important fraction of the NO_x emissions inventory.

D. What is the relationship between the SIP system proposed and the proposed Clear Skies legislation?

A basic issue for implementation of the 8-hour ozone standard is how to treat areas projected to attain the standard based on existing controls. We believe that an appropriate balance should be struck between two goals: avoiding requirements for unnecessary additional controls that increase cost, and ensuring expeditious attainment to protect public health.

Today's proposal contains options that strive to balance these two goals under the authority of current law. The proposal contains two options for classifying areas under the 8-hour ozone standard. Both options contain

features to ensure that areas projected to attain in the near term based on existing requirements are not subject to additional prescribed control obligations. Of course, these areas would be subject to the same requirements that apply to all areas designated nonattainment, such as new source review (NSR) and conformity. However, we are considering options for providing for more flexible implementation of these requirements, as described elsewhere in this proposed rulemaking, and are actually proposing an option related to NSR in this proposed rulemaking.

The proposed Clear Skies legislation takes a different approach to requirements for areas projected to attain through controls that are already mandated. The proposed CSA includes a provision that would create a new designation of "transitional" for areas that are projected to attain by 2015 based on existing controls, or with the aid of additional SIP controls approved by December 31, 2004. The proposed CSA provides that areas designated transitional would be subject to the requirements of the prevention of significant deterioration (PSD) program for new sources, which applies in attainment areas. Because "transitional" would be the designation for such areas, they would not be required to adopt additional control measures that would be required for areas designated nonattainment, nor would they

be subject to conformity provisions. The provision includes a mid-course check to ensure that the area remains on-track toward attainment. In case of failure to attain by 2015, the area would be re-designated as a nonattainment area and would be subject to the nonattainment area requirements. We expect that most areas currently exceeding the 8-hour ozone standard could qualify for this designation, in many cases, without further local controls.

However, because the Clear Skies legislation has not been enacted, we have not considered it in this proposed rulemaking. Should the Clear Skies legislation be enacted into law, we would conduct further rulemaking on implementation of the 8-hour ozone standard under such law, if necessary.

II. WHAT IS THE BACKGROUND ON THE 8-HOUR OZONE STANDARD?

A. What is the legal background?

On July 18, 1997, we revised the ozone NAAQS (62 FR 38856) by promulgating an ozone standard of 0.08 parts per million (ppm) as measured over an 8-hour period. At that time, we indicated that we believed that the 8-hour ozone NAAQS should be implemented under the less detailed requirements of subpart 1 of part D of title I of the CAA rather than the more detailed requirements of subpart 2. Various industry groups and States challenged EPA's final

rule promulgating the 8-hour ozone NAAQS in the U.S. Court of Appeals for the District of Columbia Circuit. 4 In May 1999, the Appeals Court remanded the ozone standard to EPA on the basis that our interpretation of its authority under the standard-setting provisions of the CAA resulted in an unconstitutional delegation of authority. American Trucking Assns., Inc. v. EPA, 175 F.3d 1027, 1034-1040 (ATA I) aff'd, 195 F.3d 4 (D.C. Cir., 1999) (ATA II). In addition, the Court held that the CAA clearly provided for implementation of a revised ozone standard under subpart 2, not subpart 1. Id. at 1048-1050. We sought review of these two issues in the U.S. Supreme Court. In February 2001, the Supreme Court held that EPA's action in setting the NAAQS was not an unconstitutional delegation of authority. Whitman v. American Trucking Assoc., 121 S.Ct. 903, 911-914 (2001) (Whitman). In addition, the Supreme Court held that the D.C. Circuit incorrectly determined that the CAA was clear in requiring implementation only under subpart 2, but determined that our implementation approach, which did not

⁴ On July 18, 1997, we also promulgated a revised particulate matter (PM) standard (62 FR 38652). Litigation on the PM standard paralleled the litigation on the ozone standard and the court issued one opinion addressing both challenges. However, issues regarding implementation of the revised PM NAAQS were not litigated.

⁵The Court addressed a number of other issues, which are not relevant here.

provide a role for subpart 2 in implementing the 8-hour NAAOS, was unreasonable. Id. at 916-919. Specifically, the Court noted we could not ignore the provisions of subpart 2 that "eliminate[] regulatory discretion" allowed by subpart Id. at 918. The Court also identified several portions of the CAA's classification scheme under subpart 2 that are "ill-fitted" to the revised standard and remanded the implementation strategy to EPA to develop a reasonable approach for implementation. Id. Because the D.C. Circuit had not addressed all of the issues raised in the underlying case, the court remanded the case to the D.C. Circuit for disposition of those issues. Id. at 919. On March 26, 2002, the D.C. Circuit Court rejected all remaining challenges to the ozone and fine particle $(PM_{2,5})$ standards. American Trucking Assoc. v. EPA, 283 F.3d 355 (D.C. Cir. 2002) (ATA III). With that ruling, EPA began to move forward with programs to protect Americans from the wide variety of health problems that these air pollutants can cause, such as respiratory illnesses and premature death.

The implementation rule proposed herein will provide specific requirements for State, local, and Tribal air pollution control agencies to address as they prepare implementation plans to attain and maintain the 8-hour NAAQS. Each State with an area that is not attaining the 8-

hour ozone NAAQS will have to develop—as part of its SIP—emission limits and other requirements to attain the NAAQS within the timeframes set forth in the CAA. Tribes with jurisdiction over Tribal lands that are not attaining the 8-hour ozone standard could voluntarily submit a Tribal implementation plan (TIP) but would not be required to do so. However, in cases where a TIP is not submitted, EPA, working with the Tribes, would have the responsibility for planning in those areas.

B. What technical work influenced EPA's implementation approach?

In developing our original approach for implementation of the 8-hour standard, we considered input from a variety of technical information sources and experts. We originally described the technical information of the physical processes that produce ozone, fine particles, and regional haze and relied on that in developing a proposed implementation approach. See "Implementation of New or Revised Ozone and Particulate Matter (PM) National Ambient Air Quality Standards (NAAQS) and Regional Haze Regulations; Proposed Rule" (December 13, 1996, 61 FR 65764). We also participated with States in the eastern United States in the

⁶ The CAA requires EPA to set ambient air quality standards and requires States to submit SIPs to implement those standards.

Ozone Transport Assessment Group (OTAG), which documented that long-distance transport of nitrogen oxides across much of the OTAG study area contributed to high levels of ozone. For background on OTAG and the results from the study, see the following web site:

http://www.epa.gov/ttn/naaqs/ozone/rto/otag/index.html.

That OTAG process resulted in a report to EPA with the conclusions that included the following:

- -Regional NO_x reductions are effective in producing ozone benefits; the more NO_x reduced, the greater the benefit.
- -Ozone benefits are greatest where emissions reductions are made; benefits decrease with distance.
- -Elevated and low-level NO_x reductions are both effective.
- -Volatile organic compound controls are effective in reducing ozone locally and are most advantageous to urban nonattainment areas.
- -Air quality data indicate that ozone is pervasive, that ozone is transported, and that ozone aloft is carried over and transported from one day to the next.

As a result of these recommendations, EPA called for SIP revisions from 22 States and the District of Columbia and established Statewide budgets on NO_x emissions that those jurisdictions would have to meet by 2007. Stationary source emissions reductions to meet the budgets were

required to be implemented by May 2004^7 . The purpose of the rule was to address long-range transport by eliminating the significant contribution that each State's NO_x emissions made to both 1-hour and 8-hour ozone nonattainment problems in downwind areas. The call for SIP revisions was challenged by a number of States, industry and interest groups but was largely upheld by the court and has remained a viable means for obtaining significant NO_x emissions reductions.

The OTAG report also recognized that VOC emissions reductions do not play much of a role in long-range transport, and concluded that VOC reductions are effective in reducing ozone locally and are most advantageous to urban nonattainment areas.

Under the Federal Advisory Committee Act (FACA), we also formed a Subcommittee for Development of Ozone, Particulate Matter and Regional Haze Implementation Programs that provided recommendations and ideas to assist us in developing implementation approaches for these programs. We have incorporated ideas from the FACA process for a number of SIP elements, particularly those related to transport of ozone, the process for demonstrating attainment of the ozone

 $^{^7} The\ EPA's\ NO_x$ SIP Call mandated reductions by May 2003. However, the Court's stay of the rule pending litigation resulted in a 1-year delay to May 2004.

standard, and requirements for ensuring reasonable further progress. Further information on the FACA process and its reports is found at the following web site:

http://www.epa.gov/ttn/faca/.

As noted above, we have also promulgated national rules that reduce VOC and NO_{x} emissions (ozone precursors) from mobile and stationary sources, which also help address ozone nonattainment problems. A number of commenters recommended that we set additional national standards for more source categories such that States and Tribes do not have to control these sources locally. They suggest that such standards would eliminate the inconsistent regulation that occurs when each nonattainment area chooses how to regulate sources within its jurisdiction. We continue to review source categories for possible Federal measure development.

This technical backdrop led us to be guided by the principle of emphasizing national and regional measures to help areas come into attainment and, where possible, reducing the need for those local controls that are more expensive than national and regional measures. However, as noted below, national and regional measures alone are not anticipated to bring all areas into attainment. Thus, some areas will need to adopt local controls through the SIP process.

III. HOW DID EPA OBTAIN STAKEHOLDER INPUT FOR THIS EFFORT?

We initiated a process to obtain stakeholder feedback on options the Agency developed for implementation of the 8-hour ozone NAAQS. We held three public meetings in addition to a number of conference calls and meetings with State, local and Tribal governments, environmental groups and industry representatives. (The lists of the organizations with whom we had discussions are in the docket, in addition to meeting and conference call summaries.) The purpose of the meetings and conference calls was to obtain stakeholder feedback regarding the options that we had developed as well as to listen to any new or different ideas that stakeholders were interested in presenting.

We received comments in response to the meetings and conference calls. The comments from the public meetings addressed a number of issues related to the implementation approach.

In addition to comments received at the public meetings, we received a number of written comments on how to implement the 8-hour ozone NAAQS. We have considered these comments in the implementation approach proposed below.

IV. WHAT IS EPA'S SCHEDULE FOR ISSUING AN 8-HOUR OZONE IMPLEMENTATION RULE?

We plan to issue a final rule on an implementation

approach by the end of 2003. While there is not a CAA deadline for promulgating a strategy to implement the 8-hour ozone NAAQS, the CAA does establish a deadline for EPA to promulgate designations of nonattainment areas under section 107 of the CAA.⁸ We have entered into a consent decree that requires us to promulgate designations by April 15, 2004.⁹

The nonattainment designation for an area starts the process whereby a State must develop a SIP that demonstrates how the air quality standard will be attained by the attainment dates required in the CAA. We plan to have an implementation strategy in place prior to designating areas for the 8-hour ozone standard. This will enable areas that are designated nonattainment for the 8-hour ozone standard to understand the obligations that attach to nonattainment designations and associated classifications.

V. IN SHORT, WHAT DOES THIS PROPOSED RULEMAKING CONTAIN?

This summary is intended to give an overview of our

^{*}Section 107(d) of the CAA sets forth a schedule for designations following the promulgation of a new or revised NAAQS. The Transportation Equity Act for the Twenty-first Century (TEA-21) revised the deadline to publish nonattainment designations to provide an additional year (to July 2000), but HR3645 (EPA's appropriation bill in 2000) restricted EPA's authority to spend money to designate areas until June 2001 or the date of the Supreme Court ruling on the standard, whichever came first.

⁹American Lung Association v. EPA (D.D.C. No.
1:02CV02239).

proposed rule. It should not be relied on for the details of the actual proposal. The proposed rule described in Section VI. below should be consulted directly. The order in which issues are described in this summary does not match exactly the order these issues are discussed in the actual proposal.

A. <u>Classification of areas</u>

Under the CAA, an ozone nonattainment area's classification determines the minimum measures that must be included in the area's SIP for meeting the 8-hour standard and the maximum time period allowed for the area to meet the standard. We are proposing two options for classifying areas.

Under option 1, all areas would be classified under subpart 2 according to 8-hour ozone levels. As a result, all areas would be classified as marginal, moderate, serious, or severe or extreme (based on the most recent air quality data, no areas would fall in the "extreme" classification), and would be subject to control requirements specified in the CAA for each classification.

Under option 2, more than half the nonattainment areas would likely be regulated under subpart 1. All of these would be areas meeting the 1-hour ozone standard. The rest of the areas--those exceeding, and a few that may be meeting

the 1-hour standard--would be classified under subpart 2 in the same manner as option 1.

We are also proposing an "incentive feature" that would allow areas to qualify for a lower classification under subpart 2 than their air quality would dictate if they demonstrate they will attain by the earlier attainment date of a lower classification. For example, an area that would be classified "moderate" could qualify for a "marginal" classification by showing it will attain within 3 years of designation. The "incentive feature" is proposed for use in conjunction with either classification option.

B. Attainment deadlines

We are proposing that for areas classified under subpart 2, the periods for attainment (running from the date of designation/classification) would be 3 years for marginal areas, 6 years for moderate areas, 9 years for serious areas, and 15 years for severe-15 areas, and 17 years for severe-17 areas.

If classification option 2 were selected, some areas would be classified under subpart 1. Attainment dates for these areas would be no later than 5 years after designation, although they could be extended up to 10 years after designation depending on the severity of the area's air pollution and the availability and feasibility of

pollution control measures.

For all areas, the CAA requires each plan to be designed to meet the standard as expeditiously as practicable, regardless of the maximum statutory period specified for attainment.

C. How will EPA implement the transition from the 1-hour to the 8-hour standard in a way to ensure continued momentum in States' efforts toward cleaner air?

This section discusses which obligations would remain in effect for areas that were designated nonattainment under the 1-hour ozone NAAQS on or after November 15, 1990, as areas begin to implement the 8-hour standard. It also proposes two alternatives for revoking the 1-hour ozone standard: revocation in whole and revocation in part.

1. Areas designated nonattainment under the 8-hour standard. We are proposing that all areas designated nonattainment for the 8-hour ozone NAAQS remain subject to certain obligations that applied by virtue of the area's classification for the 1-hour standard where the area's 1-hour classification was higher than the area's classification for the 8-hour standard. These obligations include, major source thresholds, inspection and maintenance (I/M) programs and fuel programs. However, these obligations would not apply to portions of an 8-hour ozone

nonattainment area that was not a part of a 1-hour ozone nonattainment area. We believe that Congress intended these requirements to continue to apply to areas as they move forward to address an ozone NAAQS. We are soliciting comment whether areas that have not yet met the attainment demonstration obligation for the 1-hour standard should remain obligated to submit a 1-hour ozone attainment demonstration.

2. Areas designated attainment under the 8-hour standard. Since attainment areas are subject to PSD, not nonattainment NSR, we propose that these areas would not remain subject to the nonattainment NSR offset and major source thresholds that might otherwise apply due to their classification for the 1-hour standard. However, we are proposing that control obligations that applied based on an area's 1-hour classification would remain. We are proposing that these areas are obligated to submit a maintenance plan under section 110(a)(1). Consistent with EPA's "Clean Data Policy," we are proposing that these areas not be required to meet outstanding attainment demonstration and rate-ofprogress (ROP) requirements, so long as they remain in attainment. However, if the area violates the 8-hour standard and does not have an approved maintenance plan for the 8-hour standard under section 110(a)(1), those

obligations will once again apply. We are proposing that these areas would need contingency measures in their section 110(a)(1) maintenance plans. However, unlike contingency measures under section 175A, these contingency measures need not include an obligation to implement all control obligations in the previously approved SIP. For all areas designated attainment for the 8-hour ozone NAAQS the requirement to demonstrate conformity to the 1-hour standard would no longer apply once the 1-hour standard is revoked or determined not to apply for that purpose.

- 3. Concerning the NO_x SIP Call. We are proposing that States must continue to adhere to the emission budgets established by the NO_x SIP Call after the 1-hour standard is revoked in whole or in part. Similarly, we are not proposing to revoke or modify the section 126 regulation.
- 4. Obligations under part D of title I of the CAA that would not continue to apply. We are proposing that areas would not be obligated to continue to demonstrate conformity for the 1-hour standard once the 1-year grace period for application of conformity for the 8-hour standard has elapsed. We are also proposing that we would no longer make findings of failure to attain the 1-hour standard and, therefore, also would not reclassify areas to a higher classification for the 1-hour standard based on a failure to

meet the 1-hour standard.

5. <u>How long would the obligations discussed under the 1-</u> hour standard last?

We are proposing that these measures would not expire. However, we are proposing two options for when the State may relegate these measures to contingency measures: Option 1. When the area achieves the level of the 1-hour ozone standard (even if the area has not yet attained the 8-hour standard). Option 2. When the area attains the 8-hour standard and is designated attainment (regardless of when, if ever, the area attains the 1-hour standard).

6. Mechanism to effect the transition from the 1-hour to the 8-hour standard

We are proposing 2 mechanisms. For both of these mechanisms, we are proposing that the revocation of the 1-hour standard would occur 1 year following designations for the 8-hour NAAQS. Option 1: Complete revocation of the 1-hour standard. Option 2: Partial revocation of 1-hour standard.

D. Mandatory measures

We believe that the CAA is clear that once an area is classified under subpart 1 or subpart 2, the area's State implementation plan must contain the measures enumerated in the CAA for its classification. However, today's proposal

contains several features intended to provide States with flexibility on the measures included in SIPs for 8-hour areas. In addition, we are proposing to consider case-by-case waivers if the applicant can show, consistent with case law on this issue, that implementing a requirement in a particular area would cause "absurd results."

E. Consequences of failure to attain

The consequences of failure to attain the standard on time are specified by the CAA. If an area classified under subpart 2 fails to meet the standard by its deadline, the CAA requires that the area be bumped up to a higher classification and adopt a revised plan containing the additional measures specified by the CAA for that classification. If an area classified under subpart 1 fails to meet the standard by its deadline, the area would be required to adopt a new plan demonstrating attainment, including any requirement mandated by the Administrator.

F. <u>Interstate transport</u>

The EPA recognizes that ozone and ozone precursors are often transported across State boundaries, and that interstate transport can make it difficult - or impossible - for some States to meet their attainment deadlines solely by regulating sources within their own boundaries. To address this concern, the Agency recently adopted two rules (the NO.

SIP Call and the Section 126 Rule) to reduce interstate ozone transport in the eastern U.S. These rules were developed based on the level of reductions needed to address transport for both the 1-hour and 8-hour standards. For both rules, the compliance date for achieving the required emissions reductions is May 31, 2004. Thus, unlike in the past, States affected by transport can develop their local ozone implementation plans with the knowledge that the issue of interstate transport has already been addressed "up front."

The President recently proposed legislation known as the Clear Skies Act that, among other things, would further reduce interstate transport of ozone and NO_x (an ozone precursor) from the power sector through a cap-and-trade program similar to the acid rain program. These reductions are beyond the levels required under the NO_x SIP Call and the Section 126 Rule. The Clear Skies reductions would enable several additional areas to meet the 8-hour standard without imposing any additional local controls. A number of other areas would find it easier to meet the 8-hour standard because of the additional reductions in power plant emissions that would be required under Clear Skies. However, the Agency has not made a determination that such reductions are warranted under the transport provisions of

the CAA. In order to evaluate this issue, the Agency intends to investigate the extent, severity and sources of interstate ozone transport that will exist after the existing transport rules are implemented in 2004.

G. Modeling and attainment demonstration

An attainment demonstration SIP includes technical analyses to locate and regulate sources of emissions that are contributing to violations within nonattainment areas. Section 182(a) does not require marginal areas, which have an attainment date only 3 years following designation to perform any photochemical grid modeling. We are proposing to allow areas with attainment dates within 3 years after designation—regardless of whether they are covered under subpart 1 or 2—to rely on existing modeling. Areas with later attainment dates (more than 3 years after designation) would be required to do an attainment demonstration SIP.

Modeling developed to support Federal or local controls may be used if the application of that modeling is consistent with our modeling guidance.

H. Reasonable Further Progress (RFP)

There are several issues related to the $\mathsf{Act's}$ RFP requirements.

1. Requirement for 15 percent VOC reductions for moderate
and above areas during the first 6 years after the base year

We are proposing two ways to implement the 15 percent requirements for moderate-and-above areas to meet numerical emissions reductions milestones (also known as rate-of-progress, or ROP, requirements).

Under the first option, all such areas would be required to reduce baseline VOC emissions by 15 percent over the first 6 years after a baseline year.

Under the second option, areas that previously reduced VOC emissions by 15 percent as part of implementing the 1-hour standard would be viewed as having already met the requirement. Moderate areas meeting this criterion would comply with the general subpart 1 requirement to demonstrate "reasonable further progress" toward meeting the standard. Serious-and-above areas meeting the criterion would be required to achieve an 18 percent reduction in VOC and/or NO_x over the first 6 years and 9 percent over subsequent 3-year periods until the area's attainment date.

2. Base Year

We are proposing 2002 as the baseline year, and that the 6-year period for reductions would run from January 1, 2003 until December 31, 2008. We propose that States be allowed credit toward meeting the ROP requirements for all emissions reductions that occur after the 2002 base year-including reductions from all post-1990 Federal or other

measures (except those specifically excluded under section 182(b)(1)) of the CAA. We have also recently issued a memorandum that sets forth 2002 as the baseline year for planning purposes.

We are also proposing options for other RFP issues, including:

- The timing of ROP reductions relative to attainment date for moderate areas.
- Timing of submission of ROP plan.
- CAA requirements for creditability of control measures.
- Subpart 1 RFP.
- Cases where 8-hr NA area encompasses and is larger than current 1-hr NA area.

I. RACM/RACT

In the event classification option 2 is selected, we are proposing an interpretation of the requirements for reasonably available control measures (RACM) and reasonably available control technology (RACT) for areas covered by subpart 1.

For RACT, for areas with 8-hour ozone levels that would place them in a moderate or above classification under subpart 2, we are proposing two options. Under the first option, these areas would be required to meet the traditional technology-based RACT control requirement that

are applicable to moderate and above areas under subpart 2. Under the second option, if the area is able to demonstrate attainment of the standard as expeditiously as practicable with emission control measures in the SIP, then RACT will be met, and additional measures would not be required as being reasonably available.

For subpart 1 areas with 8-hour ozone levels that would place them in a marginal classification if classified under subpart 2, the RACT requirement would be similar to that for marginal areas covered under subpart 2. This RACT approach also would be available to areas that qualified for marginal status via the incentive feature.

The RACT requirements for areas under subpart 1 would have to be submitted within 2 years after an area's nonattainment designation.

We are proposing that the State does not need to perform a RACT analysis for sources subject to the State's emission cap-and-trade program where we have approved the cap-and-trade program as meeting the $\rm NO_x$ SIP Call requirements and it does not need to submit a new $\rm NO_x$ RACT SIP for those sources.

We propose to formally recognize NO_{x} , as well as VOC, as an ozone precursor, so that RACT for NO_{x} would be required for areas classified under either subpart 1 or

subpart 2 for the same kinds of sources covered under the 1-hour ozone standard.

For RACM, we propose to continue with the same interpretation that it has used for implementing the 1-hour ozone standard. To show that all RACM have been included in the plan, the State must show that there are no additional measures that are technically and economically feasible that will advance the attainment date.

J. <u>Conformity</u>

No changes to the transportation conformity rule are proposed in this rulemaking. Transportation conformity is discussed in this proposal for informational purposes. By statute, transportation conformity applies to 8-hour nonattainment areas 1 year after the effective date of an area's designation. Our proposal to revoke the 1-hour standard 1 year after 8-hour ozone area designations means that transportation conformity requirements under the 1-hour standard would end at the same time 8-hour transportation conformity requirements begin. We are proposing that conformity would not apply in 1-hour ozone standard maintenance areas after we revoke the 1-hour ozone standard.

For the general conformity program, which ensures that federal actions will not interfere with an area's air quality plan, we are not proposing to revise its General

Conformity Regulations in this rulemaking. We plan to retain the existing de minimis emissions levels for actions exempt from the rule. Our proposal to revoke the 1-hour standard one year after 8-hour ozone area designations means that general conformity requirements under the 1-hour standard would end at the same time 8-hour general conformity requirements begin. We are proposing that general conformity would not apply in 1-hour ozone standard maintenance areas after we revoke the 1-hour ozone standard.

K. New Source Review

We are proposing three options for NSR, which could be implemented in conjunction with each other:

- 1. A "status quo" NSR program under which subpart 1 areas would be covered by subpart 1 NSR, while subpart 2 areas would be covered by subpart 2 NSR.
- 2. A more flexible "Transitional" NSR program for areas that submit early SIPs and that attain early. This program would be available to areas covered under subpart 1 and that are attaining the 1-hour ozone standard.
- 3. A "Clean Air Development Community" program that would allow a more flexible NSR program for areas that manage growth in emissions-producing activities.

VI. WHAT ARE EPA'S PROPOSED FRAMEWORKS FOR IMPLEMENTING THE

8-HOUR OZONE STANDARD?

As noted above, we originally intended to implement the 8-hour ozone standard under subpart 1 of part D, title I of the CAA. This would have allowed areas more flexibility to determine whether to regulate NO_x , VOC or both to address ozone nonattainment.

As also noted above, however, the Supreme Court determined that an approach that did not provide for classifying areas under subpart 2--and thus subjecting those areas to the subpart 2 control requirements -- in implementing the 8-hour standard was unreasonable. In structuring a proposed implementation rule, we have tried to stay as close as possible to the principles noted above, particularly with regard to seeking flexible ways for States to address their 8-hour ozone problems by avoiding measures that may be unreasonable for an area. We have spent a large amount of time investigating possible legal theories and policy options to find flexibility within the statute, as interpreted by the Supreme Court. We have also had the benefit of ideas and recommendations from many interested stakeholders, who also have spent much time developing their own theories and ideas. Based on these efforts, we believe that we have developed options for an implementation program that are workable under the constraints of the CAA.

Nonetheless, we recognize that those constraints will still require a number of areas to adopt certain control measures that may not be as effective as others in achieving the 8-hour ozone standard. We are soliciting any further ideas for addressing this situation.

To describe our proposed frameworks for implementing the 8-hour ozone standard, it is necessary to examine all the components or elements of the process used to implement the standard. Therefore, the issues and options that we are proposing that deal with the aspects of preparing SIPs for the standard are presented below individually. Following that, we present two possible alternative frameworks that blend one or more options from each of the elements to illustrate how they may work in conjunction with each other. We are soliciting comment on the options presented for the individual elements, and also on how the options can be grouped into a consolidated implementation framework.

The proposal below describes only those options or approaches we are proposing. We considered a number of other options and approaches for the elements discussed below. These other options that were considered but are not being proposed are described in a separate document

available in the docket. 10

A. How will EPA reconcile subparts 1 and 2? How will EPA classify nonattainment areas for the 8-hour standard? What attainment dates would apply?

1. Statutory framework and Supreme Court decision

The CAA contains two sets of requirements—subpart 1 and subpart 2—that establish requirements for State plans implementing the national ozone air quality standards in nonattainment areas. (Both are found in title I, part D.) Subpart 1 contains general requirements for SIPs for nonattainment areas for any pollutant—including ozone—governed by a NAAQS. Subpart 2 provides more specific requirements for ozone nonattainment SIPs.

Throughout this proposed rulemaking, we repeatedly discuss whether an area is subject to the planning requirements of subpart 1 or subpart 2. This language is convenient shorthand for purposes of this proposal.

Actually, if an area is subject to subpart 2 requirements, it is also subject to subpart 1 requirements. In some cases, subpart 1 and subpart 2 requirements are inconsistent or overlap. To the extent that subpart 2 addresses a

¹⁰Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

specific planning obligation, the provisions in subpart 2 control. For example, under section 182(b), moderate areas are subject to 15 percent ROP requirements rather than the more general RFP requirements of section 172(c)(2). However, moderate areas remain subject to the contingency measure requirement of section 172(c)(9), as that requirement is not addressed for moderate areas in subpart 2.11

When we published the 8-hour ozone standard on July 18, 1997, we indicated that we anticipated that States would implement that standard under the less prescriptive subpart 1 requirements. More specifically, we provided that areas designated nonattainment for the 1-hour ozone standard would remain subject to the subpart 2 planning requirements for purposes of the 1-hour standard until such time as they met that standard. But those areas and all other areas would only be subject to subpart 1 for purposes of planning for the 8-hour ozone standard.

As noted above, in February 2001, the Supreme Court ruled that the statute was ambiguous as to the relationship of subparts 1 and 2 for purposes of implementing the 8-hour

^{11&}quot;State Implementation Plans; General Preamble for the Implementation of Title I of the Clean Air Act Amendments of 1990; Proposed Rule." April 16, 1992 (57 FR 13498 at 13501 and 13510).

NAAQS. However, the Court also ruled that our implementation approach, which provided no role for subpart 2 in implementing the 8-hour NAAQS, was unreasonable. <u>Id.</u> Specifically, with respect to classifying areas, the Supreme Court stated:

[D]oes subpart 2 provide for classifying nonattainment ozone areas under the revised standard? It unquestionably does.

Whitman, 121 S.Ct. at 917.

However, despite recognizing that subpart 2 does provide classifications applicable for the 8-hour standard, the Supreme Court also recognized that the subpart 2 classification scheme, specified in section 181, did not entirely fit with the revised 8-hour standard and left it to EPA to develop a reasonable resolution of the roles of subparts 1 and 2 in implementing a revised ozone standard. Id. at 482-486.

In particular, the Court noted three portions of section 181 - the classification provision in subpart 2 - that it indicated were "ill-fitted to implementation of the revised standard."

• First, the Court recognized that 1-hour design values used for establishing the classifications in Table 1 in section 181 "would produce at best an inexact estimate

- of the new 8-hour averages . . . " 121 S.Ct. at 918.
- Second, the Court recognized that the design values in Table 1 start at the level of the 1-hour NAAQS 0.12 ppm. The Court noted that "to the extent the new ozone standard is stricter than the old one, . . . the classification system of Subpart 2 contains a gap, because it fails to classify areas whose ozone levels are greater than the new standard (and thus nonattaining) but less than the approximation of the old standard codified by Table 1." Id.
- Third, the Court recognized that "Subpart 2's method for calculating attainment dates which is simply to count forward a certain number of years from

 November 15, 1990 . . . seems to make no sense for areas that are first classified under a new standard after November 15, 1990." More specifically, the Court recognized that attainment dates for marginal (1993), moderate (1996), and serious (1999) areas had passed.

 Id. at 483-484.

2. EPA's development of options

In light of the Supreme Court's ruling, we examined the statute to determine the manner in which the subpart 2 classifications should apply for purposes of the 8-hour ozone NAAQS. In particular, we paid particular attention to

the three portions of section 181 that the Supreme Court noted were ill-fitted for implementation of the revised 8-hour standard. We examined those provisions in light of the legislative history and the overall structure of the CAA to determine what Congress intended for purposes of implementing a revised, more stringent ozone standard. At the same time, we did not view the ambiguity created by the statute to provide us with carte blanche authority to rewrite the statute. Rather, we believe that it needs to take a narrow reading consistent with what it believes Congress intended. Consistent with those principles, we developed several options.

3. Options for classification

We are proposing two options for comment. We prefer classification option 2 because it provides more flexibility to States and Tribes as they address their unique air quality problems. This is likely to allow some areas to attain the standard at a lower cost. However, we are also soliciting comments on option 1, in part, because it is less complex and may be easier to communicate, in addition to any other ideas on how to classify nonattainment areas.

a. Option 1. Under the first option, we would classify 8-hour ozone nonattainment areas according to the severity of their ozone pollution based on 8-hour ozone levels.

Under this option, all 8-hour nonattainment areas would be classified under subpart 2 as marginal, moderate, serious, severe-15, severe-17, or extreme. The CAA gives areas in higher classifications -- which are those with more serious ozone pollution problems -- longer time periods for attaining the standard, but also requires these areas to meet a longer list of requirements than areas in lower classifications.

A key feature of this option is the use of 8-hour ozone design values in determining the severity of an area's 8hour ozone problem. However, the subpart 2 classification table (Table 1 of CAA section 181) is based on 1-hour ozone design values (because it was designed for implementation of the standard in effect in 1990--the 1-hour ozone standard). Therefore, this option would require us to adapt the subpart 2 classification scheme. Specifically, we would adopt by regulation a modified version of the subpart 2 classification table that contains 8-hour design value thresholds for each classification, rather than the statutory 1-hour ozone design value thresholds. Using 8hour design values for classifying areas for the 8-hour standard would reflect the magnitude of the 8-hour ozone problem more accurately than would the 1-hour design values in Table 1.

We are proposing to translate the classification thresholds in Table 1 of section 181 from 1-hour values to 8-hour values in the following manner: Determine the percentage by which each classification threshold in Table 1 of section 181 exceeds the 1-hour ozone standard and set the 8-hour threshold value at the same percentage above the 8-hour ozone standard. For example, the threshold separating marginal and moderate areas in Table 1 is 15 percent above the 1-hour standard, so we would set the 8-hour moderate area lower threshold value at 15 percent above the 8-hour standard.

An examination of the percentages derived indicated that Congress set the classification thresholds at certain percentages or fractions above the level of the standard. These are the percentages above the standard that we used and applied to the level of the 8-hour standard to yield new threshold levels for the 8-hour standard. Table 2 of this proposed rulemaking below depicts how the translation would be done and the results.

¹²The upper thresholds of the marginal, moderate, serious, severe-15, and severe-17 classifications are precise percentages or fractions above the level of the standard, namely 15.000 percent (3/20ths more than the standard), 33.333 percent (one-third more than the standard), 50.000 percent (one-half more than the standard), 58.333 percent (7/12ths more than the standard) and 133.333 percent (one and one-third more than the standard).

There are other ways of performing the translation as described further below, some of which have been suggested in public comment, but we believe that the translation described here is most consistent with the apparent intent of Congress in establishing the thresholds in the classification system in section 181.

As mentioned above, under this option all 8-hour nonattainment areas would be classified under subpart 2 and receive attainment dates consistent with their classification. Elsewhere in this proposed rule, we discuss how it would interpret the attainment dates in Table 1 of section 181 for purposes of areas classified under subpart 2 for the 8-hour standard. Areas that do not attain by their attainment date would be reclassified to a higher classification and be given a later attainment date and would be subject to the measures of the higher classification (section 181(b)(2)).

TABLE 2 TABLE 1 OF SUBPART 2 1-HOUR OZONE CLASSIFICATION TABLE TRANSLATION TO 8-HOUR DESIGN VALUES									
					Area class		CAA design value	Percent above	Translated 8-hour
							thresholds	1-hour ozone NAAQS	design value
		1-hour ozone ppm		thresholds					
				ppm ozone					
Marginal	from	0.121	0.833	0.0851					
	up to	0.138	15.000	0.092					
Moderate	from	0.138	15.000	0.092					
	up to	0.160	33.333	0.107					
Serious	from	0.160	33.333	0.107					
	up to	0.180	50.000	0.120					
Severe-15	from	0.180	50.000	0.120					
	up to	0.190	58.333	0.127					
Severe-17	from	0.190	58.333	0.127					
	up to	0.280	133.333	0.187					
Extreme	equal to	0.280	133.333	0.187					
	or above								

¹The percentages used were calculated based on the level of the 1-hour standard as it appears in 40 CFR 51.9, viz., 0.12 ppm. The percentages were applied to the 8-hour standard as it appears in 40 CFR 51.10, viz., 0.08 ppm. Our guidance uses a rounding convention for 1-hour air quality data such that values less than 0.125 round down to 0.12 and therefore represent attainment; values of 0.125 up to and including 0.129 round up to 0.13, and therefore indicate nonattainment. An exact translation of the 0.121 1-hour threshold would have produced 0.081 ppm as the corresponding 8-hour threshold; however, since any value less than 0.085 ppm would indicate an area is attaining the 8-hour ozone standard, the table's lowest value reflects the lowest value representing nonattainment, viz., 0.085 ppm.

b. Option 2--2-step approach. We are proposing a second option (our preferred option) under which some areas would implement the 8-hour standard under subpart 1, and other areas would implement the 8-hour standard under subpart 2. This option relies on language in the Supreme Court decision, which is described in detail below.

In brief, the option that we are proposing would work as follows:

- First, we would determine which 8-hour areas must be classified under subpart 2. These would be areas with ozone levels that exceed the 1-hour ozone design values that Congress specified in Table 1 of section 181. For the remaining areas, we would have discretion to place them under subpart 1 or subpart 2.
- Second, we would classify all areas. Subpart 2 areas would be classified in the same manner described above under option 1. Options for classifying subpart 1 areas are described below.
- (i) <u>Legal framework for 2-step approach</u>. Under this approach, we first determine the universe of areas that <u>must</u> be subject to the provisions of subpart 2 and the universe of areas that fall into a "gap" in subpart 2's classification scheme. Then, we proceed to determine how to classify the areas.
- (ii) Legal framework--Step 1--Which subpart applies for an

area? With respect to the first step, the Supreme Court noted that "to the extent that the new ozone standard is stricter than the old one, . . . the classification system of Subpart 2 contains a gap, because it fails to classify areas whose ozone levels are greater than the new standard . . . but less than the approximation of the old standard codified by Table 1 [in section 181(a)]." 121 S.Ct. at 918. Thus, for those areas with a 1-hour ozone design value above the level identified in Table 1 (i.e., 0.121 ppm), Table 1 "specifies" a classification for the area. For those areas, we would not have authority to establish classifications under subpart 1 because section 172(a)(1)(C) prohibits the use of the classification authority in section 172(a)(1)(A) for those areas. 13 However, for areas with 1-hour ozone design values below 0.121 ppm, Table 1 does not specify a classification, and those areas fall into a gap in the statute. Thus, we must reasonably determine whether such areas should be subject to the planning obligations of subpart 1 or subpart 2. issue is discussed more fully below under "Rationale for

¹³Section 172(a) (1) (C) provides that the provisions of section 172(a) "shall not apply with respect to nonattainment areas for which classifications are specifically provided" in other sections of part D. Similarly, section 172(a) (2) (D) provides that the attainment date provisions in section 172(a) (2) do not apply "to nonattainment areas for which attainment dates are specifically provided" elsewhere in part D.

regulating all "gap" areas under subpart 1 only."

In summary, under the first step of this approach, we examine each nonattainment area's most recent 1-hour design value at the time of designation under the 8-hour NAAQS to determine whether the area must be subject to the classification under subpart 2. If an area's 1-hour design value is 0.121 or higher, then it must be subject to a subpart 2 classification. If its 1-hour design value is lower than 0.121, it falls into a gap and we must determine a reasonable implementation scheme - either subpart 1 or subpart 2 - for such area.

(iii) Legal framework—Step 2—How should areas be classified under subparts 1 and 2? Under step 2 of this approach, we must determine how to classify areas subject to the classification provisions of subpart 2. For those areas subject to the classification provisions of subpart 2, we believe that it is most reasonable to use the area's 8-hour design value to determine the appropriate classification. This would be done in the same manner as option 1, proposed above, in which the Table 1 threshold design values are converted from 1-hour values to 8-hour values.

Another option would have been to apply Table 1 as it is written. Some might argue that this approach is better because it is consistent with the design value EPA would use under this option to determine whether Congress mandated

that the area be subject to subpart 2. We do not believe that Congress would have intended the use of 1-hour design values for determining the classification - and therefore the control obligations and attainment dates - of 8-hour While we believe it is reasonable to use the 1-hour areas. design values as a barometer of Congress' intent as to which areas should be subject to the more prescriptive requirements of subpart 2, we do not believe it makes sense to use the 1-hour values to establish each area's classification under that subpart. The area's classification identifies the specific control requirements applicable to each area within that classification and the period of time the area has to attain. As enacted, the Table provides that areas having a more significant ozone pollution problem for the 1-hour standard and thus a higher classification are subject to more stringent controls and have a longer period to attain. Because of the different form and averaging times of the 1-hour and 8-hour standards, areas with significant 1-hour problems may not have as significant an 8-hour problem and vice versa. Using the 1hour design values to classify areas, therefore, could result in areas with less significant ozone problems being subject to stricter planning obligations (and later attainment dates) than those with a more significant problem. Thus, we believe it is more consistent with

Congressional intent to use 8-hour design values as the means for specifying the stringency of controls needed to attain the 8-hour ozone standard and the associated attainment dates. We also believe that this is consistent with the Supreme Court decision, in which the Court recognized that the "1-hour averages" in Table 1 "produce at best an inexact estimate of the new 8-hour averages." See 121 S.Ct. at 918.

As discussed in the following section, for areas that EPA determines would be subject only to subpart 1, section 172(a)(1)(A) grants EPA discretion to develop a classification scheme.

- 4. <u>Under classification option 2, how would EPA classify</u> subpart 1 areas?
- a. <u>Background</u>. As noted above, classification option 2 above could result in a number of areas not being classified under subpart 2. Section 172(a)(1)(A) grants EPA discretion to establish a classification system for areas covered under subpart 1 but does not mandate classifications. Section 172(a)(1)(A) provides that

on or after [the date of designation], the Administrator may classify the area for the purpose of applying an attainment date pursuant to paragraph (2), and for other purposes. In determining the appropriate classification, if any, for a nonattainment area, the Administrator may consider such factors as the severity of nonattainment in such area and the availability and feasibility of the pollution control measures that the Administrator believes may be necessary to provide for attainment of such standard in such area.

Prior to the Supreme Court's remand of our implementation approach, we had proposed that all 8-hour ozone nonattainment areas be subject only to subpart 1 for purposes of the 8-hour standard, and that areas would be classified as traditional, transitional, or international transport. These classifications were described in our November 17, 1998 draft implementation guidance. 14

Because we are no longer considering an option where all areas would be classified under subpart 1, we have determined the classification scheme it proposed earlier is not appropriate. We are now proposing, as described below, two new options for classifying subpart 1 areas for the 8-hour standard.

b. Options for classifying subpart 1 areas

(i) Option 1--no classifications. Under this option, subpart 1 areas would not have different classifications. When submitting an attainment demonstration, each area would need to establish an attainment date consistent with section 172(a)(2)(A), i.e., demonstrating attainment as expeditiously as practicable, but no later than 5 years after designation or 10 years after designation if the severity of the area's air pollution and the availability

¹⁴Proposed Implementation Guidance for the Revised Ozone and Particulate Matter (PM) National Ambient Air Quality Standards (NAAQS) and the Regional Haze Program. November 17, 1998. Found at: http://www.epa.gov/ttn/oarpg/t1pgm.html

and feasibility of pollution control measures indicate more time is needed.

(ii) Option 2--create an overwhelming interstate transport classification. This option could be implemented in addition to option 1 (no classifications) for areas that qualify; in other words, we would not classify areas that do not qualify for this transport classification. Under this option, an area could be classified as a "Transport Area" upon submission of a SIP that demonstrates, using modeling, that the nonattainment problem in the area is due to "overwhelming transport" emissions.

We are proposing that for subpart 1 areas to qualify for an overwhelming transport classification, the area would have to meet the same criteria as specified for rural transport areas under section 182(h) (of subpart 2). This section restricts treatment as a rural transport area to an area that does not include, and is not adjacent to, any part of a Metropolitan Statistical Area or, where one exists, a Consolidated Metropolitan Statistical Area (as defined by the United States Bureau of the Census). The area may be treated as a rural transport area if we find that sources of VOC (and, where we determine relevant, NO_x) emissions within the area do not make a significant contribution to the ozone

concentrations measured in the area or in other areas. 15
Since this classification would only apply to subpart 1
areas, areas classified under subpart 2 would not qualify for this classification.

The following are features of this option:

- The area would be treated similar to areas classified marginal under subpart 2 for purposes of emission control requirements.
- Less restrictive NSR and conformity requirements could be proposed for the area. If we include the transport classification option in the final implementation rule, we would consider proposing a separate rulemaking on the details of NSR and conformity requirements.
- The area would receive an attainment date that is consistent with section 172(a)(2)(A), but that takes into consideration the following:
 - The attainment date of upwind nonattainment areas that contribute to the downwind area's problem;
 and
 - The implementation schedule for upwind area

¹⁵The EPA's guidance on such determinations appears in "Criteria for Assessing the Role of Transport of Ozone/Precursors in Ozone Nonattainment Areas," May 1991. U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Technical Support Division, Research Triangle Park, NC 27711. Available at: http://www.epa.gov/scram001/tt25.htm. Look for zip file name UAMIVGUIDE. Unzip to access file name UAMCRIT.

controls, regardless of their geographic scope (e.g., national, regional, statewide, local).

This option would partially address Tribal concerns about designations where a Tribal area designated nonattainment does not contribute significantly to its own problem. This is one of the key issues for the Tribes who seek to have economic growth from new sources within their jurisdiction but that have difficulty obtaining emission reduction offsets from sources located either inside or outside Tribal areas.

Interstate, intrastate, and international transport are also discussed elsewhere in this proposed rulemaking.

5. Rationale for regulating all "gap" areas under subpart 1 only

This section is aimed solely at providing a rationale for why all gap areas should be placed under the subpart 1 regulatory framework rather than the subpart 2 regulatory framework. Issues regarding what specific requirements should apply to subpart 1 areas are addressed in later sections of this preamble.

In developing classification option 2, we explored a number of options regarding how to interpret the relationship of subpart 1 and subpart 2 for areas with 1-hour design values less than 0.121. These areas are referred to below as "gap" areas because their 1-hour design

value falls below the lowest value in the subpart 2 classification table and thus Congress did not dictate whether subpart 2 or subpart 1 applies. The options we explored ranged from placing all of these areas into the subpart 2 classification scheme to placing none of these areas into the subpart 2 classification scheme. We are proposing the latter approach—that all areas that fall into the gap should be subject only to the planning obligations of subpart 1. When faced with a similar issue following enactment of the CAA Amendments of 1990, we determined that areas that Congress did not mandate fall into the classification scheme of subpart 2 should be subject to only the planning obligations of subpart 1.16

For classification option 2, we believe it is appropriate to continue that interpretation of the CAA for 8-hour ozone areas, despite the fact that a significant number of areas designated nonattainment for the 8-hour NAAQS will fall into this group. Congress enacted subpart 2

¹⁶These areas included: (a) the transitional areas under section 185A (areas that were designated as an ozone nonattainment area as of the date of enactment of the CAA Amendments of 1990 but that did not violate the 1-hour ozone NAAQS between January 1, 1987, and December 31, 1989); (b) nonattainment areas that had incomplete (or no) recent attaining data and therefore could not be designated attainment; and (c) areas that were violating the 1-hour ozone standard by virtue of their expected number of exceedances, but whose design values were lower than the threshold for which an area can be classified under Table 1 of subpart 2 (submarginal areas). See 57 FR 13498 at 13524 col. 3 et seq. (April 16, 1992).

with the understanding that all areas (except marginal areas, for which no new controls were required) would have to employ additional local controls to meet the 1-hour ozone standard in a timely fashion. Since then, many control measures have been implemented, our understanding of the importance of interstate pollution transport has improved, and we have promulgated interstate NO_x transport rules. Regional modeling by EPA indicates that the majority of potential 8-hour nonattainment areas that fall into the gap will attain the 8-hour standard by 2007 based on reductions from the NO_x SIP Call, the Federal Motor Vehicle Emissions Control Program, and other existing Federal and State control measures, without further local controls.

Of the 76 hypothetical areas that would fall into the gap (and would thus be covered under subpart 1 under classification option 2), 27 would have been classified as moderate if classified under option 1 based on their 8-hour design values. Eighteen of these 27 areas are projected to attain by 2007 through existing regional or national measures. If these areas were to be classified as moderate (under classification option 1), these areas would nonetheless be required to implement statutorily specified controls for moderate areas. Using our discretion to regulate gap areas under subpart 1 is one way (the proposed incentive feature, discussed below in this section on

classifications, is another way) to avoid requiring unnecessary new local controls in areas already projected to meet the standard in the near term.

The other 49 gap areas could be regulated either under subpart 1 (under option 2) or as marginal areas if classified by 8-hour design value under subpart 2 (under option 1). These areas already are meeting the 1-hour standard and are close to meeting the 8-hour standard. Because control requirements for marginal areas are similar to those for subpart 1 areas, and because most of these areas are projected to attain within 3 years, the difference in regulatory category may make no practical difference for many of these areas. A potential rationale for placing these areas under subpart 1 is to provide States and EPA with greater discretion to handle implementation difficulties that might arise in some of these areas. example, a gap area might fail to attain within the maximum attainment date for marginal areas (3 years after designation) because of pollution transport from an upwind nonattainment area with a later attainment deadline. that event, subpart 2 calls for the area to be reclassified as moderate and for the area to implement additional local controls specified for moderate areas. For areas under subpart 1, however, we could provide additional time for the area to attain while the upwind sources implemented required controls if this were determined to be a more effective or more appropriate solution. Although regional modeling projections indicate that the NO_{x} SIP Call will bring most gap areas into attainment by 2007, some States have voiced concern to us that interstate or intrastate pollution transport may affect future 8-hour areas with near-term attainment deadlines. Subpart 1 would provide States and EPA with more flexibility on the remedy in any such cases.

Although we believe that there are reasons to place gap areas in subpart 1, and have the legal authority to do so, we are not suggesting that subpart 2 is unreasonable for any area that would be subject to subpart 2 under either classification option. Also, our analysis here should not be taken as inconsistent with its proposal under classification option 1, whereby all 8-hour ozone nonattainment areas would be subject to the subpart 2 planning obligations. That simpler option, in conjunction with the incentive feature for classifications (if ultimately adopted), described below in this section on classification, could provide similar flexibility on control measures for most (though not quite all) areas. addition, we are proposing ways in which to build some flexibility into some of the mandated VOC control obligations in subpart 2, in areas where it would make sense to provide such flexibility. A final observation is that

Congress did recognize some benefit in prescribing measures for areas because of past failure to attain under less prescriptive provisions of the CAA.

Placing all gap areas in subpart 1 would result in over half of the hypothetical nonattainment areas being covered by subpart 1. To be fair, this option might appear to result in some areas being placed in subpart 1 even though they have 8-hour ozone design values as high or higher than some areas that fall under Table 1 in section 181 and thus are covered under subpart 2. As explained above, we believe the most effective way to deal with that issue is not to exercise its discretion and make those areas subject to subpart 2. Rather, we can use our discretion under subpart 1 to determine how to define the controls required under subpart 1 for such areas in order to assure the most equitable, yet effective, means for these areas to attain the 8-hour ozone NAAQS. For example, in the section of this proposed rulemaking addressing RFP under subpart 1, we explore an option of defining RFP in the same manner as it is defined under subpart 2. The EPA is open to suggestions as to how to make the subpart 1 planning process that would apply to these areas effective and also equitable in light of the subpart 2 planning obligations to which areas with a similar 8-hour ozone problem may be subject.

6. Proposed incentive feature

In addition to the two basic classification options being proposed above, we are also proposing an early attainment incentive feature that could be applicable to either of the options proposed above. Under this feature, for areas classified under subpart 2, we would classify an area at a lower classification than it would receive based on its design value, if a modeled demonstration indicates the area will attain by an attainment date that is consistent with the lower classification. For instance, if a subpart 2 area has an 8-hour ozone design value of 0.094 ppm, it would ordinarily be classified as moderate, with an attainment date 6 years after the area's designation as nonattainment for the 8-hour standard. If modeling acceptable to EPA demonstrates that this area will attain within 3 years after designation, the area would be eligible for classification as a marginal area, since marginal areas would have a maximum attainment date of 3 years after their nonattainment designation date. (See our proposal on attainment dates elsewhere in this proposed rulemaking.)

The lower classification would provide additional flexibility to the area in that it would avoid the mandatory control requirements of the higher classification. Appendix A of this proposal provides a comparison of requirements under subparts 1 and 2.

In granting a lower classification to an 8-hour ozone

nonattainment area based on this option, we propose to take into account the extent to which the area significantly contributes to downwind nonattainment or interferes with maintenance under section 110(a)(2)(D) of the CAA. We solicit comment on possible mechanisms for assessing this contribution for purposes of granting the lower classification, and possible tests for whether to grant or deny the lower classification.

In addition to soliciting comment on this proposed incentive feature itself, we are soliciting comment on whether such modeled demonstration would have to be made prior to the initial classification of areas, or whether it could be submitted after we have already classified the area initially at the higher classification, in which case we would have to revise the classification downward at a subsequent time.

We also solicit comment on whether EPA, prior to initial classifications, should use EPA regional-scale modeling (rather than urban-scale modeling) to make determinations of which areas would receive a lower classification. Under this suboption, an area would qualify for the lower classification if EPA's regional modeling indicated that, based on emissions reductions from existing national and regional programs, the area would attain the 8-hour standard by the attainment deadline for the next lower

classification. In requesting comment on this suboption,
EPA notes that regional-scale modeling alone is not
considered sufficient for an approvable attainment
demonstration. We request comment on whether regional-scale
modeling would nonetheless be adequate for purposes of
lowering an area's classification. (Under this approach, if
regional modeling did not provide grounds for the lower
classification, States would need to perform local
attainment demonstrations to take advantage of the incentive
feature.)

It should be noted that an option was presented and discussed at the public meetings similar to this incentive feature in conjunction with the option that would have classified all areas based on their 8-hour design values but also relied on modeled results to adjust the classification. The option received criticism from a wide variety of commenters, who argued that modeling could be applied inappropriately in classifying areas. We nonetheless believe it is appropriate to propose this feature to alleviate some of the other concerns that many commenters raised about the mandatory measures required under the higher classifications of subpart 2. Furthermore, we believe this option is justified by the intent of the CAA, in which an area's classification is generally linked to the amount of time the area is anticipated to need to attain the

NAAQS. We recognize that the CAA was not originally structured to allow lower classifications based on an area being projected to attain earlier. However, under the Supreme Court ruling that required that we interpret the law regarding subpart 2's application to the 8-hour ozone standard, we believe it may reasonably give areas that are projected to attain the 8-hour ozone standard by an earlier date a classification that is consistent with that attainment date.

7. Other options EPA considered

We considered many other options for classification and for the translation of the classification table in the CAA. These options are discussed in a separate document available in the docket. These other possible ways of translating the classification table, in our opinion, do not have the same degree of consonance with the intent of Congress when it enacted subpart 2 as those we are proposing. We are therefore not proposing these.

8. Implications for the options

To evaluate the potential impact of the various classification options, we developed a set of 122 hypothetical nonattainment areas based on the counties that

¹⁷Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

have monitors measuring violations of the 8-hour ozone standard for the 3-year period of 1998-2000. Our inclusion and grouping of counties into hypothetical nonattainment areas was done only for illustrative purposes and does not have any implications for the location, number or boundaries of nonattainment areas that may ultimately be evaluated and recommended by States and Tribes or designated by EPA. final designations would be affected by factors contained in EPA's guidance on boundaries of nonattainment areas (which is, as noted earlier, not a topic of discussion or comment for this notice of proposed rulemaking). As noted earlier, Table 3 illustrates a possible classification grouping of nonattainment areas based on counties with monitors based on the options proposed above. The list of these areas and the information we used in assessing the consequences of our proposal are available in the docket. 18

¹⁸ Background Information Document, Hypothetical Nonattainment Areas for Purposes of Understanding the EPA Proposed Rule for Implementing the 8-hour Ozone National Ambient Air Quality Standard. Illustrative Analysis Based on 1998-2000 Data. U.S. Environmental Protection Agency, Office of Air and Radiation, Office of Air Quality Planning and Standards, Draft, April 2003. Available at: http://www.epa.gov/ttn/naaqs/ozone/o3imp8hr/.

TABLE 3 PROPOSED CLASSIFICATION OPTIONS COUNTS OF HYPOTHETICAL NONATTAINMENT AREAS

COOKIS OF INTOTALLICAL MONATIANMENT ANDAS								
	Subpart 2						Subpart	
							1	
	Extreme	Severe-	Severe-	Serious	Moderate	Marginal		Total
		17	15					
Option 1 (8-	0	1	1	6	53	61	0	122
hour design								
value)								
Option 1 (8-	0	1	1	6	30	84	0	122
hour design								
value)-with								
incentive								
feature*								
Option 2 (2-	0	1	1	6	26	12	76	122
step approach								
areas < 0.121								
ppm = subpart								
1)								
Option 2 (2-	0	1	1	6	21	17	76	122
step approach								
areas < 0.121								
ppm = subpart								
1)-with								
incentive								
feature ¹								
1								

¹Areas that would be moderate using their 8-hour design value but that are projected to attain by 2007 would be classified marginal.

9. Other considerations

In addition to the overall classification options being proposed, it should be noted that subpart 2 also provides that classifications may be adjusted upward or downward for an area if the area's design value is within 5 percent of another classification. This provision (section 181(a)(4)) reads:

If an area classified under [Table 1] would have been classified in another category if the design value in the area were 5 percent greater or 5 percent less than the level on which such classification was based, the Administrator may, in the Administrator's discretion, within 90 days after the initial classification, adjust the classification to place the area in such other category. In making such adjustment, the Administrator may consider the number of exceedances of the national primary ambient air quality standard for ozone in the area, the level of pollution transport between the area and other affected areas, including both intrastate and interstate transport, and the mix of sources and air pollutants in the area.

Thus, for example, if a downwind area is subjected to a subpart 2 classification and there is evidence that the area will not benefit significantly from local controls mandated by subpart 2 for the area's classification and can attain within the time period specified for the next lower classification, the area may obtain some relief based on the 5 percent rule in the CAA, if applicable.

This provision does not establish a mechanism for removing areas from the subpart 2 classification scheme.

B. <u>How will EPA treat attainment dates and other dates</u> including SIP submittal dates for the 8-hour ozone standard?

1. Background

Under subpart 2 of the CAA, maximum attainment dates and most SIP submittal dates are fixed as a function of a nonattainment area's classification under Table 1. The CAA provides that an area's attainment date must be "as expeditious as practicable but no later than" the date prescribed in Table 1 for that area's classification. statutory dates are specified as a number of years (e.g., 6 years) from the date of enactment of the CAA Amendments, which was November 15, 1990. Because these dates are a set number of years after enactment of the CAA Amendments, one might initially conclude that the subpart 2 classifications, with their associated attainment dates, should not apply for the 8-hour standard. The Supreme Court, however, rejected a conclusion that the subpart 2 classifications do not apply, although it noted that the attainment dates "seem[] to make no sense" for areas classified under a new standard after November 15, 1990. 121 S.Ct. at 918.

We believe that applying the attainment dates as expressly provided under Table 1 would produce absurd results. For example, a strict application of Table 1 would result in areas classified as marginal for the 8-hour NAAQS as having an attainment date of November 15, 1993 and areas classified as moderate as having an attainment date of November 15, 1996. Since these dates have long passed, it makes no sense to establish them as the applicable dates.

Many provisions of the CAA, however, indicate what Congress' intent was in setting attainment dates. For example, section 181(b), provides that for areas designated attainment or unclassifiable for ozone immediately following enactment of the 1990 CAA Amendments and subsequently redesignated to nonattainment, the attainment date would run from the date the area is classified under subpart 2.19 Thus, if an area designated as attainment for the 1-hour ozone standard in 1990 were redesignated to nonattainment for the 1-hour ozone standard in January 2002 and classified as moderate, the area's attainment date would be 6 years following January 2002, i.e., January 2008. Similarly, section 172(a)(2) provides for attainment dates to be calculated from the time the area is designated nonattainment. We believe that Congress would have intended for areas designated nonattainment and classified under subpart 2 for the 8-hour standard to have attainment periods consistent with those in Table 1 (e.g., 3 years for a marginal area, 6 years for a moderate area, etc.), but running from the date the area is designated and classified for purposes of the 8-hour NAAQS. We are proposing for

¹⁹Section 181(b) provides that "any absolute, fixed date applicable in connection with any such requirement is extended by operation of law by a period equal to the length of time between the date of the enactment of the CAAA of 1990 and the date the area is classified under this paragraph." Under section 181(b), the date of classification is the same as the date of redesignation to nonattainment.

areas classified under subpart 2, the period for attainment (running from date of designation/classification) would be:

- marginal 3 years
- moderate 6 years
- serious 9 years
- severe 15 or 17 years
- extreme 20 years (no areas currently expected to be in this category for the 8-hour ozone standard).

Note that the CAA requires each area to demonstrate attainment as expeditiously as practicable, regardless of maximum statutory periods.

Most SIP submittal dates in subpart 2 run for a fixed period from the date of enactment of the 1990 CAA, which was also the date of designation and classification by operation of law for most subpart 2 areas. Under section 181(b)(1), the statute provides that any fixed dates will be extended by operation of law to a period equal to the length of time between that date of enactment and the date an area is subsequently designated and classified. Thus, unless EPA has reason to create a different time period, either as explained specifically below or in any subsequent specific rulemaking applicable to a particular subpart 2 requirement, subpart 2 SIP submittals will be due as a general matter by the same period of time after designation and classification under the 8-hour standard as provided in subpart 2 for areas designated and classified at the time of enactment of the

1990 CAA.

For areas classified under subpart 1, attainment dates would be set under section 172(a)(2)(A), which provides that the SIP must demonstrate attainment as expeditiously as practicable, but no later than 5 years after designation or 10 years after designation if the severity of the area's air pollution and the availability and feasibility of pollution control measures indicate more time is needed.

Note that in determining whether an area actually attains the NAAQS at the time of the attainment date, EPA would use the ambient air quality data for the three ozone seasons prior to the attainment date. As an example, if the effective date of the nonattainment designations is May 15, 2004, the maximum attainment date for an area classified marginal would be May 15, 2007. In this example, EPA would consider the 8-hour ozone data for the three previous ozone seasons - 2004, 2005 and 2006.

2. <u>How will EPA address the provision regarding 1-year</u> <u>extensions?</u>

Both subpart 1 and subpart 2 provide for two brief attainment date extensions for areas in limited circumstances where they do not attain by their attainment date. Section 172(a)(2)(C) (under subpart 1) provides for EPA to extend the attainment date for 1 year if the State has complied with all requirements and commitments pertaining to the area in the applicable implementation

plan, and no more than a minimal number of exceedances of the relevant NAAQS has occurred in the area in the attainment year. No more than two 1-year extensions may be issued under this subparagraph for a single nonattainment area. Section 181(a)(5) (under subpart 2) contains a similar provision, but instead of allowing a "minimal" number of exceedances, it provides for only one exceedance of the standard in the year preceding the extension year. This reflects the form of the 1-hour ozone standard, which is exceedance-based. The 8-hour ozone standard, however, is not an exceedance form of standard, but rather a concentration-based standard. We have issued guidance on the portion of these two provisions relating to the State's compliance with all requirements and commitments pertaining

²⁰See 40 CFR 50.9(a); the 1-hour standard for ozone "... is attained when the expected number of days per calendar year with maximum hourly average concentrations above 0.12 parts per million $(235 \mu g/m^3)$ is equal to or less than 1 in order for the area to be considered attaining the standard, as determined by Appendix H to this part." Thus, the 1-hour standard is an "exceedance" based standard, since the number of exceedances of the standard (yearly average over 3 years under appendix H) must be equal to or less than 1. In contrast, see 40 CFR 50.10(b); the 8-hour standard for ozone is ". . . met at an ambient air quality monitoring site when the average of the annual fourthhighest daily maximum 8-hour average ozone concentration is less than or equal to 0.08 ppm, as determined in accordance with Appendix I to this part." Thus, this is a concentration-based standard, because meeting the standard is determined by calculating the concentration, not the number of exceedances as under the 1-hour standard.

to the area in the applicable implementation plan. 21 However, for purposes of section 181(a)(5), we need to determine a reasonable interpretation in light of the fact that the statute, as written, does not fit the form of the 8-hour standard. Because Congress has addressed this issue elsewhere in the statute, we believe it is reasonable to adopt that formulation. Therefore, we would apply the same test under subparts 1 and 2 for determining whether to grant a 1-year extension, i.e., whether there was a minimal number of exceedances. For both subparts, we propose to interpret this to mean for the 8-hour standard, the area would be eligible for the first of the 1-year extensions under the 8hour standard if, for the attainment year, the area's 4th highest daily 8-hour average is 0.084 ppm or less. An area that has received the first of the 1-year extensions under the 8-hour standard would be eligible for the second extension if the area's 4th highest daily 8-hour value, averaged over both the original attainment year and the first extension year, is 0.084 ppm or less.

3. How do attainment dates apply to Indian country?

As discussed elsewhere in this proposed rulemaking, the Tribal Authority Rule (TAR), 40 CFR 49.9 provides that

²¹Memorandum of February 3, 1994, from D. Kent Berry re: "Procedures for Processing Bump Ups and Extension Requests for Marginal Ozone Nonattainment Areas." U.S. Environmental Protection Agency, Research Triangle Park, North Carolina.

Tribes should not be treated in a manner similar to States with regard to schedules, including the attainment dates. However, the TAR also requires EPA to develop Federal implementation plans (FIPs) where necessary and appropriate. (40 CFR 49.11). Because we believe that public health considerations are of primary concern, the attainment dates for primary NAAQS should be met. Therefore, EPA, in consultation with the Tribes, will work to ensure that the standards are addressed as soon as possible, considering the needs of the Tribes, and ensure that attainment in other jurisdictions is not adversely affected.

4. How will EPA establish attainment dates for areas classified as marginal under the "incentive" feature proposed under the classification section or areas covered under subpart 1 with a requested attainment date of 3 years or less after the designation date?

The EPA would ordinarily have established attainment dates for areas through a review of the SIP and whether attainment is as expeditious as practicable but no later than the date prescribed in the CAA. Elsewhere in this proposal, we are providing that marginal areas (under subpart 2) and areas under subpart 1 with an attainment date within 3 years after designation would not actually have to submit an attainment demonstration within 3 years after designation. Therefore, we must establish another procedure for establishing the attainment dates for these areas. We

are proposing the following procedure.

- a. Areas that are classified marginal based solely on their 8-hour ozone design value. For these areas, we are proposing that the CAA attainment date under Table 1 of section 181 would be the area's attainment date (namely, 3 years after designation).
- b. Areas that are classified marginal based on the proposed incentive feature proposed elsewhere and areas covered under subpart 1 with a requested attainment date of 3 years or less after the designation date. These are areas that are projected through modeling to attain within 3 years following designation. For these areas, we are proposing that these States must submit a SIP--within 1 year after designation--that provides documentation (viz., concerning the modeling and analyses that the area is relying on to support its claim) that the area will attain within 3 years following designation. Such a SIP submission must undergo the normal public hearing and comment procedures as for any SIP submission.
- C. How will EPA implement the transition from the 1-hour to the 8-hour standard in a way to ensure continued momentum in States' efforts toward cleaner air?

As areas are designated for the 8-hour ozone NAAQS, we must address how those areas will transition from current implementation of the 1-hour standard to implementation of the 8-hour standard. In addressing this issue, we

considered a number of factors, including the existing "anti-backsliding" provisions of the CAA, Congress' intent, as evidenced in the statute, to ensure continued progress toward attainment of the ozone standard, and the Supreme Court's interpretation of the CAA and Congressional intent. In subsection 1 of this section, we provide background information on the transition process we set forth in 1997 (and subsequently amended through regulation) and we summarize the statutory anti-backsliding provisions and the Congressional intent in enacting these provisions and subpart 2 of the CAA. In subsection 2, we identify two proposed options to effect the transition from implementation of the 1-hour standard to the 8-hour standard that concern the revocation of the 1-hour standard in whole or revocation of the 1-hour standard in part. In subsection 3, we indicate - in light of the CAA provisions and Congressional intent - which requirements that applied for purposes of the 1-hour standard should continue to apply to areas after they are designated for the 8-hour standard. Next, in subsection 4, we consider whether there is a point at which the States should no longer be required to continue to implement those obligations EPA determines continue to apply after areas are designated for the 8-hour standard. Finally, in subsection 5, we indicate how it will ensure through regulation that the public knows which "1-hour" obligations remain in place and for which areas.

1. Background

Background on EPA's current regulation for governing the transition. At the time we promulgated the 8-hour ozone NAAQS in July 1997, we issued a rule (40 CFR 50.9(b)) providing that the 1-hour standard would no longer apply to an area once we determined that the area had attained the 1hour NAAOS. (62 FR 38856, July 18, 1997). This process became known as "revocation" of the 1-hour NAAQS. interpreted that provision to mean that once the 1-hour standard was revoked, the area's 1-hour ozone designation no longer applied. Due to the ongoing litigation concerning the 8-hour ozone NAAQS and our implementation strategy for that standard, we subsequently modified 40 CFR 50.9(b) in part to provide that "after the 8-hour standard has become fully enforceable under part D of title I of the CAA and subject to no further legal challenge, the 1-hour standards set forth in this section will no longer apply to an area once we determine that the area has air quality meeting the 1-hour standard." (65 FR 45181, July 20, 2000). 22 Thus, currently, three criteria would need to be met before we could revoke the 1-hour standard for an area: (1) the 8-hour standard would need to be fully enforceable, (2) all legal challenges to the 8-hour ozone NAAQS would need to be

 $^{^{22}\}text{On}$ December 27, 2002 (67 FR 79460), EPA proposed to stay the applicability of its authority to revoke the 1-hour standard pending rulemaking to consider whether to modify the approach for transitioning to the 8-hour standard.

resolved; and (3) we would need to determine that an area had attained the 1-hour standard.

In this section, we are proposing to revise 40 CFR 50.9(b) to reflect more appropriately the implementation strategy that we develop pursuant to this proposal. At the time that we initially promulgated 40 CFR 50.9(b), we contemplated that areas would not be subject to the planning obligations of subpart 2 for purposes of implementing the revised 8-hour ozone NAAQS. Furthermore, we stated that "as a matter of law," areas should continue to be subject to the planning obligations of subpart 2 for purposes of implementing the 1-hour standard until such time as they attained the 1-hour ozone NAAQS. Thus, we contemplated that the 1-hour NAAQS-and the associated designation and classification under subpart 2 for an area, including any mandated control obligations -- would continue to apply until the area attained that standard. At that time, the area would be subject only to the planning obligations of subpart In light of the Supreme Court's ruling that we cannot ignore subpart 2 for purposes of implementing a revised ozone NAAQS, we believe it is appropriate to reconsider how to transition from the 1-hour NAAQS to the 8-hour NAAQS in light of the statutory structure of the CAA, as amended in 1990.

Our principal objectives for the mechanism that would ensure a smooth transition to implementation of the 8-hour

standard are to ensure (1) that there will be no degradation of air quality, (2) that areas continue to make progress toward ozone attainment, and (3) consistency with the intent of Congress when it originally established the implementation structure for ozone in subpart 2 of the CAA.

We believe the several alternative approaches proposed below are more consistent with the implementation path we are proposing in light of the Supreme Court's remand. These alternatives would more effectively continue the momentum towards cleaner air than would have been accomplished under the current 40 CFR 50.9(b) structure while allowing 8-hour ozone nonattainment areas to more readily focus on their 8-hour ozone standard SIP obligations.

b. Background on the CAA's anti-backsliding provisions. The CAA contains a number of provisions that indicate that Congress did not intend to allow States to alter or remove provisions from implementation plans if the plan revision would jeopardize the air quality protection provided in the approved plan. Section 110(1) provides that EPA may not approve a SIP revision if it interferes with any applicable requirement concerning attainment and ROP or any other applicable requirement of the CAA. Congress created a tougher test for areas that might want to relax control requirements that were in SIPs prior to the CAA Amendments of 1990. Section 193 of the CAA prohibits modification of a control requirement in effect or required to be adopted as

of November 15, 1990 (i.e., enactment of the 1990 CAA Amendments), unless such a modification would ensure equivalent or greater emissions reductions.

We also believe that Congress set an additional statutory bar for 1-hour ozone areas that were designated nonattainment and classified at the time of the 1990 CAA Amendments. For these areas, Congress classified the areas "as a matter of law" and provided that even upon redesignation to attainment, such areas could not remove from the SIP control measures specified in subpart 2 ("applicable requirements"), but could shift them to contingency measures that would be implemented to "promptly correct any violation of the standard."

For these reasons, we believe that although Congress gave EPA the power to revise the existing ozone standard, Congress did not open the door for States to remove SIP-approved measures or to avoid control obligations with which they have not yet complied.

One other provision, though not directly applicable, sheds light on Congress' intent. In 1990, Congress enacted section 172(e), which applies when EPA revises a NAAQS and makes it less stringent. This provision specifies that in those circumstances, States cannot relax control obligations that apply in nonattainment area SIPs or avoid adopting

those that they have not yet adopted.²³ Because Congress specifically mandated that such control measures need to be adopted or retained even when EPA relaxes a standard, we believe that Congress did not intend to permit States to remove control measures when EPA revises a standard to make it more stringent, as in the case of the 8-hour standard.

We also note that in finding EPA's subpart 1-only implementation approach unlawful, the Supreme Court voiced concern that EPA not render subpart 2 "abruptly obsolete" because "Subpart 2 obviously was enacted to govern implementation for some time. ... A plan reaching so far into the future was not enacted to be abandoned the next time EPA reviewed the ozone standard - which Congress knew could happen at any time, since technical staff papers already had been completed in 1989." In response to the decision, we are now proposing (as noted above in the discussion on classifications) to use subpart 2 in implementing the 8-hour standard. However, the classification systems we are proposing today would result in the majority of ozone nonattainment areas that are currently classified for the 1-hour standard being placed in a lower classification for the 8-hour standard.

²³ Specifically, section 172(e) requires EPA to promulgate regulations providing for controls that "are not less stringent than the controls applicable to areas designated nonattainment" before relaxation of the standard.

proposed anti-backsliding approaches, discussed below, would not render obsolete the congressionally-specified control measure requirements of subpart 2 for 1-hour ozone nonattainment areas at a time when those areas have not yet met either of the health-based ozone standards.

2. When will EPA revoke the 1-hour standard?

We are proposing to revoke the 1-hour standard either in part or in whole 1 year following designations for the 8-hour NAAQS. As discussed below, we are proposing two different legal mechanisms for achieving the revocation. Under either approach, however, the same stipulations continue to apply to areas currently or formerly designated nonattainment for the 1-hour standard.

The deciding factor supporting the schedule for the revocation in our proposal is to ensure areas do not have to perform conformity analyses for both the 1-hour and 8-hour standards at the same time. As background, areas designated nonattainment for the first time for a new standard (e.g., the 8-hour ozone standard) have a 1-year grace period before conformity applies for that standard (i.e., a 1-year grace period before conformity applies for the 8-hour ozone standard). This 1-year grace period before conformity is required for the 8-hour standard applies to all areas designated nonattainment for the 8-hour standard, regardless of their 1-hour NAAQS designation status. Thus, under either of the mechanisms described below, we are proposing

that conformity for the 1-hour standard no longer apply 1 year following the effective date of the 8-hour designation (i.e., when the standard is revoked in whole or in part). However, conformity obligations for the 1-hour ozone standard would remain applicable during the grace period and would not be affected by the designation of areas for the 8-hour standard. Our intentions regarding conformity—as well as a more complete discussion of transportation conformity appears elsewhere in this proposal.

(i) Option 1: Revocation in whole of the 1-hour standard. Under this option, which is our preferred option, EPA would revoke the 1-hour standard and the associated designations and classifications 1 year following the effective date of the designations for the 8-hour NAAQS. The complete revocation of the 1-hour standard would occur in late spring of 2005 on the effective date of the 8-hour NAAQS designations, which will be issued by April 15, 2004. order to address the anti-backsliding issues discussed in section 3, below, EPA would promulgate regulations specifying those requirements that would continue to apply after the revocation of the 1-hour standard. regulations would also specify the geographic areas in which those obligations continue to apply, since areas designated nonattainment for the 8-hour standard may include counties that were not designated nonattainment for the 1-hour standard. The anti-backsliding regulations would apply only to the portion of the 8-hour nonattainment area that was designated nonattainment for the 1-hour standard.

(ii) Option 2: Partial revocation of 1-hour standard. Under this mechanism, EPA would retain the 1-hour standard and its associated designations and classifications for limited purposes (viz., those discussed and proposed below in section 3) until the area meets the 1-hour standard. For many areas, this is likely to extend well beyond May 2005, the date of likely revocation under option 1.24 For all remaining purposes, EPA would revoke the 1-hour standard and the associated designations and classifications 1 year after the effective date of designations for the 8-hour standard. As noted above, we believe that Congress initially intended the State's obligations under subpart 2 to continue to apply "as a matter of law," and the 1-hour designations and classifications--established for the circumstances present when the requirements were enacted--are the mechanism Congress identified for triggering the applicability of these requirements. Under this theory, Congress would have intended the standard to remain in place for purposes of control measures and NSR requirements, as discussed above.

A number of commenters in the pre-proposal phase recommended an approach premised on retention of the standard. See, e.g., Letter of December 5, 2002 from Michael P. Kenny, Executive Director, California Air Resources Board, to Jeffrey R. Holmstead, EPA Assistant Administrator for Air and Radiation. Available at: http://www.epa.gov/ttn/naaqs/ozone/o3imp8hr/.

While the partial retention of the standard itself and the associated designations and classifications would be the mechanism used to retain the specified obligations, we would need to promulgate regulations similar to those described in option 1 to ensure that it is clear for which purposes the standard is being retained.

Request for comment. Both of these options would achieve the same result--ensuring the continued applicability of certain control requirements in subpart 2 and ensuring continued improvement in air quality, while shifting the focus from modeling and other planning requirements for the 1-hour standard to analyses for the 8hour standard. We solicit comment on which mechanism is preferable for accomplishing the overriding objective of preventing backsliding from statutory and SIP requirements while achieving a smooth transition to implementation of the new standard. In addition, EPA also solicits comment on whether to retain the limit in current 40 CFR 50.9(b) that the 1-hour standard will not be revoked for any area until the 8-hour standard is no longer subject to legal challenge. (iv) Other possible approaches for the transition from the 1-hour to the 8-hour standard.

The EPA considered other approaches for the timing of the revocation of the 1-hour ozone standard; these are

discussed in a separate document available in the docket. 25

3. What obligations should continue to apply as an area begins to implement the 8-hour ozone NAAQS and what obligations should no longer apply?

In this section, we consider what obligations from subpart 2 relative to the 1-hour ozone standard should continue to apply to areas after they have been designated for the 8-hour standard. We are proposing that the continuity of particular obligations should vary depending on the attainment status of an area for both the 1-hour and 8-hour standard. We first discuss those obligations that we propose should continue to apply to an area that is designated nonattainment for the 8-hour NAAQS, and that was designated nonattainment for the 1-hour ozone standard on or after November 15, 1990. Second, we discuss those obligations that should continue to apply to an area that is designated attainment for the 8-hour NAAQS, and that was designated nonattainment for the 1-hour standard on or after November 15, 1990. (This section addresses only the continued application of requirements that applied by virtue of an area having been designated nonattainment for the 1hour standard at some point following enactment of the CAA

²⁵Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

Amendments of 1990. It does not address areas that have been designated attainment for the 1-hour standard at all times since November 15, 1990, because they would not have any continuing obligations under subpart 2 for purposes of the 1-hour standard.) Finally, we address States' continued obligations with respect to the NO_x SIP Call. We address this issue separately since this obligation applies statewide and without respect to the designation status of areas within the State.

In general, the types of obligations that apply to areas by virtue of their 1-hour classification can be broken into three groups: control obligations; measures to address growth in new sources; and planning obligations. Control measures include specific emission reduction obligations such as NO, RACT, I/M, and fuel programs, which are mandated in subpart 2. Measures to address growth are NSR (required under subpart 1 and subpart 2) and conformity (required by subpart 1). Planning obligations consist of attainment and maintenance demonstrations and RFP plans. For purposes of clarifying what we are proposing with respect to control measures, we also discuss in this section "discretionary" control measures that are not specified in subpart 2. Generally, these are control measures or other obligations the State selected and adopted into the SIP for purposes of attainment, ROP or any other goal to benefit air quality,

but which are not specifically mandated by subpart 2.

- What obligations should continue to apply for an area that is designated nonattainment for the 8-hour NAAQS and that was designated nonattainment for the 1-hour ozone NAAQS on or after November 15, 1990? We believe that Congress intended each area that was classified for the 1-hour ozone NAAQS under subpart 2 to adopt the specified control obligations in subpart 2 for the area's 1-hour classification. We interpret the mandated obligations in subpart 2 for purposes of an area's 1-hour ozone classification to remain applicable to such areas by virtue of the area's classification "as a matter of law" in 1990. (Appendix B of this proposed rulemaking contains a list of the subpart 2 requirements that remain applicable.) three types of obligations described above (control obligations, measures to address growth in new sources, and planning obligations) are discussed separately below.
- (i) <u>Control measures.</u> We are proposing that all areas designated nonattainment for the 8-hour ozone NAAQS remain subject to control measures that applied by virtue of the area's classification for the 1-hour standard. To the extent the area has met the obligation and the control measure is a part of the approved SIP, the State could not modify or remove that measure except to the extent that it could modify or remove that measure for purposes of the 1-

hour standard and subject to a demonstration under section 110(1) that modification or removal would not interfere with attainment or maintenance of the 8-hour ozone NAAQS.²⁶ For control measures that the State has not yet adopted, the State remains obligated to adopt and submit such controls. And, once adopted into the approved SIP, the State could not modify or remove that measure except to the extent that it could modify or remove that measure for purposes of the 1-hour standard and subject to a demonstration under section 110(1) that modification or removal would not interfere with attainment or maintenance of the 8-hour ozone NAAQS. This obligation would apply only to the part of the 8-hour ozone nonattainment area that was designated nonattainment for the 1-hour ozone NAAQS.

To illustrate what we are proposing, we provide the following example, which will also be used in the next section discussing discretionary control measures. Assume an area is classified as marginal for the 8-hour ozone NAAQS and was classified as serious for the 1-hour ozone NAAQS at the time of the 8-hour designations. Also assume RACT for a

²⁶ In addition, for a revision to an obligation that was in effect prior to November 15, 1990, section 193 prohibits a SIP revision without a showing that it would result in equivalent or greater emission reductions. For purposes of avoiding repetition, we do not mention section 193 in each of the examples discussed in this section. However, States remain obligated to make the section 193 demonstration for any revision to a requirement that applied prior to November 15, 1990.

particular source category is considered an 80 percent reduction in uncontrolled emissions of VOCs at all major In its 1-hour SIP, the State chose to require emissions reductions of 90 percent and the RACT requirement applied to all major stationary sources, which for a serious area includes all sources that emit greater than 50 tons/year VOCs. After designation for the 8-hour standard, the State wants to modify this RACT requirement to require only 80 percent reduction in emissions and to limit the requirement to sources that emit 100 tons/year of VOCs. Because the State could not have modified the RACT obligation to apply only to sources emitting 100 tons/year or more of VOCs for purposes of the 1-hour standard, the State could not change the source cut-off from 50 tons/year for purposes of the 8-hour standard. The 50 tons/year major source threshold would continue to be an "applicable requirement" for the part of the area that was designated nonattainment for the 1-hour NAAQS. The State, however, could apply RACT only to sources that emit 100 tons/year or more for any portion of the area that was not a part of the 1-hour serious nonattainment area. While the 80 percent control level would be considered mandatory, the 90 percent control level was not mandated by the CAA and thus is considered a "discretionary control measure." We address below how modification of a discretionary control measure

would be treated under this proposal.

The same principle would hold true for control measures in a maintenance plan for an area that was designated nonattainment for the 1-hour standard at or after November 15, 1990 and that was subsequently redesignated to attainment under the 1-hour ozone standard. 27 Subpart 2 control measures (including those that had been shifted to contingency measures) could not be removed from the SIP and could be modified only to the extent that they could have been modified if the 1-hour standard remained in effect for the area. If the State had previously shifted a mandated subpart 2 control measure to its contingency plan, we would not require that the area begin to implement that measure as part of its 8-hour implementation plan, if the measure was not required under its classification under the 8-hour standard. However, the measure would need to remain as a contingency measure for the area and could not be removed from the SIP.

(ii) Discretionary control measures. Many approved SIPs

²⁷A maintenance plan, which is a SIP revision required under sections 107(d)(3)(E) and 175A as a prerequisite for redesignating a nonattainment area to attainment, must provide for maintenance of the NAAQS for 10 years after redesignation and must contain contingency measures to promptly correct any violation of the standard that occurs after redesignation. Contingency measures must provide for implementation of all measures that were contained in the SIP for the area before redesignation of the area as an attainment area.

contain control measures that are not specified under subpart 2 for the area, but that the State chose to adopt as part of the demonstration of attainment or part of the ROP requirement for the 1-hour NAAQS. For these kinds of measures, we are proposing that no additional burden be placed on the State. For purposes of the 1-hour standard, States may currently revise or remove those requirements so long as they make a demonstration consistent with section 110(1) that such removal or modification would not interfere with attainment of or progress toward the 1-hour ozone NAAQS (or any other applicable requirement of the CAA). Under the CAA, for purposes of the 8-hour standard, the same obligation would apply except the State would need to make the demonstration with respect to the 8-hour standard instead of the 1-hour standard.

In the example above, if a State wants to revise the control level for certain sources from 90 percent control to 80 percent control, the State may do so because subpart 2 mandated RACT in this example is an 80 percent level of control rather than a 90 percent control level. The 90 percent control level thus was "discretionary." We are proposing that no additional burden, beyond the statutory section 110(1) test, be placed on the State to alter this requirement. Thus, to revise the control level, the State would need to demonstrate, consistent with section 110(1),

that the lower control level of 80 percent would not interfere with attainment of the 8-hour standard or RFP for the 8-hour standard (or any other applicable requirement of the CAA).

A number of SIPs contain enforceable commitments to adopt additional discretionary emission reduction control measures in the future. The State remains obligated to these commitments to the same extent as if they were adopted measures. The only way a State may modify or remove such a commitment is through a demonstration under section 110(1). (iii) Measures to address growth. For 1-hour nonattainment NSR requirements in place at the time an area is designated nonattainment for the 8-hour standard, we are proposing that the major source applicability cut-offs and offset ratios continue to apply to the extent the area has a higher classification for the 1-hour standard than for the 8-hour standard. We see no rationale under the CAA - given the Congressional intent for areas "classified by operation of law" - why the existing NSR requirements should not remain "applicable requirements" for the portion of the 8-hour nonattainment area that was classified higher for the 1-hour standard. However, if an area has been redesignated to attainment for the 1-hour standard as of the date of designation for the 8-hour standard, and is thus no longer implementing the nonattainment NSR program for its previous

1-hour ozone classification, it would not need to revert back to the program it had for purposes of the 1-hour standard. For example, if an area is classified moderate under the 8-hour standard, but was classified severe under the 1-hour standard at the time of the 8-hour designations, the portion of the 8-hour nonattainment area that was classified severe for the 1-hour standard would remain subject to an offset ratio of 1.3:1 and a major source threshold of 25 tons/year. The remaining portions of the 8hour area would be subject to the offset ratio for moderate areas (1.15:1) and the moderate area major source threshold (100 tons/year). If the severe 1-hour area had been redesignated to attainment prior to the time of the 8-hour designations and was subject to PSD rather than NSR, however, the entire designated area for the 8-hour standard would be subject to the offset ratio and major source threshold for a moderate area.

(iv) <u>Planning SIPs.</u> Most areas that are nonattainment under the 1-hour standard have already adopted attainment and ROP plans. However, there are a few areas that remain obligated to submit attainment or ROP SIPs. We have outlined our proposal for addressing ROP elsewhere in this proposed rulemaking and will not repeat those options in detail here. In general, however, we are proposing that States are still obligated to address separately ROP that does not overlap

with ROP obligations for the 8-hour NAAQS. Where the ROP obligations overlap, the area need not separately address ROP for the 1-hour standard. For ROP already adopted into the SIP, we are proposing that the State may remove or revise control measures needed to meet the ROP milestone if such control measures were "discretionary," as discussed above. But, a State could not revise or remove control measures if they would interfere with meeting the ROP goals. In other words, the CAA-mandated ROP emission reduction targets that applied for the 1-hour standard would still have to be met, but discretionary measures adopted to meet those targets could be modified, if the State makes the necessary showing under section 110(1).

With respect to attainment demonstrations, we are soliciting comment on the interpretation we should take for the two scenarios we believe exist. The first scenario would be a State that does not have a fully approved attainment demonstration under the 1-hour standard because it has failed to act in a timely manner. The second scenario is an area subject to an obligation to submit an attainment demonstration under the 1-hour standard in the future. In general, since attainment demonstrations are planning SIPs, and States must now be planning to attain the 8-hour NAAQS, one might argue that Congress could not have intended areas to continue to plan to meet a standard that

EPA no longer considers to be adequately protective of public health. This is especially true when to do so would divert resources from planning to meet the 8-hour standard. In contrast, one could argue that allowing areas to bypass planning obligations under the 1-hour standard will delay attainment of health protection since States have more time to submit attainment plans under the 8-hour standard than under the 1-hour standard.²⁸

There are some cases where a State does not have a fully-approved attainment demonstration because it has failed to act in a timely manner. To lift that obligation from those areas simply because EPA had adopted a more stringent NAAQS could result in a more preferential treatment of those areas over areas that did adopt fully-approvable attainment demonstrations with the requisite controls. For example, if an area has adopted controls to demonstrate attainment of the 1-hour standard, it may not remove those controls from its SIP without a demonstration

²⁸For instance, an area with a past-due obligation to revise its SIP to develop a new attainment demonstration for the 1-hour standard could possibly submit such a revision within the next year or so (2004-2005), with emissions reductions beginning to occur likely within 1 or 2 years (by 2006-2007). If this area were now only required to address the 8-hour standard, it would not have to submit a new attainment demonstration until 2007, as proposed elsewhere in this proposed rule, with emissions reductions occurring from that demonstration likely a year or more after 2007, which is several years after the time period possible by fulfilling the existing obligation.

that those controls would not interfere with attainment or progress toward the 8-hour standard (or any other applicable requirement of the CAA). Such an area likely would have more stringent control obligations in place than the area without a fully-approved attainment SIP and would have a high hurdle to removing or altering those controls. In contrast, the area without a fully-approved attainment demonstration would likely make slower progress toward attaining the 8-hour NAAQS (at least in the short-term) because it does not have all necessary measures in its approved SIP and--without a clear requirement to the contrary--would be under no pressure to have those measures in its SIP until its attainment demonstration for the 8-hour NAAOS is due.

For the following examples of actual situations, we are soliciting comment on whether to retain the obligation to develop a 1-hour attainment demonstration or to determine that the requirement no longer applies. In addition, we are soliciting comment on two alternatives that might address some of the inequities, while not subjecting States to the more complicated planning associated with developing two separate attainment demonstrations (one under the 1-hour standard and another under the 8-hour standard). Under the first alternative approach, areas that are subject to an obligation to submit a new or revised attainment

demonstration would instead be required to submit a SIP revision that would obtain an advance increment of emissions reductions toward attainment of the 8-hour ozone standard within a specified, short-term timeframe. For example, we could require these areas to submit within 1 year of promulgation of the implementation rule a plan revision that requires a specific percentage of emissions reductions (e.g., 5 percent or 10 percent) from the baseline emissions for the 8-hour NAAQS. In addition, we could require that the measures be implemented in the near term, e.g., no more than 2 years after the required submission date. Under the second alternative, areas with an outstanding obligation to submit a 1-hour attainment demonstration would be required to submit their 8-hour ozone attainment demonstration early in lieu of being required to submit a 1-hour attainment demonstration. Submittal of an early 8-hour attainment demonstration would likely prevent the inequity of areas avoiding emissions reductions in the short term, as described in the preceding footnote.

- Example 1: An area has not met in part or in full a past-due obligation to submit a 1-hour attainment demonstration required because EPA reclassified the area to a higher classification after it failed to attain the 1-hour standard by its attainment date.
- Example 2: An area is subject to an obligation to submit

an attainment demonstration in the future, as is the case where EPA applied its attainment date extension policy rather than reclassifying an area that failed to meet its attainment date and EPA has subsequently reclassified the area or soon will do so, because of the courts' rejection of the extension policy.

- (v) Other obligations. A number of areas have SIPs that contain commitments to review their progress toward attaining the 1-hour NAAQS (in some cases, these are called "mid-course reviews"). These SIP-approved commitments are enforceable, and EPA and the States can use these mid-course reviews to ensure that progress is being made consistent with the analysis in the area's 1-hour attainment demonstration. The State remains obligated to honor these commitments.
- b. What obligations continue to apply for areas that are designated attainment under the 8-hour standard and that were designated nonattainment for the 1-hour standard on or after November 15, 1990?
- (i) Obligations related to NSR. Areas that are in attainment for the 8-hour ozone NAAQS would not be subject to nonattainment NSR for the 8-hour standard. We believe it makes little sense to require nonattainment NSR to continue simply because these areas were previously designated nonattainment for the 1-hour standard. Thus, we propose

that these areas would be subject to PSD and would not be subject to the nonattainment NSR offset and major source thresholds that applied under their classification for the 1-hour standard.

(ii) Obligations related to planning obligations other than maintenance plans. With respect to SIP planning obligations (ROP plans and attainment demonstrations), we are proposing that the SIP planning requirements that applied for purposes of the 1-hour standard would not continue to apply to these areas as long as they continue to maintain the 8-hour NAAQS. Thus, even if these areas have failed to meet ROP or attainment plan obligations for the 1-hour standard, they would not be required to meet them for so long as they remain in attainment with the 8-hour standard. discussed below, however, we are proposing that such areas develop a maintenance plan under section 110(a)(1).) approach is consistent with EPA's "Clean Data Policy"29 under the 1-hour standard, which provides for these planning obligations to be stayed once an area attains the standard, but only for so long as an area remains in attainment of the 1-hour standard. If such an area violates the 8-hour NAAQS-

²⁹Memorandum of May 10, 1995, "RFP, Attainment Demonstration, and Related Requirements for Ozone Nonattainment Areas Meeting the Ozone National Ambient Air Quality Standard," from John S. Seitz, Director, Office of Air Quality Planning and Standards. Available at: http://www.epa.gov/ttn/oarpg/t1/memoranda/clean15.pdf.

-prior to having an approved maintenance plan in effect (as proposed below to be required for these areas)—those obligations would once again apply in the same manner that they apply in areas designated nonattainment for the 8-hour ozone NAAQS.

maintenance plans. The issue of what obligation remains with respect to "non-discretionary" control measures approved into the SIP or required under the CAA is more difficult. Our approach for these is based on the CAA's requirements for maintenance plans. (Consistent with our proposal for discretionary control measures in areas designated nonattainment for the 8-hour NAAQS, we would permit areas to modify discretionary measures for areas designated attainment for the 8-hour NAAQS so long as section 110(1) is met.)

If EPA determined that these areas³⁰ were required to develop maintenance plans pursuant to section 175A, then they would need to keep (or to adopt and then keep) those control measures in the SIP, though they could shift them to contingency measures. Some commenters urged us to require all areas previously designated nonattainment for the 1-hour NAAQS to retain (where the area had been redesignated to

 $^{^{30}}$ Areas that are designated attainment under the 8-hour standard and that were designated nonattainment for the 1-hour standard on or after November 15, 1990.

attainment) or develop (where the area was still designated nonattainment for the 1-hour NAAQS at the time of 8-hour designations) a section 175A maintenance plan. However, we do not believe that a section 175A maintenance plan is mandated or is necessary for areas initially designated attainment for the 8-hour NAAQS.

Section 175A maintenance plans are required for areas that were designated nonattainment for a NAAQS and then subsequently redesignated to attainment for that NAAQS. The areas addressed in this section have never been designated nonattainment for the 8-hour ozone NAAQS. Moreover, they have a maintenance obligation that already applies: section 110(a)(1) requires areas to demonstrate how they will attain and maintain a new or revised NAAQS.³¹ Therefore, we do not believe that Congress mandated that such areas be subject to the section 175A maintenance plan obligation for the 8-hour NAAQS, nor do we believe it is necessary to interpret that provision to apply.

For an area that was never redesignated to attainment for the 1-hour standard and never had a section 175A maintenance plan, we are proposing that if the area wants to revise any part of its current 1-hour SIP, the area must

³¹Based on ambient ozone data for the period 1998 to 2000 for the hypothetical nonattainment areas, we identified approximately 20 areas that are currently designated nonattainment under the 1-hour standard but that will likely be designated attainment under the 8-hour standard).

first adopt and submit a maintenance plan consistent with section 110(a)(1). Moreover, even if the State elects not to revise its existing SIP, we are proposing that the area submit a section 110(a)(1) maintenance plan within 3 years of designation as attainment for the 8-hour NAAQS. believe that the maintenance plan should provide for continued maintenance of the 8-hour standard for 10 years following designation for the 8-hour NAAQS and should include contingency measures. Unlike section 175A, section 110(a)(1) does not address contingency measures and thus does not specify that mandated controls in the existing SIP must be shifted to contingency measures if modified or removed. We are proposing that so long as the State adopts sufficient measures as contingency measures, it can modify or remove control measures in the approved SIP so long as it makes a demonstration consistent with section 110(1).

We are also proposing that areas with approved 1-hour section 175A maintenance plans will be able to modify those maintenance plans consistent with their obligation to have a maintenance plan for the 8-hour NAAQS under section 110(a)(1). For these areas, we are proposing that the following obligations could be removed from the SIP so long as the State demonstrates that the area will maintain the 8-hour standard consistent with section 110(a)(1) for a period of 10 years following designation for the 8-hour NAAQS:

- the obligation to submit a maintenance plan for the 1-hour standard 8 years after approval of their initial
 1-hour maintenance plan;
- the requirement to implement contingency measures upon a violation of the 1-hour ozone standard; however, such areas would need contingency measures as part of a maintenance SIP for the 8-hour NAAQS and States could elect to modify the existing contingency measure trigger so that it is based on a violation or exceedance of the 8-hour standard.
- (iv) Obligations related to conformity. For all areas designated attainment for the 8-hour ozone NAAQS, the requirement to demonstrate conformity to the 1-hour standard would no longer apply once the 1-hour standard is revoked in whole or determined not to apply for that purpose under a partial revocation of the 1-hour standard (as proposed below). Under section 176 of the CAA, conformity applies to areas designated nonattainment or subject to the requirement to develop a maintenance plan pursuant to section 175A. Areas designated attainment for the 8-hour standard would no longer be subject to the obligation to demonstrate conformity to the 1-hour emissions budgets in an approved attainment or ROP SIP or an approved section 175A maintenance plan for the 1-hour standard. The reason for this is that, under the options proposed below, they would

either no longer be designated nonattainment for the 1-hour standard or the nonattainment designation would no longer apply for purposes of conformity, and the area would no longer be required to develop a maintenance plan under section 175A for purposes of the 1-hour standard.

c. What happens with respect to the NO, SIP Call?

Section 110(a)(2)(D) of the CAA establishes requirements for States to address the problem of transport. It requires a SIP to prohibit the State's sources from emitting air pollutants in amounts that will contribute significantly to nonattainment, or interfere with maintenance, in one or more downwind States. As noted above in section I of this proposal, in 1998, EPA called on 22 States and the District of Columbia ("States") to reduce emissions of NO_x consistent with budgets set for each State. (63 FR 57356, October 27, 1998). Furthermore, EPA granted petitions under section 126 and thus directly regulated certain sources of NO_x emissions in many of the States covered by the NO_x SIP Call. (65 FR 2674, January 18, 2000). Below, we refer to these collectively as the "NO_x transport rules."

The $\mathrm{NO_x}$ transport rules were designed to prevent upwind $\mathrm{NO_x}$ emissions from contributing to nonattainment in a downwind area for both the 1-hour and 8-hour ozone NAAQS. The EPA, however, stayed the 8-hour basis for the $\mathrm{NO_x}$

transport rules in response to the extensive and extended litigation (described above) that occurred concerning the establishment of the 8-hour ozone standard. We intend to take rulemaking action to lift the stay of the 8-hour basis for these rules. We recognize, however, that concerned parties may attempt to challenge the 8-hour basis for the NO_x transport rules when EPA lifts the stay.

We believe it important to ensure that the transition to the 8-hour standard does not have the effect of jeopardizing the controls required to be in place under the NO_x transport rules. Regardless of whether EPA lifts the stay of the 8-hour basis for these rules, the controls required have substantial benefits for reductions of both 1-hour and 8-hour ozone levels. We believe that relaxing such controls would be contrary to the principles we identified above for an effective transition. Consequently, we are proposing that States must continue to adhere to the emission budgets established by the NO_x SIP Call after the 1-hour standard is revoked in whole or in part, as proposed below. Similarly, we are not proposing to revoke or modify its section 126 regulation.

However, as they do now, States retain the authority to revise the control obligations they have established for specific sources or source categories, so long as they continue to meet their SIP Call budgets. In addition,

consistent with section 110(1), the States would need to demonstrate that the modification in control obligations would not interfere with attainment of or progress toward the 8-hour NAAQS or with any other applicable requirement of the CAA.

d. What additional obligations under part D of title I of the CAA would not continue to apply after the 1-hour standard is revoked in whole or in part?

As discussed elsewhere in this proposal, we are proposing that areas would not be obligated to continue to demonstrate conformity for the 1-hour standard once the 1-year grace period for application of conformity for the 8-hour standard has elapsed.

In addition, EPA would not take certain actions with respect to the 1-hour ozone NAAQS. First, we are proposing that we would no longer make findings of failure to attain the 1-hour standard and, therefore, would not reclassify areas to a higher classification for the 1-hour standard based on a failure to meet the 1-hour standard. We believe that areas should focus their resources on attainment of the 8-hour standard and that it would be counterproductive to establish new obligations for States with respect to the 1-hour standard after they have begun planning for the 8-hour standard. (Moreover, we note that the attainment dates for marginal, moderate and serious areas have passed and the CAA

does not provide for reclassification of severe areas in the absence of a request by the State.) The EPA, of course, must ensure that areas are continuing to make progress toward cleaner air. If EPA determines that a State is not adequately implementing an approved SIP and achieving air quality reductions in a timely manner, EPA may enter into an informal process to ensure the State takes any necessary action³² or, alternatively, may take more formal action such as making a finding of failure to implement the SIP or issuing a SIP Call to require action. As noted above, many areas have SIPs that contain commitments to review their progress toward attaining the 1-hour NAAQS ("mid-course review"). These SIP-approved commitments are enforceable, and EPA and the States can use these mid-course reviews to ensure that progress is being made consistent with the analysis in the area's 1-hour attainment demonstration.

4. <u>Does the requirement for continued implementation of the</u> obligations addressed above expire at some point?

The SIP obligations under the 1-hour standard for an area's classification under the 1-hour standard would not expire after the 1-hour standard is revoked in whole or in part. However, for those mandatory requirements that

³²For instance, upon discussion between EPA and States, some States have in the past voluntarily agreed to revise their SIPs when it appears that the SIP is inadequate to attain or maintain the NAAOS.

continue to apply to an area due to the area's classification for the 1-hour NAAQS, we are proposing two options for when the State may move the mandatory measures to a maintenance plan in the SIP and treat them as contingency measures:

- a. Option 1. When the area achieves the level of the 1-hour ozone standard (even if the area has not yet attained the 8-hour standard). The rationale for this option is that Congress intended an area to continue to implement these obligations until it attained the 1-hour standard, at which time the area would be able to discontinue implementation upon a showing of continued maintenance. However, in such a case, the area could not remove the measures from the SIP; rather, it could shift such measures to contingency measures.
- b. Option 2. When the area attains the 8-hour standard and is designated attainment (regardless of when, if ever, the area attains the 1-hour standard). The rationale for this option is that the 8-hour standard is the standard that EPA has determined will protect public health and the environment. Once an area demonstrates it has met and can maintain the health protective standard, it would be appropriate to remove or modify those controls.

It should be noted that either of these two options could apply for either of the transition options, discussed

in section 2, above.

It should also be noted that the SIP obligations would include not only requirements in the 1-hour nonattainment area but also for the SIP in general, including the SIP requirements to address the NO, SIP call. We are proposing under the anti-backsliding provision in section 110(1) to require that the SIP retain the NO_x SIP call controls that have already been approved. In the absence of appropriate regional scale modeling that would demonstrate that changing a SIP Call control to a contingency measure would not interfere with attainment or maintenance in any other State, the State could not shift SIP Call control strategies to contingency measures. The State would, of course, also have to submit a demonstration that the SIP change would not interfere with attainment or reasonable further progress for any air quality standard or other applicable requirement of the Act.

5. How will EPA ensure that the public knows which areas must continue provisions under the 1-hour SIPs if EPA revokes the 1-hour standard?

The EPA would promulgate regulatory provisions identifying the obligations that areas remain subject to and identifying the areas. If EPA ultimately chooses to revoke the 1-hour standard and the associated designations and classifications shortly after designations for the 8-hour

standard (as proposed below), EPA would ensure that there are provisions in the Code of Federal Regulations (CFR) that continue to define the boundaries for those areas. The reason for this is that boundaries for 8-hour ozone nonattainment areas may not be coextensive with those for the 1-hour standard, and EPA would need to make clear which areas or portions of areas must continue to implement obligations due to their 1-hour classification.

D. Should prescribed requirements of subpart 2 apply in all 8-hour nonattainment areas classified under subpart 2, or is there flexibility in application in certain narrowly defined circumstances?

1. Background

The 1990 CAA Amendments overhauled the CAA's requirements for ozone nonattainment areas and, in doing so, specified new mandatory measures for many areas. The new approach embodied in subpart 2 was to classify areas according to the severity of their pollution. Areas with more serious ozone pollution were allowed more time to meet the standard – but were required to adopt more numerous and stringent measures depending on their classification.

Congressional proponents of this approach argued that specifying mandatory measures in the statute was necessary because States and EPA, prior to 1990, had failed to ensure that SIPs achieve steady reasonable progress in reducing

emissions or to require readily available measures that were cost effective and needed to meet the standard.

Mandatory subpart 2 requirements for moderate and higher-classified areas include, for example, specific ROP requirements (including a 15 percent VOC reduction for moderate and above areas), basic I/M programs, a requirement that sources subject to NSR obtain emissions offsets at a ratio of 1.15-to-1, and RACT for NO_x sources as well as VOC sources. Serious and severe areas are subject to additional measures such as further ROP requirements, applicability of NSR to smaller sources, enhanced I/M, and applicability of RACT to smaller sources. (Appendix A presents a summary comparison of measures under subparts 1 and 2.)

For the proposed 8-hour ozone implementation strategy, EPA has examined the issue of mandatory measures from both legal and policy standpoints. The EPA's legal view is guided by the Supreme Court decision. The Court held that Congress drastically limited EPA's discretion on whether the mandatory requirements of subpart 2 will apply to 8-hour areas by concluding that the classification scheme of subpart 2 applied for purposes of a revised ozone NAAQS. ATA I, 175 F3d at 1048-1050.

As discussed elsewhere, the Supreme Court decision states that subpart 2 provides for classification of areas under the 8-hour standard. With respect to the requirements

of subpart 2, the Supreme Court stated, "The principal distinction between Subpart 1 and Subpart 2 is that the latter eliminates regulatory discretion that the former allowed." Whitman 121 S.Ct. at 918. The Court went on to state, "Whereas Subpart 1 gives the EPA considerable discretion to shape nonattainment programs, Subpart 2 prescribes large parts of them by law." Id. The Court also stated, "EPA may not construe the statute in a way that completely nullifies textually applicable provisions meant to limit its discretion." Id. 918-919.

Once an area is classified under subpart 2, the subpart 2 requirements apply. The EPA may have some limited ability to change or limit subpart 2 controls, consistent with the statutory language, but EPA cannot broadly waive those requirements. For example, EPA may have some flexibility to modify regulatory requirements for programs such as NSR (discussed elsewhere in this proposed rulemaking). Furthermore, subpart 2 provides discretion to EPA in implementing certain provisions already, such as waivers for stage II vapor recovery, NO_x RACT and NO_x NSR. In addition, case law may provide EPA with some flexibility to waive federally applicable requirements on a case-by-case basis where application of those requirements would produce an "absurd result."

With respect to policy considerations, some commenters at public meetings or in written submissions to EPA have expressed the view that mandatory measures are needed to ensure actions are taken, but a number of commenters have raised concerns. These include whether mandated VOC controls will be appropriate for all areas in the future, and whether mandatory measures are appropriate in areas projected to attain in the near term. A number of commenters recommended that EPA allow for flexibility in implementing the 8-hour ozone standard and not require mandatory measures, such as local VOC measures, where they would not be very effective in achieving attainment of the standard. In many cases, particularly for areas that would be new nonattainment areas under the 8-hour standard, region wide NO, controls and national controls on mobile sources are predicted to greatly reduce the areas' ozone levels and to bring many into attainment without additional local emission controls.

Although a number of comments were received on the issue of flexibility, many commenters on this issue took the position that they would prefer areas to be classified under subpart 1 rather than subpart 2. Some commenters did recommend that EPA make the argument that new information about the relative benefits of NO_x and VOC control would lead to allowing more tailored controls for a number of

areas, rather than the one-size-fits-all approach of subpart 2. However, commenters did not suggest how the CAA could be interpreted to allow the flexibility they were advocating for the mandatory requirements of subpart 2. Other commenters argued that the subpart 2 measures are mandatory under the CAA for areas classified under subpart 2 and that the CAA does not provide flexibility to waive those requirements.

Regarding the VOC/NO_x issue, we observe that scientific understanding of ozone pollution and the impact of control strategies has improved over time. Prior to 1990, the main focus of ozone control strategies was VOC control. Since then, scientific studies have more clearly recognized the role of NO_x , biogenic emissions, and transport of ozone and NO_x in ozone nonattainment. In response, EPA's ozone strategy for the 1-hour standard evolved to put greater emphasis on controlling NO_x in addition to VOC and to require control of NO_x emissions that contribute to interstate ozone problems.

We recognize that the relative effectiveness of VOC and NO_x controls will vary from area to area, depending significantly upon VOC/NO_x ratios in the atmosphere. Current scientific information shows that VOC reductions will reduce ozone in urban areas and in other areas where there is excess NO_x available for reaction. Ozone levels in

areas that are less urban and have lower NO_x emissions, or that have high biogenic VOC levels, may be more sensitive to NO_x control and less sensitive to VOC control. Because ozone formation is greatly affected by meteorological conditions and source/receptor orientation, ozone formation may be limited by either VOC or NO_x concentrations at different times and locations within the same area.

In order to support the approach proposed below, we solicit relevant technical information on this issue from States and others.

2. Approach being proposed

In line with the legal interpretation above, we are proposing that subpart 2 requirements would apply to each area classified under subpart 2 consistent with the area's classification. However, today's proposal contains several features intended to provide States with flexibility on the measures required to be included in SIPs for 8-hour areas.

First, as explained in the section on classifications above, proposed classification option 2 would result in a number of areas being classified under subpart 1 rather than under subpart 2. Second, for both classification options, we are proposing an incentive feature that would allow areas to qualify for a lower classification with fewer mandatory requirements if the area could show it will meet the standard by the deadline for the lower classification. This

would, for example, allow any area projected to attain by 2007 based on existing Federal measures and any State or local measures approved into the SIP to be classified as marginal and to avoid subpart 2 mandatory measures—some of which may be significant—that apply to higher classifications.

Under either of our proposed classification frameworks, a majority of potential 8-hour areas would not be subject to significant subpart 2 mandatory measures because they would be classified marginal or lower. Based on our analysis of hypothetical nonattainment areas, there would be fewer than 10 potential 8-hour nonattainment areas classified "serious" or above, and these areas already are implementing requirements applicable to serious or above areas for the 1hour standard. Therefore, the main impact of subpart 2 mandatory measures in 8-hour implementation would be on (1) areas that are classified as moderate, and did not have to meet moderate or above requirements for the 1-hour standard, (2) areas classified as moderate or above that would be subject to ROP requirements for the 8-hour NAAQS, and (3) new counties or areas included as part of a serious or higher classified nonattainment area.

As a third flexibility mechanism, we are proposing to consider allowing case-by-case waivers when sufficient evidence is presented that application of a specific

requirement in a particular area would cause absurd results. Evidence of an absurd result might, for example, include a modeled demonstration that future VOC reductions required under subpart 2 for a particular area would actually cause ozone to increase more than a de minimis amount and therefore increase the amount of NO_x emissions reductions needed for the attainment demonstration. Such a showing would also have to account for the potential benefits of the mandated controls in downwind areas in determining whether on the whole the application of the subpart 2 measure would produce an absurd result.

We believe that absurd results will happen only rarely in those cases where application of the requirement in that area would thwart the intent of Congress in enacting the relevant provisions of the CAA. In such cases, EPA may be able to provide limited relief to the area, but only to the degree needed to protect Congressional intent. For example, we believe that the purpose of the 15 percent VOC ROP requirement is to ensure that areas make progress cleaning up their air and moving toward their goal of attainment in the first 6 years following the emissions baseline year. If an area could demonstrate that reductions in VOC would provide no progress toward attaining the standard, EPA may be allowed to interpret the statute to allow for reduction in $NO_{\rm x}$ emissions instead. The EPA could not, however,

simply waive the requirement for the area to meet the ROP goals of the CAA. Moreover, it would not be sufficient for the area to show that VOC reductions would be less beneficial than NO_{x} reductions. While one might contend that such a result is not the most logical result, it is not absurd. The above example is a simplistic example-application of the absurd results test in any specific situation would likely be more complex. In any specific situation, we would need to consider all of the facts in light of various statutory provisions. For example, we would need to consider that another goal of the SIP provisions in the CAA is to mitigate transport of ozone (and ozone precursors). Therefore, in determining whether there is an "absurd result," we would not only need to consider the implications for the specific area asserting an absurd result, but also the effects on downwind areas.

A State attempting an absurd results demonstration would have to work very closely with EPA to ensure that the demonstration passes the highest standards of technical credibility. If we had information that the agency believes supports an absurd results showing, we would make that information available to the State. The State would, of course, have to subject this demonstration to the same public process carried out for the SIP submission itself prior to submission to EPA of the SIP containing the

demonstration. In no way would this waiver exempt an area from the requirement to demonstrate attainment by the attainment date or to demonstrate RFP toward attainment consistent with the area's classification. We would have to review the State's demonstration as to whether the result is "absurd" in light of the particular statutory requirement at issue and within the context of the statute as a whole. Simply because a State may demonstrate an absurd result for purposes of meeting one statutory provision, such as the requirement for a 15 percent VOC reduction within 6 years after a base year, this does not imply that some other provision of the CAA that requires VOC reductions is automatically considered "absurd."

3. Other approaches considered

We considered a number of other options for allowing additional flexibility for subpart 2 requirements. These other options that were considered but are not being proposed are described in a separate document available in the docket.³³

E. What is the required timeframe for obtaining emissions reductions to ensure attainment by the attainment date?

³³Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

Section 172(c)(2) of the CAA requires that emissions reductions needed for attainment be phased in such that RFP toward attainment is achieved. For areas classified as moderate under subpart 2, their attainment date would be as expeditiously as practicable but no later than 6 years after the date of classification. Their ROP requirement would be at least a 15 percent VOC emissions reduction from the base year to be achieved no later than 6 years after the base year. However, if the area needed more than 15 percent VOC reductions in order to demonstrate attainment, then any additional reductions would also have to be achieved by the beginning of the ozone season prior to the area's attainment date.

States should be aware of the consequences of failing to implement the control measures necessary for attainment sufficiently far in advance of the attainment date. For areas covered under subpart 2, section 181(a)(5) of the CAA does allow for up to two 1-year attainment date extensions in certain circumstances. We are proposing how those extension provisions would be implemented elsewhere in this proposal under the discussion of attainment dates. To obtain the first of the 1-year extensions, the CAA basically requires that the area be meeting the level of the standard in the attainment year itself, even if the area has not actually attained considering the most recent 3 years of

data. Thus, the States should ensure that the emissions reductions be implemented to ensure that ozone levels for the ozone season preceding the attainment date are below the level of the standard. If an area does not meet the eligibility requirements for a 1-year extension (as proposed elsewhere in this rulemaking) in the attainment year, then the area would not be eligible for an attainment date extension, and EPA would have an obligation to reclassify the area to a higher classification ("bump-up"). A marginal area with an attainment date 3 years after its nonattainment designation that fails to attain would be subject to bump-up to at least moderate, and would then have to prepare a plan to attain within 3 years afterward (6 years after their nonattainment designation).

There is further discussion of this situation as it relates to the 1-hour ozone standard in the General Preamble of April 16, 1992 (57 FR 13498, 13506); this discussion may have some applicability to the 8-hour standard.

Areas covered under subpart 1 are also able to obtain up to two 1-year extensions of the attainment date (see section 172(a)(2)(C)). There is no provision for bump-up in classification similar to that under subpart 2. However, if an area fails to attain, section 179 of the CAA provides that EPA publish a finding that the area failed to attain. The State then must submit within 1 year after that

publication a revision to the SIP that provides for attainment within the time provided under section 179. Section 179 also provides that the SIP revision must also include any additional measures that EPA may prescribe.

Elsewhere in this notice of proposed rulemaking, we also refer to requiring that emission reductions needed to for attainment need to be implemented by the attainment date. By this, we mean that they must be implemented by the beginning of the ozone season prior to the attainment date. In other words, if the attainment date is April 15, 2010, the reductions would need to be implemented by the beginning of the ozone season in the previous year (2009). Ozone seasons are defined in 40 CFR Part 58, Appendix D; for many States, the ozone season starts March 1 or April 1.

F. How will EPA address long-range transport of groundlevel ozone and its precursors when implementing the 8-hour ozone standard?

1. <u>Background</u>

Although much progress has been made over the last decade to improve air quality, many States contain areas that have not yet attained the 1-hour ozone standard and/or that are violating the 8-hour ozone standard. Some of these areas are significantly affected by interstate ozone transport from upwind areas. Wind currents can transport ozone and NO_x , a primary precursor to ozone, long distances, affecting multiple States downwind of a source area. The EPA

recognizes that this type of interstate transport can make it difficult - or impossible - for some States to meet their attainment deadlines solely by regulating sources within their own boundaries. The 1990 Amendments to the CAA reflect Congress' awareness that ozone is a regional, and not solely a local, problem. Section 110(a)(2)(D) provides an important tool for addressing the problem of transport. provides that a SIP must contain adequate provisions to prohibit sources in a State from emitting air pollutants in amounts that contribute significantly to nonattainment, or interfere with maintenance, in one or more downwind States. Section 110(k)(5) authorizes EPA to find that a SIP is substantially inadequate to meet any CAA requirement, including the requirements of section 110(a)(2)(d). If EPA makes such a finding, it must require the State to submit, within a specified period, a SIP revision to correct the inadequacy. The CAA further addresses interstate transport of pollution in section 126, which authorizes any State to petition EPA for a finding designed to protect the State from significant upwind sources of air pollutants from other States.

In the past several years, EPA has conducted two rulemakings to control interstate ozone transport in the eastern U.S. In 1998, EPA issued the NO_x SIP Call, which requires certain States in the eastern U.S. to meet

statewide NO_x emissions budgets (63 FR 57356, October 27, 1998.) State programs to implement the rule have focused on reducing emissions from electric power generators and large industrial emitters. In addition, in response to petitions submitted by several northeastern States under section 126, EPA issued a separate rule (usually known as the Section 126 Rule) to establish Federal control requirements for certain electric power generators and industrial boilers and turbines in upwind States (64 FR 28250, May 25, 1999 and 65 FR 2674, January 18, 2000). For both rules, the compliance date for achieving the required NO, reductions is May 31, 2004. These two transport rules overlap considerably, with the NO, SIP Call being the broader action affecting more States. All the States affected by the Section 126 Rule are covered by the NO, SIP Call. Therefore, EPA coordinated the two rulemakings and established a mechanism under which the Section 126 Rule would be withdrawn for sources in a State where EPA has approved a SIP meeting the NO_{\star} SIP Call. 34

In both the NO_{x} SIP Call and the Section 126 Rule, EPA made determinations of whether upwind sources are

³⁴As a result of court actions, certain circumstances upon which the Section 126 Rule withdrawal provision was based have changed. The compliance dates for the Section 126 Rule and the NOx SIP Call have been delayed and the NOx SIP Call has been divided into two phases. The EPA recently issued a proposed rulemaking to update the withdrawal provision so that it will operate appropriately under these new circumstances (68 FR 16644, April 4, 2003).

significantly contributing to downwind nonattainment problems under both the 1-hour and 8-hour ozone standards. In the final SIP Call rule, EPA determined that the same level of reductions was needed to address transport for both the 1-hour and 8-hour standards. Thus, unlike in the past, States affected by transport can develop their new ozone implementation plans with the knowledge that the issue of interstate transport has already been addressed up front. This approach will provide these States with certainty that they will benefit from substantial emissions reductions from upwind sources and give them significantly improved boundary conditions that they can rely on as they work to identify additional emission reductions they will need to include in a local area's attainment SIP.

2. The EPA's anticipated approach.

In providing their views to EPA on the 8-hour ozone implementation rule, the Ozone Transport Commission (OTC)

response to the extensive and extended litigation that occurred concerning the establishment of the 8-hour ozone standard. (65 FR 56245, September 18, 2000 and 65 FR 2674, January 18, 2000). Recently, however, the Administrator signed a final rule on the UV-B issue and reaffirmed the 8-hour ozone standard (68 FR 614, January 6, 2003), which was remanded to EPA in ATA I, 175 F.3d 1027. Having now reaffirmed the 8-hour standard, the Agency plans to take action in the near future to reinstate the 8-hour bases for both the NOx SIP Call and the Section 126 Rule. Such action would provide the initial basis for dealing with ozone transport as part of the implementation of the 8-hour standard.

and other State commenters have argued that the NO_{x} SIP Call and the Section 126 Rule are not fully adequate. In their view, additional steps are needed to reduce interstate transport of ozone and NO_{x} to assist downwind areas in meeting the 8-hour ozone standard. In particular, these commenters have expressed continued concern about upwind emissions from power plants and other major sources and transported pollution from upwind cities.

As described above, EPA has already taken two actions to address the issue of interstate transport for purposes of the 8-hour standard. The NO_{x} SIP Call and the Section 126 Rule require that States within the SIP Call make significant emissions reductions from power plants and other major sources that contribute to ozone nonattainment in downwind areas. For both rules, the compliance date for achieving the required emissions reductions is May 31, 2004.

The EPA intends to investigate the extent, severity and sources of interstate ozone transport that will exist after the NO_x SIP Call and the Section 126 Rule are implemented in 2004. The Agency believes that it may be appropriate to consider the need to reduce interstate transport that contributes to unhealthy levels of $PM_{2.5}$ in downwind nonattainment areas when looking at any additional requirements for reducing the transport of ozone or ozone precursors.

As noted above, the President recently proposed the CSA that, among other things, would achieve significant reductions - beyond those required under the SIP Call and the Section 126 Rule - in the regional transport of ozone and ozone precursors. Detailed modeling by EPA for the year 2010 shows that the 2008 Phase I NO_x limits in the CSA would reduce maximum 8-hour ozone levels in many parts of the eastern U.S., including a number of areas likely to be designated nonattainment for the 8-hour standard. The modeling results are available on the web at www.epa.gov/clearskies.

The Clear Skies reductions would enable several additional areas to meet the 8-hour standard without imposing any additional local controls. A number of other areas would find it easier to meet the 8-hour standard because of the additional reductions in power plant emissions that would be required under Clear Skies.

However, the Agency has not made a determination that such reductions are warranted under the transport provisions of the CAA. As noted above, in order to evaluate this issue, the Agency intends to investigate the extent, severity and sources of interstate ozone transport that will exist after the existing transport rules are implemented in 2004.

The Agency welcomes input from States and other interested parties as to how to deal with ozone transport

effectively and equitably and on the technical and other issues that will have to be confronted as part of an evaluation of what further steps should be taken beyond the existing NO_{x} SIP Call to deal with ozone transport.

3. Other concerns about transport.

The EPA realizes that, whatever measures may be taken in the future, attainment demonstrations for some areas would continue to be complicated by the effects of ozone and transport from upwind sources and other nonattainment areas in cases where upwind source controls are scheduled for implementation after the downwind area's attainment date (e.g., 2007 attainment date).

Downwind areas could be in one of two situations. In the first situation, an area might be receiving such high levels of transported ozone or ozone precursors that even if it reduced its emissions dramatically (e.g., totally eliminated its own emissions), the incoming ozone and precursors would be sufficient to continue to cause violations of the standard beyond the applicable attainment date. In the second situation, the area might be able to achieve additional local reductions sufficient to demonstrate attainment. In this second case, the question arises as to whether it is equitable to require those

reductions or to allow more time for the reductions in the "upwind" area to take place. 36

The EPA solicits comment on how to address this issue. The EPA believes that a subpart 1 area could be granted a later attainment date if warranted considering transport. For areas classified under subpart 2, the statute provides no express relief for these situations. The area does have the option of requesting to be classified to the next higher classification. Thus, where the demonstration of attainment is complicated by transport between two areas of different classifications, the State is still responsible for developing and submitting demonstrations which show that the standard will be attained by the applicable date. In other words, the State must provide for sufficient emissions reductions on a schedule that will ensure attainment in its area.

One approach would be for States to work together in a collaborative process to perform the necessary analyses to identify appropriate controls that provide for attainment

³⁶The CAA's requirement for RACM in section 172(c)(1) does require the SIP to include RACM; EPA has noted in policy elsewhere that a measure is RACM if it is technologically and economically feasible and if it would advance the attainment date. Thus, if there are measures available in the nonattainment area that would advance the attainment date—even if attainment is likely at a later date due to upwind emissions reductions that occur later—then the CAA requires such measures to be in the SIP.

throughout the multi-State area. The EPA believes that the wording in sections 172(c)(1) and 182(b)(1)(A)(i) require the State to develop a plan providing such emissions reductions. States working together in a collaborative process could perform a comprehensive assessment of the impacts of all control measures being implemented in both the local and upwind areas. The analysis may show the extent to which the downwind area is dependent on upwind strategies while fully meeting its own requirements associated with its classification. And upwind areas may provide a comprehensive assessment of the impacts of all control measures being implemented on the downwind areas.

4. Other options considered

We considered a number of other options and approaches for addressing transport. The other options that were considered but are not being proposed are described in a separate document available in the docket.³⁷

G. How will EPA address transport of ground-level ozone and its precursors for rural nonattainment areas, multi-State nonattainment areas, areas affected by intrastate transport, and international transport?

1. Rural transport nonattainment areas

³⁷Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

Section 182(h) recognizes that the ozone problem in a rural transport area is almost entirely attributable to emissions from upwind areas. Therefore, the only requirements for the rural area are the minimal requirements specified for areas expected to attain within 3 years of designation, the assumption being that the controls in the upwind area will solve the remaining nonattainment problem in the rural transport area as well. In these cases, the timing for attainment will depend on the schedule for adoption and implementation of control measures in the upwind areas.

2. <u>Multi-state nonattainment areas</u>

Section 182(j)(2) for multi-State nonattainment areas (i.e., portions of the nonattainment area lie in two or more States) recognizes that one State may not be able to demonstrate attainment for the portion of the nonattainment area within its borders if other States containing the remaining portions of the nonattainment area do not adopt and submit the necessary attainment plan for their portions of the nonattainment area. In such cases, even though the area as a whole would not be able to demonstrate attainment, the sanction provisions of section 179 shall not apply in the portion of the nonattainment area located in a State that submitted an attainment plan.

Section 182(j) defines a multi-State ozone nonattainment area as an ozone nonattainment area, portions of which lie in two or more States. Section 182(j)(1)(A) and (B) set certain requirements for such areas. First, each State in which a multi-State ozone nonattainment area lies, must take all reasonable steps to coordinate the implementation of the required revisions to SIPs for the given nonattainment area [section 182(j)(1)(A)]. Next, section 182(j)(1)(B) requires the States to use photochemical grid modeling or any other equally effective analytical method approved by EPA for demonstrating The EPA is prevented by section 182(j) from attainment. approving any SIP revision submitted under that section if a State has failed to meet the above requirements.

Pursuant to section 182(j)(1)(A), States that include portions of a multi-State ozone nonattainment area are required to develop a joint work plan as evidence of early cooperation and integration. The work plan should include a schedule for developing the emissions inventories, and the attainment demonstration for the entire multi-State area. Each State within a multi-State ozone nonattainment area is responsible for meeting all the requirements relevant to the given area. Care should be taken to coordinate strategies and assumptions in a modeled area with those in other,

nearby modeled areas in order to ensure that consistent, plausible strategies are developed.

3. Intrastate transport

Several State air agency representatives have voiced a concern about intrastate transport of ozone and precursor emissions and have asked EPA to address this concern. One State, for instance, notes that it has upwind areas that are affecting downwind areas and in some cases may be preventing a downwind area from attaining the standard by its statutory date.

We believe that the CAA requires individual States, as an initial matter, to deal with intrastate transport. We realize that some States are structured with semi-autonomous local air agencies that are empowered to address major elements of the SIP process, including preparation of the attainment demonstration. In those situations, the CAA provides that the State retain sufficient backstop authority to ensure all areas within its borders reach attainment, (110(a)(2)(E)). A State could, of course, recommend designation of nonattainment areas that are large enough to encompass upwind and downwind areas of the State and require that the individual jurisdictions work together on an attainment plan that accounts for transport and results in attainment by the attainment date for the entire nonattainment area. Or a State could require the individual

agencies to work together in the same manner as multi-State organizations. In this case, there would be separate nonattainment areas with independent agencies expected to work together to address transport among the nonattainment areas. To facilitate this process, the State could require the agencies to sign a memorandum of agreement which describes the technical and administrative approach for performing the modeling analysis and identifying the appropriate controls measures. Upon a State's request, we would be willing to provide support for these activities.

We also solicit comments on other ways of addressing intrastate transport within the context of the CAA provisions.

4. International transport

a. <u>International transboundary transport</u>. International transboundary transport of ozone and ozone precursors can contribute to exceedances of the NAAQS. It is likely that the international transport of air pollutants will affect the ability of some areas to attain and maintain the 8-hour ozone NAAQS. As States and EPA implement control strategies and national emission reduction programs, the impact of high background levels emanating from outside the U.S. may play a larger role in future attainment demonstrations. We have developed an information document on "International Transboundary Influences and Meeting the NAAQS," which is

located in the Docket to this proposed rulemaking. This document provides information on efforts with Canada and Mexico to address transboundary air pollution as well as additional information for intercontinental modeling work currently underway within EPA.

Section 179B and the SIP approval process. Section 179B of the CAA (International Border Areas), applies to nonattainment areas that are affected by emissions emanating from outside the United States. This section requires EPA to approve a SIP for a nonattainment area if: it meets all of the requirements applicable under the CAA, other than a requirement that the area demonstrate attainment and maintenance of the ozone NAAQS by the applicable attainment date: and the affected State establishes to EPA's satisfaction that the SIP would be adequate to attain and maintain the ozone NAAQS by the applicable attainment date but for emissions emanating from outside the United States. Further, any State that establishes to the satisfaction of EPA that the State would have attained the 8-hour ozone NAAQS, but for emissions emanating from outside the U.S., would not be subject to the attainment date extension provided in section 181(a)(5), the fee provisions of section 185, and the bump-up provisions for failure to attain for 8-hour ozone NAAQS specified in section 181(b)(2).38

In demonstrating that an area could attain the 8-hour ozone NAAQS but for emissions emanating from outside the U.S., approved EPA modeling techniques should be used to the best extent practicable. An emission inventory incorporating vehicle emissions released in the U.S. by foreign vehicles, i.e., those vehicles registered in the adjacent foreign country, must be completed by the States before modeling the U.S. side only and attempting to demonstrate attainment. 39 We recognize that adequate data may not be available for mobile and stationary sources outside the United States. Therefore, modeling, per EPA's "modeling guidance" described elsewhere in the section on attainment demonstrations, may not be possible in all cases. Because very few areas are likely to be affected by this provision, EPA will determine on a case-by-case basis whether the State has satisfactorily made the required demonstration. The State is encouraged to consult with the

³⁸The statute contains a typographical error referring to section 181(a)(2) instead of 181(b)(2).

³⁹As noted elsewhere in this notice, the Consolidated Emissions Reporting Rule (67 FR 39602, June 10, 2002) has established basic emission inventory requirements for all areas of the country and generally requires periodic inventories of emissions that actually occur in the year of the inventory in the U.S. area of interest. This would include emissions from foreign-registered vehicles.

EPA Regional Office in developing any alternate demonstration methods. Methods that the State may want to consider include: using ozone episodes that do not involve international transport of emissions for modeling (see guidance document entitled "Criteria for Assessing Role of Transported Ozone/Precursors in Ozone Nonattainment Areas"), running the model with boundary conditions that reflect general background concentrations on the U.S. side, analyzing monitoring data if a dense network has been established, and using receptor modeling. States should confer with the appropriate EPA Regional Office to establish appropriate technical requirements for these analyses.

5. Additional ways of addressing transport

Additional approaches to address transport are discussed in the section on classifications.

6. <u>State-Tribal transport</u>

States have an obligation to notify Tribes as well as other States in advance of any public hearing(s) on their State plans that will significantly impact such jurisdictions. Under 40 CFR 51.102(6)(i), States must notify the affected States of hearings on their SIPs; this requirement extends to Tribes under 301(d) of the CAA and the TAR. (40 CFR Part 49). Therefore, affected Tribes that have achieved "treatment as States" status must be informed of the contents of such plans and the extent of

documentation to support the plans. For example, in the case where the State models projected emissions and air quality under the SIP, the Tribes should be made aware of these modeling analyses. Tribes may wish to determine if the Tribal area has been affected by upwind pollution and whether projected emissions from the Tribal area have been considered in the modeling analyses.

Generally, Tribal lands have few major sources, but in many cases, air quality in Indian country is affected by the transport -- both long range and shorter distance transport -of pollutants. In many cases, Tribal nonattainment problems caused by upwind sources will not be solved by long-range transport policies, as the Tribes' geographic areas are small. Tribes are sovereign entities, and not political subdivisions of States. Strategies used for intrastate transport are not always available. Most of the strategies and policies used by States in dealing with short-range transport are not available to Tribes, e.g., requiring local governments to work together and expanding the area to include the upwind sources. Unlike Tribes, States can generally require local governments to work together, or make the nonattainment area big enough to cover contributing and affected areas. We believe that it is also unfair to Tribes to require disproportionate local regulatory efforts to compensate for upwind emissions. In many cases,

attainment could not be reached even if emissions from the Tribe were zero.

To address these concerns, we propose to take comment on the following: EPA will review SIPs for their effectiveness in preventing significant contributions to nonattainment in downwind Tribal areas with the same scrutiny it applies to reviewing SIPs with respect to impacts on downwind States. Where a Tribe has "treatment in the same manner as States," EPA will support the Tribe in reviewing upwind area SIPs during the State public comment period.

H. How will EPA address requirements for modeling and attainment demonstration SIPs when implementing the 8-hour ozone standard?

An attainment demonstration SIP consists of (1) technical analyses to locate and identify sources of emissions that are causing violations of the 8-hour NAAQS within nonattainment areas (i.e., analyses related to the emissions inventory required for the nonattainment area), (2) adopted measures with schedules for implementation and other means and techniques necessary and appropriate for attainment, (3) commitments, in some cases, to perform a mid-course review, and (4) contingency measures required under section 172(c)(9) of the CAA that can be implemented without further action by the State or the Administrator to

cover emissions shortfalls in RFP plans and failures to attain. We are soliciting public comment on the following guidance. Associated with the attainment demonstration also are the RFP/ROP plans and the SIP submission concerning RACM, for which we are proposing rules elsewhere in this proposal.

1. <u>Multi-pollutant assessments (one-atmosphere modeling⁴⁰)</u>

Many factors affecting formation and transport of secondary fine particles (i.e., $PM_{2.5}$ components) are the same as those affecting formation and transport of ozone. For example, similarities exist in sources of precursors for ozone and secondary fine particles. Sources of NO_x may lead to formation of ozone as well as nitrates which contribute to the formation of secondary fine particles. Sources of VOC may contribute to ozone formation and may also be sources or precursors for organic particles. Presence of ozone itself may be an important factor affecting secondary particle formation. As ozone builds up, so do hydroxyl (OH) radicals as a result of equilibrium reactions between ozone, water and OH in the presence of sunlight. Hydroxyl radicals are instrumental in oxidizing gas phase SO_2 to sulfuric

⁴⁰Use of models that are capable of simulating transport and formation of multiple pollutants simultaneously. For example, for ozone and fine particles, it is critical that the model simulate photochemistry, which includes interactions among the pollutants and their precursors.

acid, which is eventually absorbed by liquid aerosol and converted to particulate sulfate in the presence of ammonia. Therefore, strategies to reduce ozone can also affect formation of secondary fine particles which contribute to visibility impairment.

Therefore, models and data analysis intended to address visibility impairment need to be capable of simulating transport and formation of both secondary fine particles and ozone. At a minimum, modeling should include previously implemented or planned measures to reduce ozone, secondary fine particles, and visibility impairment. An integrated assessment of the impact controls have on ozone, secondary fine particles, and regional haze provides safeguards to ensure ozone controls will not preclude optimal controls for secondary fine particles and visibility impairment.

The concept of modeling control impacts on all three programs is further strengthened by the alignment of the implementation process for ozone and secondary fine particles. As the dates for attainment demonstration SIPs begin to coincide, the practicality of using common data bases and analysis tools for all three programs becomes more viable and encourages use of shared resources.

States that undertake multi-pollutant assessments as part of their attainment demonstration would assess the impact of their ozone attainment strategies on secondary

fine particles and visibility or perform a consistent analysis for ozone, secondary fine particles, and visibility. To facilitate such an effort, we would encourage States to work closely with established regional haze Regional Planning Organizations (RPOs) and the jurisdictions responsible for developing PM_{2.5} implementation plans. Though the CSA, if enacted as introduced, would provide substantial improvement in air quality for ozone, PM_{2.5} and visibility, States are encouraged to follow EPA's lead and perform similar multi-pollutant assessments as part of their ozone attainment demonstrations, considering the programs that are in place at the time of the assessment. Multi-pollutant assessments are discussed elsewhere in this proposed rulemaking.

2. Areas with early attainment dates

Under section 182(a), marginal areas, which have an attainment date of only 3 years after designation, are not required to perform a complex modeling analysis using photochemical grid modeling. Areas covered under either subpart 1 or 2 with ozone concentrations close to the level of the NAAQS (e.g., within 0.005 ppm), will most likely come into attainment within 3 years after designation as nonattainment without any additional local planning as a result of national and/or regional emission control measures that are scheduled to occur. We have good reason to believe

these areas will come into attainment. Regional scale modeling for national rules, such as the NO_x SIP Call and Tier II motor vehicle tailpipe standards, demonstrates major ozone benefits for the 3-year period of 2004-2006. This period would be relevant for demonstrating attainment within 3 years of designation, assuming designations occur in early 2004. Many similar areas classified as marginal for the 1-hour ozone NAAQS in 1990 came into attainment within the initial 3-year period. As an additional safeguard, if attainment demonstration modeling is performed using multi-State geographic areas, most of these areas with early attainment dates will be included in the modeling analyses conducted by areas with later attainment dates. This will provide an opportunity for review of the impact control programs will have on areas with early attainment dates.

Experience with the 1-hour ozone attainment demonstrations has shown that 3 years is not enough time to perform the detailed photochemical grid modeling needed to develop the demonstration and complete the regulatory process needed to adopt and implement control measures sufficiently before the attainment date. It would not be reasonable to require these areas to expend the amount of resources needed to perform a complex modeling analysis given how close these areas are to meeting the level of the NAAQS. Therefore, we propose that no additional modeled

attainment demonstration would be required for areas with air quality observations close to the level of the standard as described above and where regional or national modeling exists and is appropriate for use in the area demonstrates that an area will attain the 8-hour standard within 3 years after designation. This proposal would apply for areas covered under either subpart 1 or subpart 2.

Areas with early attainment dates with air quality observations that are not close to the level of the NAAQS (as described above) and regional scale modeling for national rules that demonstrates they will not be in attainment within 3 years of designation should consider requesting reclassification to the next higher classification. This reclassification would provide additional time for developing an attainment demonstration SIP and adopting and implementing the control measures needed.

3. Areas with later attainment dates

Areas with later attainment dates (more than 3 years after designation), regardless of whether they are covered under subpart 1 or subpart 2, would be required to do an attainment demonstration SIP. Local, regional and national modeling developed to support Federal or local controls may be used provided the modeling is consistent with EPA's modeling guidance, described below. Several States have

invested considerable time and resources in regional 8-hour ozone modeling projects following this guidance. Since exceedances of the 8-hour ozone NAAQS are more pervasive than 1-hour ozone exceedances, we encourage multi-State applications of the modeling guidance. States should work together and leverage off work under development and resources spent on these projects. This will be most beneficial in developing attainment demonstrations to achieve attainment.

4. <u>Modeling quidance</u>

Section 182 (b) (1) (A) requires ozone nonattainment areas to develop an attainment demonstration which provides for reductions in VOC and NO_x emissions "as necessary to attain the national primary ambient air quality standard for ozone." Section 172(c), requires areas covered under subpart 1 to demonstrate attainment. As noted above, if a subpart 1 area has an attainment date beyond 3 years of designation, we would require the State to develop an attainment demonstration.

Section 182(c)(2)(A) provides that for serious and higher-classified areas the "attainment demonstration must be based on photochemical grid modeling or any other analytical method determined by the Administrator, in the Administrator's discretion, to be at least as effective." A photochemical grid model should meet several general

criteria for it to be a candidate for consideration in an attainment demonstration. Note that, unlike in previous quidance (U.S. EPA, 1991), we are not recommending a specific model for use in the attainment demonstration for the 8-hour NAAQS for ozone. At present, there is no single model which has been extensively tested and shown to be clearly superior or easier to use than other available models. General criteria for attainment demonstrations are contained in 40 CFR part 51, appendix W (i.e., "EPA's Guideline on Air Quality Models", 68 FR 18440, April 15, 2003). Appendix W refers to EPA's May 1999 draft "Guidance on the Use of Models and Other Analyses in Attainment Demonstrations for the 8-Hour Ozone NAAQS" for a set of general requirements that an air quality model should meet to qualify for use in an attainment demonstration for the 8hour ozone NAAQS.41 Thus, States may choose from several alternatives. These include having received a scientific peer review, being applicable to the specific application on a theoretical basis, and having an adequate data base to support its application. It is also important that past applications indicate model estimates are not likely to be

U.S. EPA, (May 1999), Draft Guidance on the Use of Models and Other Analyses in Attainment Demonstrations for the 8-Hour Ozone NAAQS, EPA-454/R-99-004, http://www.epa.gov/ttn/scram, (Modeling Guidance, File name: DRAFT8HR).

biased low and that the model is applied consistently with a protocol on methods and procedures. We plan to finalize this guidance at the same time the final implementation rule is published. Comments on this document are solicited as part of this proposal.

The quidance describes how to apply air quality models. The output from such a model is used to support an attainment demonstration. The recommended procedure for applying a model includes developing a conceptual description of the problem to be addressed; developing a modeling/analysis protocol; selecting an appropriate model to support the demonstration; selecting appropriate meteorological episodes or time periods to model; choosing an appropriate area to model with appropriate horizontal/vertical resolution; generating meteorological and air quality inputs to the air quality model; generating emissions inputs to the air quality model; evaluating performance of the air quality model; and performing diagnostic tests. After these steps are completed, the model is used to simulate effects of candidate control strategies.

The guidance recommends procedures for estimating if a control strategy to reduce emissions of ozone precursors will lead to attainment of the 8-hour NAAQS for ozone. It explains what is meant by a modeled attainment

demonstration, a modeled attainment test, a screening test, and a weight of evidence determination. It also identifies additional data which, if available, should enhance the credibility of model results and results of other analyses used in a weight of evidence determination. States should work closely with the appropriate U.S. EPA Regional Office(s) in executing each step.

We are planning to make substantial changes to the draft version of this document. Changes include: (1) the future year of emission estimates to model, (2) the recommended length of time period to model (i.e., up to full ozone season), and (3) the use of spatial fields of ambient concentrations as part of the "modeled attainment test." We welcome public comments on the quidance at any time and will consider those comments in any future revision of the document. Comments submitted on the modeling guidance document should be identified as such and will not be docketed as part of this rulemaking, nor will a comment/response summary of these comments be a part of the final 8-hour ozone implementation rule since they will not affect the rule itself. The final version of the quidance is scheduled for release by December 2003 and will be posted on EPA's web site (http://www.epa.gov/ttn/scram/).

5. Mid-course review (MCR)

A MCR provides an opportunity to assess whether a nonattainment area is or is not making sufficient progress toward attainment of the 8-hour ozone standard, as predicted in its attainment demonstration. The review utilizes the most recent monitoring and other data to assess whether the control measures relied on in a SIP's attainment demonstration have resulted in adequate improvement in air quality. We believe that a commitment to perform a MCR is a critical element in an attainment demonstration that employs a long-term projection period and relies on weight of evidence. Because of the uncertainty in long-term projections, we believe such attainment demonstrations need to contain provisions for periodic review of monitoring, emissions, and modeling data to assess the extent to which refinements to emission control measures are needed.

A number of States have participated in a consultative process with EPA, which resulted in the development of the 1-hour MCR guidance. We are updating the 1-hour MCR policy and technical guidance to include 8-hour metrics and are soliciting comment on appropriate revisions; final MCR guidance incorporating 8-hour metrics will be available at

⁴²Memorandum of March 28, 2002, from Lydia N. Wegman and J. David Mobley, re: "Mid-Course Review Guidance for the 1-Hour Ozone Nonattainment Areas that Rely on Weight-of-Evidence for Attainment Demonstration." Located at URL: http://www.epa.gov/scram001/guidance/guide/policymem33d.pdf

the time we issue our final implementation rule. States should consult with EPA prior to using a methodology other than the one developed through the public consultative process.

The procedure for performing a MCR contains three basic steps: (1) perform an administrative test (e.g., demonstrate whether the appropriate emission limits were adopted and implemented); (2) analyze available air quality, meteorology, emissions and modeling data and document findings; and (3) document conclusions regarding whether progress toward attainment is being made using a weight of evidence determination (which may or may not include new modeling analyses).

The EPA does not request that States commit in advance to adopt new control measures as a result of the MCR process. Based on the MCR, if EPA determines sufficient progress has not been made, EPA would determine whether additional emissions reductions are necessary from the State or States in which the nonattainment area is located or upwind States, or both. The EPA would then require the appropriate State or States to adopt and submit the new measures within a specified period. We anticipate that these findings would be made as calls for SIP revisions under section 110(k)(5) and, therefore, the period for submission of the measures would be no longer than 18 months

after the EPA finding. Thus, States should complete the MCR 3 or more years before the applicable attainment date to ensure that any additional controls that may be needed can be adopted in sufficient time to reduce emissions by the start of the ozone season in the attainment year.

I. What requirements for RFP should apply under the 8-hour ozone standard?

1. Background

Section 172(c)(2), which is located in subpart 1 of part D of title I, requires State plans for nonattainment areas to require RFP. Section 171(1) of the CAA defines RFP to mean "such annual incremental reductions in emissions of the relevant air pollutant as are required by this part [part D of title I] or may reasonably be required by the Administrator for the purpose of ensuring attainment of the applicable [NAAQS] by the applicable date."

Subpart 2 of part D of title I provides more specific RFP requirements for ozone areas classified under section 181. (In general, we have used the term "RFP" as the more generic progress requirement, whereas it has used the term "rate of progress" or "ROP" to denote the specific subpart 2 progress requirements that are defined as specific percent reductions from a baseline emissions inventory.) In particular, it specifies the base year emission inventory upon which ROP is to be planned for and implemented, the

increments of emissions reductions required over specified time periods, and the process for determining whether the ROP milestones were achieved.

Subpart 2 does not specify ROP requirements for marginal areas. Section 182(b)(1)(A) mandates a 15 percent VOC emission reduction, accounting for growth, between 1990 and 1996 for moderate and above ozone nonattainment areas. Furthermore, section 182(c)(2)(B) of the CAA requires each serious and above ozone nonattainment area to submit a SIP revision providing for an actual VOC emission reduction of at least 3 percent per year averaged over each consecutive 3-year period beginning in 1996 until the area's attainment date (the post-1996 ROP plan). Section 182(c)(2)(C) of the CAA allows for substitution of NO_x for VOC emissions reductions in the post-1996 ROP plan. The EPA's policy, the ${\rm NO}_{\rm x}$ Substitution Guidance (December 15, 1993; available at http://www.epa.gov/ttn/oarpg/t1pgm.html), addresses the substitution of NO, emissions reductions for VOC emissions reductions. The baseline emission inventory for determining the required ROP reductions is specified as 1990.

The requirements for RFP under subparts 1 and 2, as described above, are the minimum required for an area. More reductions may be necessary for attainment within the nonattainment area or where the area contributes to a downwind area's nonattainment problem. Moreover, an upwind

area that contributes to nonattainment in a downwind area may need more reductions in a shorter time in order for the downwind area to reach attainment by its required attainment date.

2. Proposed features in general.

In developing an approach for addressing the RFP requirements for the 8-hour ozone standard, we propose the following:

-The same baseline year would be used both to address growth (in emissions, vehicle miles traveled (VMT) or otherwise) and to calculate the RFP target level.

-Emissions reductions from outside the nonattainment area up to 100 km for VOC and 200 km for NO_x (and statewide if under a regional strategy) would be allowed consistent with EPA's existing December 1997 interim implementation policy for 1-hour ozone NAAQS. 43

-For areas classified under subpart 2, the ROP requirements specified in subpart 2 would apply, namely a 15 percent VOC emission reduction, accounting for growth, in the first 6 years after the baseline year for moderate and above ozone

 $^{^{43}\}mathrm{Memorandum}$ of December 29, 1997 from Richard D. Wilson to Regional Administrators, Regions I-X re: "Guidance for Implementing the 1-Hour Ozone and Pre-Existing PM₁₀ NAAQS." Located at URL: $\frac{\text{http://www.epa.gov/ttn/oarpq/t1/memoranda/iiq.pdf}}{\text{http://www.epa.gov/ttn/oarpq/t1/memoranda/iiq.pdf}}$. The distances used resulted from FACA discussions cited earlier and generally represent transport of 1 to 2 days.

In addition, for areas classified as nonattainment areas. serious and above, the ROP provisions in subpart 2 require a VOC or NO, emission reduction of at least three percent per year averaged over each consecutive 3-year period beginning 6 years after the baseline year (specified as under the 1990 CAAA). Areas classified under subpart 2 as marginal, which are required to attain 3 years following classification, are subject only to such RFP as necessary to attain. We believe the periods for RFP under subpart 2 for the 8-hour ozone NAAQS should run from the date of the baseline year under subpart 2, and would be equivalent to the periods under the 1-hour ozone NAAQS. Thus, the first 15 percent reduction would be required for the 6-year period starting from the last day (December 31) of the baseline year and the first 3year period for the subsequent three percent per year emission reduction requirement in serious areas would begin 6 years after the last day (December 31) of the baseline year. The baseline issue is discussed in section 4 below.

3. For subpart 2 areas, should the initial 15 percent RFP requirement be limited to VOC emissions?

Currently, for many areas of the country, particularly in the Eastern U.S. outside major metropolitan areas, there is a greater need for NO_x reductions rather than VOC reductions. However, under the prescribed requirements of the CAA, NO_x substitution is only allowed for the post-1996

ROP requirement (three percent per year averaged over 3 years), not for the initial 15 percent ROP requirement. We are proposing 2 options to address this issue.

- a. Option 1. Continue to require 15 percent VOC reductions within 6 years after the baseline year for all areas designated moderate and above for the 8-hour ozone NAAQS. After 6 years, all serious and above areas would be required to achieve a nine percent reduction in VOC and/or NO_x emissions every 3 years, i.e., an average of three percent per year.
- b. Option 2. For those areas that have approved 15 percent plans for their 1-hour ozone SIPs, an additional 15 percent VOC reduction is not necessary. Areas that are classified as moderate under the 8-hour standard that have already implemented their 15 percent plans under their 1-hour ozone SIPs would be considered to have met the statutory 15 percent requirement and would be covered under the more generic RFP requirements of subpart 1. Subpart 1 RFP requirements are discussed below. Areas that are classified as serious and above under the 8-hour standard that have already implemented their 15 percent plans under the 1-hour ozone standard would have to include in their SIPs an additional RFP plan that would achieve an average of three percent per year of VOC and/or NO_x over each 3-year period out to their attainment year. We recognize that it would be

difficult to submit a plan that provides for the first nine percent emission reduction within 3 years after nonattainment designation. Therefore, consistent with what Congress did under section 182(b)(1), we propose to allow the first ROP increment to be averaged over 6 years. We propose that an area classified serious or above submit its ROP plan within 2 years after designation that provides for 18 percent emissions reductions (VOC and/or NO_x) over the first 6 years from the baseline year and then submit within 3 years after designation a ROP plan that provides nine percent emissions reductions (VOC and/or NO_x) over each of the next 3-year periods until the area's attainment date.

This option recognizes previous efforts by areas that submitted 15 percent plans as required under the 1-hour ozone NAAQS and provides flexibility to States to use a mix of NO_x and VOC reductions to meet the additional ROP/RFP requirements. We believe that the statute can be interpreted to require the mandatory 15 percent VOC reduction only once for a given area. Once 15 percent VOC reduction requirements have been met, an area would actually have to achieve greater emissions reductions, i.e., an average of three percent per year, but could choose either VOC or NO_x reductions as appropriate. We prefer this second option because it provides more flexibility for the ROP plan

to be consistent with the area's needs in attaining the standard.

- c. Other options that EPA considered. We considered other options for addressing this issue that are not being proposed here; discussion of them appears in a separate document, available in the docket. However, we solicit comments on other options and what possible rationales—legal and scientific—might be used to justify those options.
- 4. What baseline year should be required for the emission inventory for the RFP requirement?

The baseline inventory for RFP (under subpart 2) is used as the starting point for the determination of a target level of emissions for the future year RFP and as the baseline from which creditable reductions are determined. We currently anticipate designating nonattainment areas in 2004. Under the "Consolidated Emissions Reporting Rule" (67 FR 39602, June 10, 2002) revised emissions inventories are required for the years 2002 and 2005; therefore, we propose to require use of the 2002 inventory as the baseline inventory for the RFP requirement. This would be the most

⁴⁴Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

recently available inventory at the time of designation. We recently issued a memorandum identifying 2002 as the anticipated emission inventory base year for the SIP planning process to address the 8-hour ozone and the $PM_{2.5}$ standards.⁴⁵

We considered other options for addressing this issue that are not being proposed here; discussion of them appears in a separate document, available in the docket.⁴⁶

5. Should moderate areas be subject to prescribed additional RFP requirements prior to their attainment date?

For areas initially classified moderate and higher under the 1-hour ozone standard, the baseline inventory was defined as 1990 in the CAA Amendments of 1990. Therefore, the 6-year period for the initial 15 percent ROP requirement ended in the same year as the attainment date for moderate areas, viz., 1996. For areas classified moderate and higher under the 8-hour ozone standard, however, we are proposing that the 15 percent ROP target level of emissions would be

 $^{^{45}}$ Memorandum of November 18, 2002, from Lydia Wegman and Peter Tsirigotis, "2002 Base Year Emission Inventory SIP Planning: 8-hr Ozone, PM_{2.5} and Regional Haze Programs." This document is available at the following web site: http://www.epa.gov/ttn/oarpg/meta.442.1.2002baseinv.pdf.

⁴⁶Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

calculated for the 6-year period after the 2002 baseline year, i.e., 2003-2008. Moderate areas would be required to meet an attainment date no later than 6 years after the area is designated nonattainment for the 8-hour standard. effective date of designation of nonattainment areas is, for instance, May 15, 2004, the attainment date would be May 15, 2010. This leaves approximately a 1 ½ year gap between the end of the 6-year period for the 15 percent ROP requirement (i.e., December 31, 2008) and the attainment date. If we were to also require moderate areas to obtain an additional three percent per year reductions beyond 2008 for the 1 1/2 additional years out to 2010, the ROP requirement would be more than what we believe Congress intended for moderate areas under subpart 2. Additional three percent per year reductions were only required for serious and higher classified 1-hour ozone nonattainment areas. proposing that the only specific ROP requirement applicable for moderate areas is the 15 percent VOC requirement between the end of 2002 and the end of 2008. However, section 172(c)(2) also applies, requiring areas to meet RFP generally. Therefore, a moderate area would still also have to provide any additional emissions reductions--VOC and/or NO,--needed to provide for attainment by the area's attainment date. In proposing this approach, we are interpreting the subpart 1 RFP requirement to mean that the

area must achieve whatever further reduction is needed for attainment in the remaining period prior to the attainment date (2009 and 2010).

We are proposing that serious and higher classified areas would need to provide in their SIPs an additional average of three percent per year emission reduction over each subsequent 3-year period beyond the initial 6-year period through the attainment year, consistent with what Congress specified in section 182(c)(2)(B) of the CAA.

6. What is the timing of the submission of the ROP plan?

Section 182(b) (1) requires that moderate and higher classified areas submit their 15 percent ROP plans within 3 years after 1990. For the attainment dates under the 8-hour ozone standard, we propose interpreting the CAA's language referring to the date of enactment of the 1990 CAA Amendments to mean the date of designations for the 8-hour standard. If we were to require the ROP plans to be submitted within 3 years after their nonattainment designation date (i.e., in 2007 if we designate in 2004), the plans would have to be implemented within 1 year after submission to ensure the 15 percent emissions reductions are achieved by the end of the relevant 6-year period (i.e., December 2008). We believe this would likely not be sufficient time to ensure that the reductions would occur by the required deadline. Therefore, we propose that the ROP

SIP be submitted within 2 years after nonattainment designation—namely by 2006. This would provide for 2 years for the State to develop and submit its ROP plan, and another 2 years for the control measures to be implemented.

7. How should CAA restrictions on creditable measures be interpreted? Which national measures should count as generating emissions reductions credit toward RFP requirements?

Section 182(b)(1) contains provisions that limit creditability toward meeting RFP for certain limited emission reduction measures required prior to the enactment of the CAA Amendments of 1990. We believe these specific restrictions should continue to apply for purposes of the 8hour NAAQS as written in the CAA. We believe that Congress intended to prevent areas from taking credit for RFP only for those specific measures that were already adopted and in place (or required to be in place) prior to the date of enactment of the CAA Amendments of 1990 (November 15, 1990). We believe that this same logic holds true for the RFP requirement as it applies to the 8-hour ozone standard, namely preventing credit toward the mandatory RFP percent reductions for continuing reductions from those specific measures cited in the CAA that were already adopted and in place prior to the date of enactment of the CAA Amendments of 1990. There is no indication in the CAA that this

exclusion should be changed. Congress mandated many emissions reductions in the 1990 CAA Amendments with no indication that they should not be credited to meeting RFP or attainment of any existing or revised NAAQS. Therefore, we are proposing that all emissions reductions that occur after the baseline emission inventory year from all Federal and any other measures (not otherwise identified in section 182(b)(1)(D)) would be creditable to the RFP requirement. For example, emissions reductions that occur after the 2002 baseline emission inventory year that result from the Tier 2 and sulfur in gasoline rules that were issued by EPA after the CAA Amendments of 1990 are creditable toward the RFP requirement for the 8-hour ozone standard. Another example of emissions reductions that would be creditable toward the RFP requirement for the 8-hour ozone standard would be VOC emissions reductions from certain MACT standards that will not produce emissions reductions until after the 2002 baseline; these would include several recently promulgated MACT standards (such as those covering several surface coating operations) and also anticipated MACT standards that are expected to be promulgated in the summer of 2003. Obviously, reductions that occur prior to the baseline year would be incorporated into the baseline and could not be credited.

8. For areas covered by subpart 1 instead of subpart 2, how should the RFP requirement be structured?

As described above, the RFP requirement under subpart 1 is more general than that under subpart 2, and EPA thus has more flexibility in determining what RFP means under subpart 1. For instance, the State may rely on emissions reductions of VOC or NO_x or a combination of both to meet its RFP requirement. However, we are also mindful of the need for ensuring equity between areas with similar 8-hour ozone problems covered under subpart 1 and those covered under subpart 2. We are proposing rules for three kinds of areas: (a) Areas with attainment dates 3 years or less after designation; (b) Areas with attainment dates between 3 and 6 years after designation; and (c) Areas with attainment dates beyond 6 years after designation. Note that the CAA requires that attainment dates for areas subject only to subpart 1 be no longer than 10 years after designation.

- a. Areas with attainment dates 3 years or less after designation. We propose a RFP requirement for these areas similar to that for areas under subpart 2 that are classified as marginal. Such an area would not be subject to a separate RFP requirement, but would have to attain the standard by its attainment date.
- b. Areas with attainment dates between 3 to 6 years after designation. These areas would have attainment dates

similar to subpart 2 areas classified as moderate. We propose two options for these areas:

Option 1. This option would require the RFP plan to be submitted with the attainment demonstration within 3 years after designation of the nonattainment area. The SIP would have to show that all emissions reductions needed for attainment would be implemented by the attainment date. This situation would occur, for example, for an area with a base year inventory of 2002, designation in 2004, a required attainment SIP submission date of 2007 and an attainment date of 2010. Where areas have only 3 years after SIP submission before attainment, this option recognizes that there may be only a short amount of time available to achieve any specified emissions reduction beyond that needed to demonstrate attainment and therefore would not require a showing that a specified amount of emission reductions occur between the time of SIP submission and the attainment date. (ii) Option 2. This option would require these areas to be treated in a manner similar to subpart 2 areas classified as The RFP SIP would have to provide for a 15 moderate. percent emission reduction from the baseline year within 6 years after the baseline year. The RFP SIP would have to be submitted within 2 years after designation. However, since the area is subject only to subpart 1, NO_x emissions reductions could be substituted for some or all of the 15

percent reduction requirement, consistent with EPA's NO_x substitution policy.⁴⁷ Also, we are soliciting comment on whether a percentage other than 15 percent should be required as the minimum. Additional measures that would provide the remaining portion of the emissions reductions needed for attainment would have to be submitted with the area's attainment demonstration within 3 years after designation.

c. Areas with attainment dates beyond 6 years after designation. These areas are similar in attainment dates to areas classified under subpart 2 as serious or higher. We are proposing that the RFP plan show increments of progress from the baseline emission inventory year out to the attainment date. The RFP SIP would first have to provide for a 15 percent emission reduction from the baseline year within 6 years after the baseline year. The 15 percent RFP SIP would have to be submitted within 2 years after designation. However, since the area is subject only to subpart 1, NO_x emissions reductions could be substituted for some or all of the 15 percent reduction requirement, consistent with EPA's NO_x substitution policy. Also, we are soliciting comment on whether a percentage other than 15 percent would be more appropriate. Then, for each

 $^{^{47}\}text{NO}_{x}$ Substitution Guidance. December 15, 1993; available at http://www.epa.gov/ttn/oarpg/t1pgm.html

subsequent 3-year period out to the attainment date, another RFP SIP would have to provide for an additional increment of progress no less than the amount of emissions reductions that would be proportional to the time between the end of the first increment (in 2008) to the attainment date. This second RFP SIP would have to be submitted at the same time as the attainment demonstration, namely within 3 years after designation.

9. How should the RFP requirements be implemented for areas designated for the 8-hour ozone standard that entirely or in part encompass an area that was designated nonattainment for the 1-hour ozone standard?

We are proposing the following approach to address this issue. Develop a new baseline and new ROP/RFP emission reduction targets for the entire 8-hour standard nonattainment area (the old 1-hour standard nonattainment area and the newly added portion of the 8-hour standard nonattainment area). Emissions reductions from measures in the 1-hour ozone SIP that are achieved after the 8-hour ozone NAAQS baseline year could count (subject to creditability restrictions as discussed above in this proposed rulemaking) toward meeting the RFP requirement for the entire 8-hour area.

This approach would set a ROP target for the entire 8-hour ozone nonattainment area. The State would have to

ensure that the target is at least as stringent as the 1hour ROP/RFP target, thus ensuring no backsliding on the 1hour NAAOS requirements. Under this approach, the new ROP/RFP target for the 8-hour standard would replace the previous 1-hour ozone target (while ensuring that, at a minimum, the emissions reductions required to meet the old target are met). For example, the 1-hour ozone NAAQS nonattainment area may comprise four counties and have a target level for one future RFP increment of 350 tons/day of VOC and 300 tons/day of NO_x . The 8-hour ozone nonattainment area may comprise the initial 1-hour ozone standard nonattainment area and two more counties. The target for the same increment period for the entire six county nonattainment area may now be, for instance, 400 tons/day of VOC and 350 tons/day of NO, (assuming that these emission reductions were consistent with the attainment demonstration).

We considered another option for this issue. This option, which is not being proposed, is discussed in a separate document available in the docket. 48

⁴⁸Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

10. Will EPA's "Clean Data Policy" continue to apply under the 8-hour standard for RFP?

We issued a clean data waiver policy on May 10, 1995, which allows EPA to determine that an area has attained the standard and that certain requirements (e.g., RFP) will not apply so long as the area remains in attainment. We propose that this policy would remain effective under the 8-hour ozone NAAOS.

11. How will RFP be addressed in Tribal areas?

As mentioned elsewhere in this proposed rulemaking, the TAR provides the Tribes with the ability to develop TIPs to address the NAAQS. However, it also provides the Tribes with flexibility to develop these plans in a modular way, as long as the elements of their TIPs are "severable." For example, each TIP submission must include a demonstration that the Tribe has authority to develop and run its program, the ability to enforce its rules, and the capacity and resources to implement the program it adopts. However, the modular approach provided for Tribes in the TAR allows the TIP to address a particular problem on the reservation. Therefore, it may include one or two source-specific

⁴⁹Memorandum of May 10, 1995, "RFP, Attainment Demonstration, and Related Requirements for Ozone Nonattainment Areas Meeting the Ozone National Ambient Air Quality Standard," from John S. Seitz, Director, Office of Air Quality Planning and Standards. Available at: http://www.epa.gov/ttn/oarpg/t1/memoranda/clean15.pdf.

requirements but may not include provisions for RFP and other SIP requirements. We will review and approve these TIPs as a step in addressing an overall air quality plan to achieve health and environmental goals. In addition, a Tribe may later add other elements to the plan, or EPA may be obligated to step in to fill air quality gaps. In approving the TIPs, we will ensure that they will not interfere with the overall air quality plan for an area when Tribal lands are part of a multi-jurisdictional area.

Because many of the nonattainment areas will include many jurisdictions, including both Tribes and States, it is important for Tribes and States to work together wherever possible to coordinate their planning efforts.

12. How will RFP targets be calculated?

We propose a methodology for the calculation of ROP target levels of emissions that is based on the method developed for the CAA Amendments of 1990, while taking into account our interpretation of CAA restrictions on creditable emissions and on our proposal to use the 2002 inventory as the baseline inventory for the ROP requirement. The CAA Amendments of 1990 specifies four types of measures that were not creditable toward the 15 percent RFP requirement. These were:

- (1) Any measure relating to motor vehicle exhaust or evaporative emissions promulgated by the Administrator by January 1, 1990;
- (2) Regulations concerning Reid Vapor Pressure that would go into effect in 1992;
- (3) State regulations submitted to correct deficiencies in existing VOC RACT regulations or previously required RACT rules:
- (4) State regulations submitted to correct deficiencies in I/M programs.

These four types of measures were all expected to result in a decrease in emissions between 1990 and 1996. Of these four types of measures, RACT and I/M program corrections and the 1992 Reid vapor pressure (RVP) requirements were completely in place by 1996 and therefore are already accounted for in the 2002 baseline. As a result, they would produce no additional reductions between 2002 and 2008 or later milestone years.

However, the pre-1990 Federal Motor Vehicle Control Program (FMVCP) will continue to provide benefits during the first two decades of the 21st century as remaining vehicles meeting pre-1990 standards leave the vehicle fleet. Because these benefits are not creditable for ROP purposes, in order to calculate the target level of emissions for ROP milestone years (i.e., 2008, 2011, etc.), States must first calculate

the reductions that would occur over these years as a result of the pre-1990 FMVCP. We propose the following methods to properly account for the non-creditable reductions when calculating ROP targets for the 2008 and later ROP milestone years.

Method 1: For areas that must meet a 15 percent VOC
reduction requirement by 2008:

- (1) Estimate the actual anthropogenic base year VOC inventory in 2002 with all 2002 control programs in place.
- (2) Using the same highway vehicle activity inputs used to calculate the actual 2002 inventory, run MOBILE6 for 2002 and for 2008 with all post-1990 CAA measures turned off. This is accomplished using the NO CLEAN AIR ACT command as described in the MOBILE6 User's Guide. Any other local inputs for I/M programs should be set according to the program that was required to be in place in 1990. Fuel RVP should be set at 9.0 or 7.8 depending on the RVP required in the local area as a result of fuel RVP regulations promulgated in June, 1990.
- (3) Calculate the difference between 2002 and 2008 VOC emission factors and multiply by 2002 VMT. The result is the VOC emissions reductions that will occur between 2002 and 2008 without the benefits of any post-1990 CAA

- measures. These are the non-creditable reductions that occur over this period.
- (4) Subtract the non-creditable reductions calculated in step 3 from the actual anthropogenic 2002 inventory estimated in step 1.
- (5) Reduce the VOC inventory calculated in step 4 by 15 percent. The result is the target level of VOC emissions in 2008 in order to meet the 2008 ROP requirement. The actual projected 2008 inventory with all control measures in place and including projected 2008 growth in activity must be at or lower than this target level of emissions.
- Method 2: For areas that qualify under option 2 of section 3 above and must meet an 18 percent VOC emission reduction requirement by 2008 with NO_x substitution allowed, following EPA's NO_x Substitution Guidance:
 - (1) Estimate the actual anthropogenic base year inventory in 2002 with all 2002 control programs in place.
 - (2) Using the same highway vehicle activity inputs used to calculate the actual 2002 inventory, run MOBILE6 for 2002 and for 2008 with all post-1990 CAA measures turned off. This is accomplished using the NO CLEAN AIR ACT command as described in the MOBILE6 User's Guide. Any other local inputs for I/M programs should

be set according to the program that was required to be in place in 1990. Fuel RVP should be set at 9.0 or 7.8 depending on the RVP required in the local area as a result of fuel RVP regulations promulgated in June, 1990.

- (3) Calculate the difference between 2002 and 2008 VOC emissions factors and multiply by 2002 VMT. The result is the emissions reductions that will occur between 2002 and 2008 without the benefits of any post-1990 CAA measures. These are the non-creditable reductions that occur over this period.
- (4) Subtract the non-creditable reductions calculated in step 3 from the actual anthropogenic 2002 inventory estimated in step 1.
- (5) Reduce the inventory calculated in step 4 by 18 percent. The result is the target level of emissions in 2008 in order to meet the 2008 ROP requirement. The actual projected 2008 inventory with all control measures in place and including projected 2008 growth in activity must be at or lower than this target level of emissions.

Method 3: For all areas that must meet an additional reduction VOC requirement of 9 percent every 3 years after 2008 with NO_x substitution allowed, following EPA's NO_x Substitution Guidance. Each subsequent target level of

emissions should be calculated as an emissions reductions from the previous target.

- (1) Using the same highway vehicle activity inputs used to calculate the actual 2002 inventory, run

 MOBILE6 for 2008 (previously done in step 2 above) and

 2011 with all post-1990 CAA measures turned off. This
 is accomplished using the NO CLEAN AIR ACT command as
 described in the MOBILE6 User's Guide. Any other local
 inputs for I/M programs should be set according to the
 program that was required to be in place in 1990. Fuel

 RVP should be set at 9.0 or 7.8 depending on the RVP
 required in the local area as a result of fuel RVP
 regulations promulgated in June, 1990.
- (2) Calculate the difference between 2008 and 2011 emission factors and multiply by 2002 VMT. The result is the emissions reductions that will occur between 2008 and 2011 without the benefits of any post-1990 CAA measures. These are the non-creditable reductions that occur over this period.
- (3) Subtract the non-creditable reductions calculated in step 2 from the 2008 target level of emissions calculated previously.
- (4) Reduce the inventory calculated in step 3 by 9 percent. The result is the target level of emissions in 2011 in order to meet the 2011 ROP requirement. The

actual projected 2011 inventory with all control measures in place and including projected 2011 growth in activity must be at or lower than this target level of emissions.

J. Are contingency measures required in the event of failure to meet a milestone or to attain the 8-hour ozone NAAOS?

1. <u>Background</u>

Under the CAA, nonattainment areas must include in their SIPs contingency measures consistent with section 172(c)(9). However, section 182(a) expressly exempts areas classified as marginal from this obligation. States with ozone nonattainment areas classified as moderate and above must include contingency measures in their SIPs consistent with sections 172(c)(9) and 182(c)(9). Contingency measures are additional controls to be implemented in the event the area fails to meet a RFP milestone or fails to attain by its attainment date. These contingency measures must be fully adopted rules or measures which are ready for implementation quickly upon failure to meet milestones or attainment. SIP should contain trigger mechanisms for the contingency measures, specify a schedule for implementation, and indicate that the measures will be implemented without significant further action by the State or EPA. Additional background information concerning the CAA contingency

measure provisions appears in the General Preamble of April 16, 1992 (57 FR 13510-13512 and 13520); and Section 9.2 of "Guidance for Growth Factor, Projections, and Control Strategies for the 15 percent Rate-of-Progress Plans" (EPA-452/R-93-002), March 1993.

The guidance indicates that States should adopt and submit contingency measures to provide a three percent emission reduction (beyond what is needed for attainment or the ROP requirement) for moderate and above ozone areas, which EPA concludes is generally acceptable to offset emission increases while States are correcting their SIPs.

Also, EPA guidance suggests that contingency measures that a State adopted for purposes of the 15 percent ROP requirement may be used as the contingency measures for any post-1996 3-year requirements for RFP, provided they have not been triggered and used as contingency measures for the 15 percent plan. See Section 5.6 of "Guidance on the Post 1996 Rate-of-Progress Plan (ROP) and Attainment Demonstration" (corrected version of February 18, 1994). Furthermore, Federal measures that result in additional emission reductions beyond those needed for attainment or ROP in an area could serve as contingency measures for a failure to attain or meet the ROP requirements. The EPA has approved the use of Federal measures as part of contingency measures in several EPA actions approving 1-hour ozone SIPs

(62 FR 15844, April 3, 1997), (62 FR 66279, December 18,
1997), and (66 FR 30811, June 8, 2001), (66 FR 586 and 66 FR
634, January 3, 2001).

2. Proposal

For the 8-hour ozone standard, we intend to continue to observe its existing policies regarding contingency measures for areas covered under subpart 2. Areas that are nonattainment for the 8-hour ozone standard that have unused adopted contingency measures for the 1-hour ozone NAAQS may use those measures as appropriate as contingency measures for the 8-hour ozone NAAQS. For areas covered under subpart 1, we will provide additional guidance on the contingency measure requirement, but it is likely that it will be patterned after the subpart 2 requirement.

K. What requirements should apply for RACM and RACT for 8-hour ozone nonattainment areas?

1. Background

Subpart 1 of part D includes general requirements for all designated nonattainment areas, including a requirement that a nonattainment plan provide for the implementation of all RACM as expeditiously as practicable, including such reductions that may be obtained through RACT. Most areas designated nonattainment for the 1-hour ozone standard are also subject to the requirements of subpart 2 of part D, including its detailed control measure provisions. Under

subpart 2, RACT requirements for ozone nonattainment areas apply independent of the emissions reductions needed to attain the standard. The RACT requirements also apply in attainment areas within the current ozone transport region (OTR) (or any additional OTR that EPA may establish under the CAA), regardless of the emissions reductions needed to attain. The RACT requirement applies to both ozone precursors—NO_x and VOC. Since 1990, we have issued guidance on the RACT requirements in subpart 2.50 Prior to enactment of the CAA Amendments of 1990, EPA also issued detailed guidance on RACT for ozone nonattainment area SIPs.51 This guidance continues to be relevant.

Elsewhere in this proposed rulemaking, we are proposing one option for classifying 8-hour ozone nonattainment areas in which some areas would be subject to the requirements of subpart 1. Unlike subpart 2, which contains detailed

⁵⁰⁴⁰ CFR part 52, State Implementation Plans; General Preamble for the Implementation of Title I of the Clean Air Act Amendments of 1990; Proposed Rule. April 16, 1992. (57 FR 13498); 40 CFR part 52, State Implementation Plans; Nitrogen Oxides Supplement to the General Preamble; Clean Air Act Amendments of 1990; Implementation of Title I; Proposed Rule. November 25, 1992. (57 FR 55620).

^{51&}quot;Issues Relating to VOC Regulation Cutpoints,
Deficiencies, and Deviations-Clarification to Appendix D of
November 24, 1987, Federal Register." Ozone/Carbon Monoxide
Program Branch, Air Quality Management Division, Office of
Air Quality Planning and Standards, U.S. Environmental
Protection Agency. May 25, 1988; Federal Register of
November 24, 1987, Appendix D (52 FR at 45105).

requirements regarding the adoption of RACT, subpart 1 contains only a general provision which requires that SIPs for nonattainment areas provide for RACM, including RACT. <u>See</u> CAA section 172(c)(1). Because RACT is a control technology requirement, it is somewhat independent of the need to demonstrate attainment or RFP. In the period prior to enactment of the 1990 CAA Amendments, only the general requirements for RACM and RACT existed, and EPA had issued CTGs to provide presumptive norms for RACT for VOC controls for States to follow in adopting RACT for ozone nonattainment areas. In 1990, Congress institutionalized this requirement for NO_x and VOC (as ozone precursors) in subpart 2, and emphasized the role of CTGs and EPA's pre-1990 guidance for ensuring that RACT rules themselves were adequately structured to ensure they would be effective and enforceable. For instance, ozone nonattainment areas classified as marginal or higher that had a previous obligation to submit corrections to their VOC RACT rules were required to complete and submit those corrections within 6 months after the date of classification. See CAA section 182(a)(2)(A). However, the 1990 CAA Amendments did not require marginal areas to adopt any RACT rules if they did not have a pre-1990 obligation to do so. 52

 $^{^{52}{\}rm The}$ exception to this rule is that States in the OTR are also required for all areas in the State to adopt RACT

Also, the amended CAA required EPA to issue CTGs for certain VOC sources by November 15, 1993. See CAA section 183(a) and (b). Similarly, the EPA was required to issue alternative control techniques (ACT) documents for additional categories of VOC and NO_x . See CAA section 183(c). The ACT documents are intended to help States in making RACT determinations.

2. <u>Proposed approach for RACT in general for areas covered</u> under subpart 2

We are proposing that the RACT requirement for areas covered under subpart 2 apply as specified in subpart 2. Thus, areas classified as marginal that had a pre-1990 obligation for RACT would continue to have that obligation. Areas classified as moderate and above would be required to adopt RACT for the categories covered by the CTG's that EPA has issued and to adopt non-CTG RACT measures for major sources.⁵³

3. <u>Proposed approach for RACT in general for areas covered</u> only under subpart 1

rules for all sources covered by a CTG and all other major sources of $\rm NO_x$ or VOC regardless of their nonattainment classification. See CAA section 184(b).

⁵³Note that under the anti-backsliding provisions proposed above, any portion of an area classified marginal under the 8-hour standard that was classified moderate or higher under the 1-hour standard would also have a continuing RACT requirement from its classification as moderate or higher.

We are proposing two alternative options for addressing RACT for areas covered under subpart 1.

- a. Option 1: Treatment of RACT similar to subpart 2 areas. Based on the provisions of the CAA described above and the apparent differences in treatment regarding RACT between marginal and other areas, we propose to interpret the CAA in a manner similar to that under subpart 2 by requiring areas covered under subpart 1 to face different RACT requirements based on the magnitude of the ozone problem. This proposal has the advantage of minimizing some of the apparent inequities that might exist under the classification option (discussed elsewhere in this proposed rulemaking) in which some areas are covered under subpart 1 and others under subpart 2.
- (i) Areas similar to marginal areas. Those 8-hour nonattainment areas covered only under subpart 1 that have an ozone problem that is similar in degree to that of a marginal area would be subject to the same RACT requirement as areas classified as marginal under subpart 2. These areas would be defined as those whose 8-hour ozone design value at the time of designation/classification would have placed them in the marginal classification if they had been subject to subpart 2 (i.e., areas that have an 8-hour design value of less than 0.092 ppm. (See elsewhere in this proposed rulemaking under the section concerning

classification.) Similarly, if we adopt the incentive feature proposed in the classification section, and a subpart 1 area with a design value of 0.092 ppm or greater can demonstrate that it will attain within 3 years after designation, then it would be subject to the same RACT requirement as applies to marginal areas under subpart 2. As noted in the background of this section, the 1990 CAA Amendments did not require marginal areas (with the exception of those located in the OTR) to adopt any RACT rules if they did not have a pre-1990 obligation to do so. Marginal areas that had a pre-1990 obligation for RACT were required to perform any corrections to those rules that we had previously identified.

(ii) Areas similar to moderate and higher-classified areas. Those 8-hour nonattainment areas covered under subpart 1 that have an ozone problem that is similar in degree to that of a moderate or higher-classified area would be subject to the same RACT requirements as those that apply in subpart 2 for moderate and above areas. These areas would be defined as those whose 8-hour ozone design value at the time of designation/classification would have placed them in the moderate or above classification if they had been subject to subpart 2. As proposed elsewhere in this proposed rulemaking, this would mean areas that have an 8-hour design

value of 0.092 ppm or greater that are not able to demonstrate attainment within 3 years after designation.

- b. Option 2: Alternative treatment for RACT under subpart
- 1. This option is similar to the approach we proposed in our November 17, 1998 draft implementation guidance. At the time, we stated that we believed we had authority under subpart 1 to apply an interpretation for RACT for ozone nonattainment areas for the 8-hour NAAQS that was similar to the Agency's policy for pollutants other than ozone. Under that interpretation and this option, for the 8-hour ozone NAAQS, if the area is able to demonstrate attainment of the standard as expeditiously as practicable with emission control measures in the SIP, then RACT will be met, and additional measures would not be required as being reasonably available.
- c. Ozone transport regions. In addition, all areas of the OTR are required to adopt NO_x and VOC RACT requirements, regardless of their attainment classification. Of course, these areas were already required to submit RACT rules for purposes of the 1-hour standard.

⁵⁴Proposed Implementation Guidance for the Revised Ozone and Particulate Matter (PM) National Ambient Air Quality Standards (NAAQS) and the Regional Haze Program. November 17, 1998. Found at: http://www.epa.gov/ttn/oarpg/t1pgm.html.

⁵⁵See CAA section 184(b).

4. <u>Proposed approach for previous source-specific major</u> source RACT determinations

Section 182(b)(2)(C) requires SIPs in moderate and higher classified areas to provide for RACT for major stationary sources of VOC that are not covered by CTGs. Section 182(f)(1) provided that this requirement also apply to major sources of NO_x. Many areas subject to the major source RACT requirement under the 8-hour ozone standard would have previously addressed the RACT requirement with respect to the 1-hour ozone standard. This includes the non-CTG major source VOC RACT requirement and the NO, major source RACT requirement. For example, major sources located in States of the OTC were subject to the NO, RACT requirement in the mid-1990s. We believe that, in many cases, a new RACT determination under the 8-hour standard would call for installation of similar control technology as the initial RACT determination under the 1-hour standard because the fundamental control techniques are still applicable. In other cases, a new RACT analysis could determine that better technology has become available and some additional emissions reductions are achievable. cost per ton of NO_x removed associated with installing a second round of RACT controls is likely to be high in many cases due to the relatively small amount of additional NO_{x} emission reductions expected. In these cases, the

additional costs associated with the replacement of the existing RACT controls may be an unnecessary burden, given the small emissions benefit potential. In contrast, a RACT analysis for uncontrolled sources would be much more likely to find that cost-effective controls are available.

Therefore, in portions of 8-hour ozone nonattainment areas where major sources or source categories were previously reviewed and controls subsequently applied to meet the RACT requirement under the 1-hour standard, we propose that States may choose to accept the initial RACT analysis as meeting the RACT requirements for the 8-hour program and need not submit a new RACT SIP. At the time the State submits its attainment demonstration, it should submit a certification that it previously met the RACT requirement as part of its SIP revision. We also propose that a RACT determination would be necessary for major sources in any portion of the 8-hour nonattainment area that was not subject to an initial RACT program under the 1-hour standard. Furthermore, in cases where the initial RACT analysis under the 1-hour standard for a specific source or source category concluded that no additional controls were necessary, we propose that a new RACT determination is required. The new RACT determination is needed to take into account that newer, cost-effective control measures may have become available for sources that were not previously

regulated. Thus, the State needs to reassess whether controls should be required. In addition, any major VOC or NO_{x} source that exists at the time of final rulemaking on implementation of the 8-hour ozone standard but that did not exist during a previous RACT determination must be subject to a RACT determination as part of the SIP for the 8-hour ozone standard.

5. Proposed approach for NO_x RACT determinations in areas affected by the NO_x SIP Call

All States submitting SIP revisions to meet the NO_x SIP Call (October 27, 1998, 63 FR 57356) have elected to require large boilers and turbines to comply with an emissions capand-trade program consistent with EPA's model cap-and-trade rule. As a result, all these sources are already subject to stringent control requirements. As described below, these sources collectively achieve more emissions reductions than would be required by application of RACT requirements to each source. Therefore, where a nonattainment area is located in a State with an EPA-approved cap-and-trade program, EPA proposes that sources subject to the cap-and-trade program already meet the NO_x RACT requirements.

In previously issued guidance concerning NO_x RACT for boilers and turbines, EPA indicated that NO_x RACT for certain types of electricity generating units (EGUs) is equivalent to the title IV requirements and is the most

effective level of combustion modification reasonably available (NO_x General Preamble at 57 FR 55625). In subsequent guidance, EPA further indicated that NO_x RACT should generally be expected to achieve approximately 30-50 percent reduction from uncontrolled levels.⁵⁶

Large boilers and turbines subject to the NO, SIP Call cap-and-trade program are expected to achieve much greater emissions reductions than these NO, RACT levels. The NO, SIP Call base case assumes EGUs meet the title IV and/or RACT requirements. In the NO_x SIP Call control case, EGUs are expected to achieve a 64 percent reduction beyond the base case requirements (65 FR 11225). Thus, these EGUs are expected to reduce emissions by far greater amounts than would be required by a RACT program. Furthermore, the EGU emissions reductions comprise nearly 85 percent of the overall emissions reductions resulting from the NO_{x} SIP Call. The non-EGUs subject to the States' cap-and-trade program are expected to achieve a 60 percent reduction from uncontrolled levels (63 FR 57402). These non-EGU reductions are clearly beyond the 30-50 percent expected from a RACT program.

 $^{^{56}}$ Memorandum of March 16, 1994, from D. Kent Berry re: "Cost-Effective Nitrogen Oxides (NO $_{\!x}$) Reasonably Available Control Technology (RACT)." U.S. Environmental Protection Agency, Research Triangle Park, North Carolina.

Because the $\mathrm{NO_x}$ SIP Call is a market-based program, there may be a few units that choose to meet those requirements simply by emissions trading, even though the vast majority of units affected by the $\mathrm{NO_x}$ SIP Call will install controls. In any nonattainment areas where this is the case, EPA believes that the overall emission reductions from sources in the $\mathrm{NO_x}$ SIP Call cap-and-trade program will achieve more emissions reductions in the nonattainment area than would application of RACT to each of those units.

In summary, the level of emissions reductions required by the NO_x SIP Call is far greater than the level of reductions achieved by controls we have determined to be NO_x RACT. Therefore, EPA believes the sources that comply with the NO_x SIP Call cap-and-trade program meet NO_x RACT requirements. Accordingly, EPA proposes that the State need not perform a NO_x RACT analysis for sources subject to the State's emission cap-and-trade program where the cap-and-trade program has been approved by EPA as meeting the NO_x SIP Call requirements and need not submit a new NO_x RACT SIP for those sources. The EPA invites comment on this approach.

As described in section 4, proposed approach for previous source-specific major source RACT determinations, States would need to make a RACT determination for major sources not subject to the cap-and-trade program. However,

in cases where States have adopted controls consistent with the NO_x SIP Call for cement kilns (i.e., 30 percent reduction), the State may choose to accept the NO_x SIP Call requirements as meeting the NO_x RACT requirements for the 8-hour standard and need not submit a new NO_x RACT SIP for those sources. As part of the NO_x SIP Call, EPA determined that highly cost-effective controls for cement kilns will achieve a 30 percent reduction and that many cement plants in the SIP Call region implemented such controls in State RACT programs (63 FR 57418). In its RACT SIP submission, the State should identify the cement plants that are subject to NO_x SIP Call controls and that, therefore, already meet RACT.

In addition, through the NO_x SIP Call or other programs (e.g., NSR) States may have adopted control measures for specific NO_x sources that equal or exceed RACT requirements. For these sources, States may choose to submit, as part of its NO_x RACT SIP revision, documentation that the previously adopted control measure meets the RACT requirement, where applicable. Finally, in developing the NO_x SIP Call, States may have considered control measures for sources not in the cap-and-trade program—or may consider additional sources in responding to the second phase of the NO_x SIP Call. The EPA's NO_x RACT guidance (NO_x General Preamble at 57 FR 55625) encourages States to develop RACT programs that are

based on "areawide average emission rates." Thus, States can submit a demonstration as part of their RACT submittal showing that the weighted average emission rate from sources in the nonattainment area subject to RACT--including sources reducing emissions to meet the NO_{x} SIP Call requirements--meet RACT requirements.

It should also be noted that this proposal in no way limits States' discretion to require beyond-RACT NO_x reductions from any source (including NO_x SIP Call sources) in a plan to demonstrate attainment of the health-based ozone standards. In certain areas, States may choose to require NO_x controls based on more advanced control technologies to provide for attainment of the ozone standards.

As stated in section 3, above, we are proposing an alternative option for RACT under subpart 1. In this option, areas that are able to demonstrate attainment of the 8-hour standard as expeditiously as practicable with the control measures in their SIP would be considered as having met RACT.

6. Proposed approach for NO_x as an ozone precursor

In addition to the issue regarding the nature of the RACT rules that apply under subpart 1, another issue concerns the pollutants (precursors) to which the RACT rules apply. Although NO_{x} has long been recognized as a precursor

to ozone⁵⁷ and several national rules⁵⁸ have been promulgated to control NO_x for purposes of helping attain the ozone standard, subpart 1 does not specifically address either NO_x or VOC, but rather RACT in general. We propose to clarify this by recognizing both NO_x and VOCs as precursors to ozone and to require NO_x and VOC RACT under subpart 1. This is consistent with the application of RACT under subpart 2. Under section 182(f) (in subpart 2), a waiver from NO_x RACT is possible under certain circumstances (the waiver provision is discussed elsewhere in this proposed rulemaking) for areas subject to subpart 2. We are proposing to allow areas subject to subpart 1, to seek a waiver consistent with the tests set forth in section 182(f).

7. Proposed approach for RACM

We have also issued guidance for implementing the RACM provisions of the CAA that interprets those provisions to

 $^{^{57} \}rm For\ example,\ the\ 1991\ National\ Academy\ of\ Sciences\ report\ entitled\ Rethinking\ the\ Ozone\ Problem\ in\ Urban\ and\ Regional\ Air\ Pollution\ recommends\ that\ "To\ substantially\ reduce\ O_3\ [ozone]\ concentrations\ in\ many\ urban,\ suburban,\ and\ rural\ areas\ of\ the\ United\ States,\ the\ control\ of\ NO_x\ emissions\ will\ probably\ be\ necessary\ in\ addition\ to,\ or\ instead\ of,\ the\ control\ of\ VOCs."$

 $^{^{58}\}mbox{For example, NO}_{x}$ SIP Call (published October 27, 1998), Tier 2/Gasoline Sulfur regulations (published on February 10, 2000); and Control of Emissions of Air Pollution from 2004 and Later Model Year Heavy-duty Highway Engines and Vehicles (published October 6, 2000).

require a demonstration that the State has adopted all reasonable measures to meet RFP and attainment as expeditiously as practicable and thus that no additional measures that are reasonably available will advance the attainment date or contribute to RFP for the area. The RACM requirement, which is set forth in section 172(c)(1) of the CAA, applies to all nonattainment areas that are required to submit an attainment demonstration, whether covered under only subpart 1 or also subpart 2.

8. Proposed submission date for RACT and RACM requirements

We are proposing that the SIP provisions for RACT for a nonattainment area--regardless of whether the area is covered under subpart 1 or subpart 2--be submitted within 2 years after the area's nonattainment designation; this is

⁵⁹ State Implementation Plans; General Preamble for the Implementation of Title I of the Clean Air Act Amendments of 1990; Proposed Rule." 57 FR 13498 at 13560 (April 16, 1992).

[&]quot;Guidance on the Reasonably Available Control Measures (RACM) Requirement and Attainment Demonstration Submissions for Ozone Nonattainment Areas." John S. Seitz, Director, Office of Air Quality Planning and Standards. November 30, 1999. Web site: www.epa.gov/ttn/oarpg/t1pgm.html.

Memorandum of December 14, 2000, from John S. Seitz, Director, Office of Air Quality Planning and Standards, re: "Additional Submission on RACM from States with Severe One-Hour Ozone Nonattainment Area SIPs."

consistent with the timing for submission of RACT rules in section 182(b)(2) for moderate areas.⁶⁰

We are proposing that the SIP provisions for RACM for a nonattainment area-regardless of whether the area is covered under subpart 1 or subpart 2-be submitted within 3 years after the area's nonattainment designation; this is consistent with the timing for submission of an area's demonstration of attainment.

L. How will the section 182(f) NO $_{x}$ provisions be handled under the 8-hour ozone standard?

In subpart 2 of part D, section 182(f) requires States to apply the same requirements to major stationary sources of NO $_{\rm x}$ as are applied to major stationary sources of VOC. The applicable requirements are RACT and NSR for major stationary sources in certain ozone nonattainment areas and throughout States in the OTR. 61 In addition, section 182(f) specifies circumstances under which these NO $_{\rm x}$ requirements would be limited or would not apply ("NO $_{\rm x}$ waiver"). Further, areas granted a NO $_{\rm x}$ waiver under section 182(f) may be exempt from motor vehicle I/M and certain Federal

⁶⁰Section 182(a) provided that marginal areas with pre-1990 RACT obligations had to submit corrections to their RACT rules within 6 months after classification under the 1990 CAAA. New 8-hour ozone nonattainment areas that are classified as marginal would not have this requirement.

 $^{^{61}}$ See 57 FR 55622 ("Nitrogen Oxides Supplement to the General Preamble," published November 25, 1992).

requirements of general and transportation conformity. 62 For the same reasons described in the "Nitrogen Oxides Supplement to the General Preamble" with respect to the 1-hour ozone standard, we propose to also apply the NO $_{\rm x}$ requirements and waiver provisions in section 182(f) for 8-hour ozone nonattainment areas under subpart 2 and OTRs. 63

Elsewhere in today's proposed rulemaking, we propose to establish NO_x as a precursor to ozone under subpart 1 and require RACT and NSR in subpart 1 nonattainment areas for major sources of NO_x as well as VOC. As noted in the preceding paragraph, we are also proposing that the NO_x RACT and NSR requirements apply in certain subpart 2 nonattainment areas and throughout OTRs. While NO_x emissions are necessary for the formation of ozone in the lower atmosphere, a local decrease in NO_x emissions can, in some cases, increase local ozone concentrations. This potential "NO_x disbenefit" resulted in Congress including NO_x waiver provisions in section 182(f) (in subpart 2 of part D) for areas classified under subpart 2. We believe the NO_x waiver provisions are a prudent safeguard to avoid

 $^{^{62}\}rm{As}$ stated in EPA's I/M (57 FR 52950) and conformity rules (60 FR 57179 for transportation rules and 58 FR 63214 for general rules), certain $\rm NO_x$ requirements do not apply where EPA granted an areawide exemption under section 182(f).

⁶³See 57 FR 55620, "Nitrogen Oxides Supplement to the General Preamble," published November 25, 1992.

unnecessary emissions reductions and that these safeguards should be extended to areas classified under subpart 1 that are subject to the $\mathrm{NO_x}$ RACT and NSR provisions. Therefore, we propose to establish $\mathrm{NO_x}$ waiver provisions identical to those in section 182(f) for areas subject to subpart 1.

In the event that the final rulemaking does not establish NO, as a precursor to ozone under subpart 1 and the NO, RACT and/or NSR requirements do not apply, a NO, waiver provision would be unnecessary with respect to subpart 1 areas. We propose that the concepts contained in the existing 1-hour ozone guidance 4 regarding section 182(f) would apply for the 8-hour ozone program under subparts 1 and 2. We would update the existing guidance to take into account the new ozone and PM standards and modeling techniques now available. For areas that were previously granted a NO_x waiver under the 1-hour ozone standard, a re-approval would be needed to make it clear that the exemption applies, to allow for public comment, to be consistent with the waiver guidance under the 8-hour standard (once issued), and to account for any new information that may point to a different conclusion.

⁶⁴The EPA's primary guidance regarding section 182(f) is contained in the "Guideline for Determining the Applicability of Nitrogen Oxide Requirements under Section 182(f)," issued by John S. Seitz, Director, Office of Air Quality Planning and Standards, to the Regional Division Directors, December 16, 1993.

M. What aspects of transportation conformity and the 8-hour ozone standard are addressed in this proposal?

1. What is transportation conformity?

Transportation conformity is required under section 176(c) of the CAA (42 U.S.C.§7506(c)) to ensure that federally supported highway and transit project activities are consistent with ("conform to") the purpose of a SIP. Conformity to the purpose of the SIP means that transportation activities will not cause new air quality violations, worsen existing violations, or delay timely attainment of the NAAQS. Transportation conformity applies in nonattainment areas and maintenance areas. The EPA's transportation conformity rule, 40 CFR part 93, establishes the criteria and procedures for determining whether transportation activities conform to the State air quality plan. It also establishes criteria and procedures for determining whether transportation activities conform in areas where no SIP containing mobile source emissions budgets yet exists.

The EPA first published the transportation conformity rule on November 24, 1993 (58 FR 62188) and has amended the rule several times. On August 15, 1997, a comprehensive set of amendments was published that clarified and streamlined language from the 1993 transportation conformity rule (62 FR 43780). These rulemakings, as well as other relevant

conformity materials such as guidance documents, policy memoranda, and conformity research can be found at EPA's transportation conformity web site, at:

http://www.epa.gov/otaq/transp.htm (once at the site, click
on "Transportation Conformity.")

2. Why is EPA discussing transportation conformity in this proposed rulemaking?

We are discussing transportation conformity in this proposed rulemaking in order to provide affected parties with information on when transportation conformity will be implemented under the 8-hour ozone standard and how we plan to make the transition from the 1-hour ozone standard to the 8-hour ozone standard. Affected parties may include State and local transportation and air quality agencies, metropolitan planning organizations (MPOs) and the U.S. Department of Transportation (DOT). To determine whether this discussion affects your organization, you should carefully examine the applicability requirements in 40 CFR 93.102 of the transportation conformity rule.

3. Are any changes being made to transportation conformity in this proposed rulemaking?

No, we are not proposing changes to the transportation conformity rule in this proposed rulemaking. In the future, we plan to conduct a rulemaking to establish the specific conformity tests that will apply under the 8-hour standard.

We intend to complete that rulemaking prior to area designations for the 8-hour standard and will provide the public with the opportunity to comment on the proposed changes. We plan to propose this rulemaking in the summer of 2003.

4. When does transportation conformity apply to 8-hour ozone nonattainment areas?

Transportation conformity applies to 8-hour ozone nonattainment areas 1 year after the effective date of an area's designation. This 1-year grace period is found in the CAA at 42 U.S.C. 7506(c)(6). Specifically, this section of the CAA provides areas, that for the first time are designated nonattainment for a given air quality standard, with a 1-year grace period before the conformity regulation applies with respect to that standard. Since the 8-hour ozone standard is a different standard from the 1-hour ozone standard, every area that is designated nonattainment for the 8-hour ozone standard will have a 1-year grace period before conformity applies for the 8-hour standard, regardless of whether or not it was designated nonattainment or maintenance for the 1-hour ozone standard.

For more information, please see the proposed and final rulemaking entitled, "Transportation Conformity Rule

Amendments: Minor Revision of 18-Month Requirement for

Initial SIP Submissions and Addition of Grace Period for

Newly Designated Nonattainment Areas," published October 5, 2001 (66 FR 50954); and August 6, 2002 (67 FR 50808), respectively for additional discussion of the 1-year grace period for newly designated areas. (The proposed and final rule can be found on EPA's transportation conformity web site mentioned above.)

5. How does the 1-year grace period apply in metropolitan areas?

Metropolitan areas are those areas that have a MPO designated as being responsible for transportation planning per 23 U.S.C. 134. In these areas, the 1-year grace period means that, 1 year after the effective date of an area's designation as nonattainment for the 8-hour standard, the area must have a conforming transportation plan and Transportation Improvement Program in place to fund or approve transportation projects. If, at the conclusion of the 1-year grace period, a metropolitan area is not able to make a conformity determination for its plan and Transportation Improvement Program, the area will be in what is known as a "conformity lapse." (For the discussion of which projects can proceed during a conformity lapse, please see DOT's January 2, 2002 guidance, published February 7, 2002, at 67 FR 5882; and EPA's May 14, 1999 guidance. 65

⁶⁵The EPA's Conformity Guidance on Implementation of March 2, 1999, Conformity Court Decision (EPA 420-F-99-025,

Both of these documents can be found on EPA's transportation conformity web site:

http://www.epa.gov/otag/transp/tragconf.htm.

6. How does the 1-year grace period apply in "donut" areas?

For the purposes of conformity, a donut area is the geographic area outside a metropolitan planning area boundary, but inside the boundary of a designated nonattainment/maintenance area. The conformity requirements for donut areas are generally the same as those for metropolitan areas, and the MPO would include any projects occurring in the donut area in its analysis of the metropolitan transportation plan and TIP. Therefore, the one-year grace period applies to donut areas in much the same way that it applies to metropolitan areas. That is, within one year of the effective date of an area's designation, a donut area's projects must be included in an MPO's conformity determination for the metropolitan plan and TIP for those projects to be funded or approved. If, at the conclusion of the one-year grace period, the donut area's projects have not been included in an MPO's conformity determination, the entire nonattainment area's conformity would lapse.

May 1999).

7. How does the 1-year grace period apply in isolated rural areas?

For the purposes of conformity, a nonattainment or maintenance area (or portion thereof) is considered to be an isolated rural area if it does not have a metropolitan transportation plan or Transportation Improvement Program required under 23 U.S.C. 134, and its projects are not considered in the emissions analysis of any MPO's transportation plan or Transportation Improvement Program. Isolated rural areas are distinguished from "donut" areas which are outside the metropolitan planning boundary and inside the nonattainment/maintenance area boundary.

Because isolated rural areas do not have federally required metropolitan transportation plans and Transportation Improvement Programs, a conformity determination need only be done in an isolated rural area when that area has a transportation project or projects that need approval. Therefore, isolated rural areas also have a 1-year grace period before conformity applies under the 8-hour ozone standard, but at the end of that grace period, the area does not have to have made a conformity determination. An isolated rural area would be required to do conformity only at the point when a new transportation project needs approval. This point may occur significantly after the 1-year grace period has ended. (Conformity

requirements for isolated rural areas can be found at 40 CFR 93.109(q)).

8. <u>Does conformity apply for the 1-hour ozone standard once</u> the 1-hour ozone standard is revoked?

The CAA only requires conformity in areas that are designated nonattainment or maintenance for a standard. Therefore, conformity will not apply for purposes of the 1hour ozone standard after the 1-hour standard and an area's 1-hour designation are revoked. In other words, existing 1hour ozone nonattainment and maintenance areas, including those that will not be designated nonattainment for the 8hour ozone standard, will no longer be required to demonstrate conformity to the 1-hour standard when EPA revokes the standard, 1 year after the effective date of EPA's 8-hour ozone designations. This interpretation that conformity would not apply in 1-hour ozone maintenance areas once the 1-hour standard is revoked is a change from the approach we planned to take in 1997. Since that time, we have reconsidered whether or not conformity should continue to apply in maintenance areas. We have concluded that the better interpretation is that conformity would not apply in 1-hour maintenance areas once the 1-hour ozone standard is revoked because maintenance areas are relieved of the obligation under section 175A of the CAA to have a maintenance plan. Since a maintenance plan is not required,

conformity no longer applies in these areas. A detailed discussion of our plans for revoking the 1-hour standard and the associated 1-hour designations may be found elsewhere in today's proposed rulemaking.

9. What are EPA's plans for amending the conformity rule to address the 8-hour ozone standard?

The conformity rule will need to be amended to address the implementation of both the 8-hour ozone and $PM_{2.5}$ air quality standards. We plan to address both standards in one revision to the rule. We anticipate proposing this revision in 2003 and finalizing the rulemaking prior to EPA's finalization of designations of nonattainment areas in 2004. This schedule would allow areas to be well aware of the conformity requirements that will apply to them prior to the start of the 1-year grace period. The proposal will provide an opportunity for stakeholders to offer comments and ideas for providing flexibilities that would be appropriate for some or all nonattainment areas.

10. What impact will the implementation of the 8-hour ozone standard have on a State's Transportation Conformity SIP?

Since we are not now proposing to make specific revisions to our Transportation Conformity Regulations in this proposal, States should not need to revise their Transportation Conformity SIPs, unless they need to do so to ensure the regulations apply in the appropriate areas.

11. What other parts of this proposal could affect transportation conformity determinations?

We believe that transportation conformity stakeholders would be interested in the proposed Clean Air Development Communities program found in section O, question 9 of this proposal. Section O discusses how we propose to implement the NSR, EPA's program that regulates emissions from stationary sources such as power plants, under the 8-hour ozone standard. In question 9 of section 0, we propose two options to recognize the air quality benefits that may result from siting new sources and planning development in a particular manner. Under these two options, the air quality benefit of location decisions would be applied to the stationary source sector. Because the benefits of measures cannot be counted twice, if air quality benefits of location decisions are applied to the stationary source sector, they could not also be credited to the transportation sector in a conformity determination. These options and their implications are discussed in further detail in section O, question 9. We encourage transportation conformity stakeholders to review that section carefully and submit any comments to us.

N. What requirements for general conformity should apply to the 8-hour ozone standard?

1. What is the purpose of the general conformity regulations?

Section 176(c) of the CAA requires that before a Federal entity takes an action, it must make a determination that the proposed action will not interfere with the SIP or the State's ability to attain and maintain the NAAQS. November 1993, EPA promulgated two sets of regulations to implement section 176(c). One set, known as the Transportation Conformity Regulations (described above) deals with approval and funding of highway and mass transit project. The other set, known as the general conformity regulations, deals with all other Federal activities. Besides ensuring that Federal actions will not interfere with the SIP, the general conformity program also fosters communications with State/local air quality agencies, allows for public participation in the review of air quality impacts from Federal actions, and allows for air quality review of individual projects. In 1995, Congress limited the application of section 176(c) to nonattainment and maintenance areas only.

2. How is the general conformity program currently structured?

Due to the very broad definition of "Federal action" in the statute and the number of Federal agencies subject to the conformity requirement, the number of individual

conformity decisions could have been on the order of a thousand or more per day. To avoid creating an unreasonable administrative burden, EPA established de minimis emissions levels and exempted certain actions. In addition, the regulations allow Federal agencies to develop their own list of actions which are presumed to conform. For non-exempt actions that increase emissions above the de minimis levels, the Federal agency must demonstrate that the action will conform with the SIP or will not cause or contribute to any new violation of any standard in any area; interfere with provisions in the applicable SIP for maintenance of any standard; increase the frequency or severity of any existing violation of any standard; or delay timely attainment of any standard or any required interim emissions reductions or other milestone. We are currently reviewing the general conformity program and, in a separate action, may revise the regulations as appropriate, with respect to the 8-hour standard.

3. Who runs the general conformity program?

Each Federal agency is responsible for determining if the action it takes is subject to the conformity regulations and, if so, whether the action conforms to the SIP. Each Federal agency's approach to the conformity evaluation differs depending upon the actions being taken. Agencies that are permitting or funding actions subject to the

conformity rules generally require the applicant to develop the technical support for the conformity determination, although some agencies undertake the complete evaluation themselves.

4. How does an agency demonstrate conformity?

Depending upon the pollutant and the specific situation, Federal agencies have several options for demonstrating conformity. For actions in ozone nonattainment and maintenance areas, the Federal agency can demonstrate that the project/action is specifically identified and accounted for in the SIP, obtain documentation from the State that the emissions are included in the SIP, have the State commit to include the emissions in the SIP, or mitigate the emissions or offset the emissions from emissions reductions within the same nonattainment or maintenance area.

- 5. <u>General conformity regulation revisions for the 8-hour</u> ozone standard
- a. What de minimis emission levels will be set for ozone precursors? For the ozone precursors VOC and NO_x , we are proposing to retain the existing de minimis emission levels. Those levels were based on the definition of a major stationary source for the NSR programs as established by sections 182, 183, and 302 of the CAA. The current de minimis levels are identified in Table 4 below.

TABLE 4

De Minimis Emission Levels for VOC and NO.

Type of Ozone Area	VOC Tons/year	NO _x Tons/year
Extreme Nonattainment	10	10
Severe Nonattainment	25	25
Serious Nonattainment	50	50
Moderate and Marginal Nonattainment in the OTR	50	100
Other Nonattainment	100	100
Maintenance in OTR	50	100
Other Maintenance	100	100

Areas covered by subpart 1 are included in the "Other Nonattainment" category listed in Table 4 and would have de minimis emission levels of 100 tons per year for both VOC and $NO_{\rm x}$ emissions.

b. What impact will the implementation of the 8-hour ozone standard have on a State's general conformity SIP? Since we are not now proposing to make specific revisions to its general conformity regulations in this proposal, States should not need to revise their general conformity SIPs, unless they need to do so to ensure the regulations apply in the appropriate areas.

c. Are there any other impacts on the SIPs related to general conformity based on implementation of the 8-hour standard? Currently, we are reviewing the general conformity regulations and are considering whether it would be appropriate to revise them in the near future. We are not proposing any revisions at this time. However, as areas develop SIPs for the 8-hour ozone standard, we recommend that State and local air quality agencies work with major facilities which are subject to the general conformity regulations (e.g., commercial airports and large military bases) to establish an emission budget for those facilities in order to facilitate future conformity determinations. Such a budget could be used by Federal agencies in determining conformity or identifying mitigation measures.

6. How does the 1-year grace period apply to general conformity determinations?

Section 42 U.S.C. 7506(c)(6) applies to both transportation and general conformity. Therefore, the general conformity requirements would not apply to actions/projects in newly designated nonattainment areas until 1 year after the effective date of the designation. As discussed in section M.4., the 8-hour ozone standard is a new standard and the grace period applies to all the areas designated nonattainment for that standard.

Actions/projects in areas previously designated

nonattainment or maintenance for the 1-hour ozone standard must demonstrate conformity for the 1-hour standard until that standard is revoked in whole or in part. Once the 1-hour ozone standard is revoked in whole or in part, Federal agencies will be required to conduct conformity determinations for the 8-hour standard if the project/action is in an area designated nonattainment for that standard. The general conformity regulations specify requirements for actions/projects in areas without an approved SIP. Those requirements would apply to 8-hour ozone nonattainment areas until the SIP is approved by EPA.

O. How should the NSR program be implemented under the 8-hour ozone NAAQS?

1. Background

The major NSR program contained in parts C and D of title I of the CAA is a preconstruction review and permitting program applicable to new or modified major stationary sources of air pollutants regulated under the CAA. In nonattainment areas, and throughout the OTR, the program is implemented under the requirements of part D of Title I of the CAA, and is referred to as nonattainment NSR. In attainment or unclassifiable areas outside the OTR, the requirements under part C of title I of the CAA apply, and the program is called the Prevention of Significant Deterioration (PSD) program. Collectively, we also commonly

refer to these programs as the major NSR program. These regulations are contained in 40 CFR 51.165, 51.166, 52.21, 52.24 and part 51, appendix S.

In attainment/unclassifiable areas outside of the OTR, a new major source, or a major modification to an existing source, must install best available control technology (BACT) and conduct an air quality modeling analysis and an analysis of potential impacts on Class I areas (see section 162 of the CAA). If the source is located in a nonattainment area, or anywhere in the OTR, including OTR attainment areas, it must install technology that meets the lowest achievable emission rate (LAER), secure emission reductions to offset any increases in emissions, and perform other analyses.

As of the date areas are designated attainment or nonattainment under the 8-hour standard, major NSR will apply under the standard. In areas outside the OTR that will be designated as attainment for the 8-hour ozone standard, the part C PSD program will apply. As there are currently PSD programs in place in all areas of the country, implementation of the new standard should be a straightforward matter. (Note that one change we will be codifying is the addition of NO_{x} as an ozone precursor. This is discussed in more detail later in this section).

In areas newly designated as nonattainment for the 8-hour ozone standard, however, a number of implementation issues will arise, which we discuss below. Typically, upon designation, nonattainment areas would be required to implement nonattainment NSR for major sources and major modifications. 66 However, in order to reduce the burden for nonattainment areas meeting certain conditions, we are proposing a revised set of major NSR requirements under the authority of 40 CFR Part 51, appendix S, section VI. We are referring to this as the transitional program, and it is discussed in more detail later in this section.

2. <u>Nonattainment NSR under the 8-hour ozone standard</u>

Some States may already have in place a part D major source program applicable to newly designated 8-hour ozone nonattainment areas. For nonattainment areas in States whose SIPs contain a generic requirement to issue part D major source NSR permits in areas designated as nonattainment, nonattainment NSR permit requirements will become automatically effective upon designation (See Figure 1).67

 $^{^{66}\}mathrm{Should}$ EPA issue revisions to these regulations, the revised NSR program would of course apply to new sources and major modifications.

⁶⁷States with already applicable part D NSR programs may choose to amend their SIPs to allow them to take advantage of the transitional option described in this section, provided they meet the transitional program

For a nonattainment area in a State with a SIP that specifically lists the areas in which part D NSR applies, or in areas which currently have no nonattainment plan, there will be an interim period between the designation date and the date that the State amends its SIP either to list any new nonattainment area(s) or to include a part D plan.

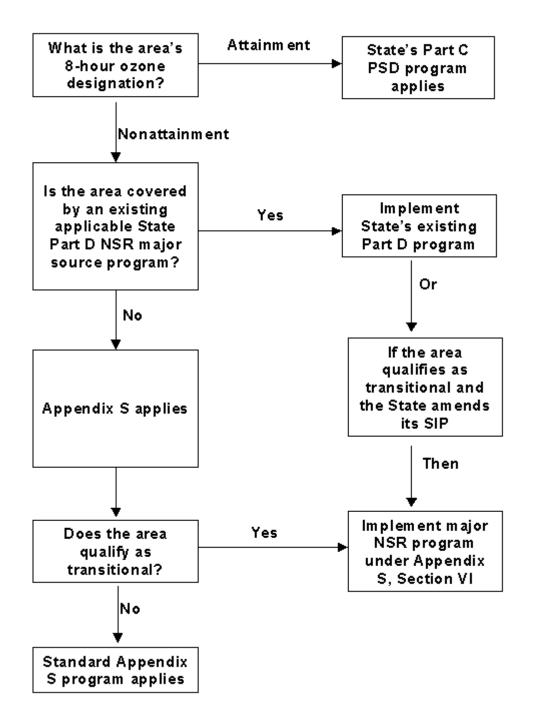
During this interim period, part D NSR requirements are governed not by section 51.165, but by appendix S to part 51.

a. What does appendix S require for nonattainment areas during the interim period? In general, appendix S requires new or modified major sources to meet LAER and obtain sufficient offsetting emissions reductions to assure that the new major source will not interfere with the area's progress toward attainment. (Readers should refer to 40 CFR part 51, appendix S for a complete understanding of these and other appendix S permitting requirements.) However, per

eligibility criteria.

Figure 1

NSR Program Implementation Under the 8-hour Ozone Standard



section VI of appendix S, we have always recognized the need for flexibility under certain circumstances, which we address in detail below.

Also, note that EPA does not have a Federal permit program in place for nonattainment NSR. This creates particular difficulties for the Tribes, because their programs are not as mature as the State programs.

Therefore, in most locations, EPA, not the Tribes, will need to address the implementation of appendix S in these areas, until a Tribe develops a nonattainment NSR program on its own.

b. What is the legal basis for requiring States to issue nonattainment NSR permits during the interim period?

Section 110(a)(2)(c) of the CAA establishes a general duty on States to include a program in their SIP that regulates the modification and construction of any stationary source as necessary to assure that NAAQS are achieved. This general duty, often referred to as "minor NSR," exists during all periods, including before a State has an approved part D NSR permit program.

Although section 110(a)(2)(c) does not define specific requirements States must follow for issuing major source permits during the interim period between nonattainment designation and EPA approval of a part D nonattainment NSR SIP ("interim period"), EPA's regulations codified at

52.24(k) require States to follow EPA's Emission Offset

Interpretative rule codified at 40 CFR part 51, appendix S
(hereinafter referred to as appendix S) during this time. 68

c. Codification of NO_x as an ozone precursor. Currently,
only VOCs are expressly regulated as ozone precursors under
the PSD regulations. Although appendix S specifically
states that a source is major for ozone if it is major for
VOCs, we do not believe this language is exclusive. The
more general portion of the "major stationary source"
definition states, ". . . any stationary source that
emits, or has the potential to emit, 100 tons per year or
more of any pollutant subject to regulation under the Act,"
is considered a major source. There is similar general
language within the definition of "major modification." The
nonattainment provisions of the Act, as amended in 1990,

⁶⁸The actual language at 40 CFR 52.24(k) allows States to issue permits under appendix S for a maximum period of 18 months after designation. After this time, if the nonattainment area does not have an approved Part D NSR permit program, a construction ban would apply. However, in 1990, Congress altered the provisions of the construction ban such that it would not apply when a State lacked an approved part D NSR permit program in the future. We believe that Congress' removal of the construction ban from the CAA supersedes the regulatory language at 52.24(k) and EPA has reinterpreted this language to allow States to issue permits under appendix S from designation until the SIP is approved even if this exceeds 18 months. See 1991 quidance memo, "New Source Review (NSR) Program Transitional Guidance, John S. Seitz, March 11, 1991. We will be revising the language at section 52.24(k) to properly reflect this interpretation.

recognize NO_x as an ozone precursor; section 182(f) of the CAA established nonattainment requirements for NO_x . In addition, the definition of air pollutant under section 302(g) of the CAA includes, ". . . any precursors to the formation of any air pollutant . . ." Thus, where NO_x is considered a precursor to the formation of ozone, the State would use appendix S to issue a preconstruction permit to a new major source of NO_x emissions during the interim period. 69

Notwithstanding the above, in order to be completely clear, we are proposing to amend both our NSR and PSD regulations to expressly include NO_x as an ozone precursor in major PSD and major nonattainment NSR programs. Where relevant for both PSD areas and transitional NSR areas, States would be required to modify their existing programs to include NO_x as an ozone precursor.

Elsewhere in today's action, we are proposing to include NO_x as an ozone precursor for RACT requirements under subpart 1. Under section 182(f) (in subpart 2), a waiver from NO_x RACT and nonattainment NSR is possible under

 $^{^{69}}Note$ that new sources or modifications which are major as a result of $NO_{\rm x}$ emissions, and are thus subject to nonattainment NSR for $NO_{\rm x}$, would also be considered major sources of nitrogen dioxide (NO_2) , which is also a criteria pollutant. Since all areas are currently in attainment under the NO_2 NAAQS, these new $NO_{\rm x}$ sources will also need to go through PSD review for NO_2 .

certain circumstances. We are proposing that the section 182(f) waiver provisions would also apply to areas designated nonattainment under either subpart 1 or subpart

- 2. However, the waiver provisions do not apply in areas where PSD is applicable.
- 3. <u>Under what circumstances is a transitional program</u>
 needed during the interim period?

We request comment on providing States flexibility regarding major source nonattainment NSR program requirements in areas that meet specific conditions. We believe that a more flexible NSR option is appropriate in areas that are expected to reach 8-hour ozone attainment early — within 3 years after designation — through, for example, national or regional programs such as the NO_{x} SIP Call and the Tier 2 motor vehicle emissions standards. In these areas, we believe that States should have the flexibility to apply a nonattainment NSR program that provides some relief from certain requirements.

Several factors warrant a flexible approach for implementing NSR in areas which qualify for the transitional program. We expect many areas to attain the new 8-hour standard within 3 years solely through regional NO_x reductions under the NO_x SIP Call rule and other currently applicable Federal programs. We intend this option to be available to any 8-hour ozone nonattainment areas located

outside the NO_x SIP Call area, so long as those nonattainment areas can meet the 8-hour ozone NAAQS within 3 years after designation. Some of these areas may be in nonattainment due largely to transport from upwind sources; but no allowance is made under major NSR for sources in areas overwhelmed by transport. As we have construed it, this option would also encourage the early adoption of attainment plans, which we believe will lead to emissions reductions and resultant health benefits earlier than would otherwise occur. We request comment on the transitional program described in this proposed rulemaking, and in particular welcome information from States regarding how many new major sources or major modifications they anticipate would construct in transitional areas during the period between EPA's approval of a transitional part D nonattainment NSR plan and the State reaching attainment of the 8-hour NAAQS.

- 4. Elements of the appendix S transitional program
- a. Which nonattainment areas would be eligible for the transitional program? The appendix S transitional program would only be available to 8-hour ozone nonattainment areas that are subject to NSR under subpart 1, not subpart 2 (see discussion of classifications elsewhere in this proposal). In addition, in order to be eligible for the transitional option, by the date EPA publishes the nonattainment

designations for the 8-hour standard (currently expected in 2004) a subpart 1 nonattainment area must: (1) be attaining the 1-hour ozone standard; (2) be subject to subpart 1, not subpart 2, of part D; 70 (3) have submitted an attainment plan that demonstrates attainment within 3 years after designation; the attainment plan would have to include control measures under the $\mathrm{NO}_{\scriptscriptstyle x}$ SIP Call rule where applicable; and (4) have submitted an attainment plan containing any additional local control measures needed for attainment of the 8-hour standard. These plans must commit the State to implement, by December 31, 2004, all measures necessary to bring the nonattainment area into attainment by a 2007 attainment date. In addition, when a State submits its attainment plan, it should note that it intends to implement a program under appendix S, section VI that meets the requirements for transitional areas discussed below.

Note that, under this option, the attainment plan submission timing (i.e., submission by the date of EPA designation of nonattainment areas) for transitional areas is about 3 years earlier than is otherwise required for

of part D are specifically spelled out in the CAA, and thus cannot be altered under a transitional program.

 $^{^{71}{}m The}$ actual attainment date--as proposed elsewhere in this proposal--would be 3 years after the nonattainment designation.

areas not meeting the 8-hour standard. Note also that areas would be eligible for this transitional NSR provision even though we are not establishing a "transitional" nonattainment classification for areas covered under subpart 1. We request comment on these criteria.

Also, note that while relief from offsets is provided for the NSR transitional program (see discussion below), those States and Tribes subject instead to the main body of appendix S will still need to provide offset provisions.

- b. What would be the basic requirements of a transitional nonattainment NSR program under appendix S, section VI?
- i. Major source applicability threshold. Under the general part D NSR requirements, the applicability threshold for "major stationary source" is defined as 100 tons per year of a nonattainment pollutant; in some instances under subpart 2 the major source threshold can be as low as 10 tons per year. In contrast, the major source threshold under the PSD program is either 100 or 250 tons per year, depending upon the type of stationary source undergoing review. We propose that, consistent with the subpart 1 part D NSR requirements, an appendix S, subpart VI transitional nonattainment programs will use a major source threshold of 100 tons per year for each ozone precursor.
- ii. <u>Emission Control</u>. Another key provision of the part D nonattainment NSR program is that, in order to be permitted,

major new and modified sources must minimize their emission rate by applying control technology to achieve LAER, which is generally the most stringent emission limit contained in a SIP or achieved in practice.

In contrast to LAER, which does not consider costs and other factors, a BACT analysis requires consideration of energy, environmental, and economic impacts in determining the maximum degree of reduction achievable for the proposed new source or modification. In a BACT analysis, as described in the New Source Review Workshop Manual, 72 the most stringent emission limit, including the limit representing LAER and its associated control technology, must be considered. If the most stringent limit is rejected as BACT for a particular case, that decision must be supported by an analysis that shows that the most stringent limit should not be chosen in light of the costs or other relevant factors. For example, if the most effective control technology would impose unacceptably high costs because of site-specific factors, that technology could be rejected as BACT for the proposed source. In this way, BACT may be less stringent than LAER.

⁷²US EPA Office of Air Quality Planning and Standards, New Source Review Workshop Manual, Prevention of Significant Deterioration and Nonattainment Area Permitting, Draft, October 1990. Available at:

http://www.epa.gov/ttn/nsr/gen/wkshpman.pdf.

We request comment on whether a BACT requirement, consistent with the BACT approach described in the NSR workshop manual, may be required in transitional appendix S nonattainment NSR programs in lieu of requiring LAER. We believe granting this relief is appropriate, given the minimal difference we would expect between the emissions reductions achieved from BACT, rather than LAER, for the small number of sources that may trigger nonattainment NSR in transitional areas, for the few years the area is nonattainment.

iii. Relief from source-specific offsets requirements.

We are proposing that major sources and major modifications would not be required to obtain case- and source-specific offsets under the transitional program. However, despite locating in a nonattainment area which qualifies for the NSR transitional program, a new major source may not cause or contribute to the existing violation in the nonattainment area. If the State determines that the source does not contribute to the existing violation, then mitigation would not be required.

There are several circumstances under which it is reasonable to assume that a new major source locating in a nonattainment area will not interfere with timely attainment of the standard. First, if the nonattainment area which qualifies for the NSR transitional option is participating

in the NO_x SIP Call (63 FR 57356; October 27, 1998), we expect that a source locating in the area will not cause or contribute to the existing violation, so long as the new emissions are consistent with growth projections. This is because it is assumed that where new emissions are consistent with growth projections, those new emissions will not interfere with timely attainment of the standard. the NO_x SIP Call, we modeled emissions for 2007. included future growth projections for both VOC and NO. emissions, and allocated each State a NO_x budget designed to control interstate NO_x transport. Because these budgets include an emission growth factor for VOC and NO_x , we believe that new major sources may locate in those nonattainment areas which qualify for the NSR transitional option without interfering with the area's ability to reach attainment, provided that any new emissions are within the projected emissions growth factor. We expect States to develop appropriate emission inventory procedures to assure that any new emissions are consistent with projected growth in emissions.

Those nonattainment areas which qualify for the NSR transitional program that are not projected to attain under the NO_{x} SIP Call or are not covered by the NO_{x} SIP Call may also allow for an increase in new major source emissions if their attainment demonstration includes an emissions growth

factor for major new and modified sources and demonstrates that, provided emission increases from new major sources remain below this level, the area will reach attainment.

Again, we expect States to develop appropriate emission inventory procedures to demonstrate that the new emissions are consistent with projected growth in emissions.

- iv. Other requirements. In addition to the control technology requirements discussed above, and consistent with current NSR requirements under appendix S, section IV, condition 2, sources locating in transitional areas will be required to certify statewide compliance of all existing major sources under the same ownership or control. We believe this requirement will not impose a substantial burden on permit applicants or permitting authorities.
- v. <u>Backstop Provisions</u>. Should a nonattainment area under the appendix S, section VI transitional program fail to meet its SIP obligations to attain the NAAQS before the end of the interim period, then it will no longer be eligible for the transitional program. We request comment on the need for a backstop provision that requires a State to notify us, at the time of such failure, that it is reverting to the traditional nonattainment requirements under appendix S. We also request comment on any other findings which should end eligibility for the transitional program.

5. Will a State be required to assure that the increased emissions from a new major source do not cause or contribute to a violation in a nearby nonattainment area before it issues a preconstruction permit under appendix S?

At the current time, EPA allows the State to presume that a source locating outside a designated ozone nonattainment area will have no significant impact on the designated nonattainment area. See section III of appendix S. However, given the recent advances in the scientific understanding of ozone formation, we may revise these guidelines in the near future. In the meantime, under the PSD rules, States may choose to address the impacts of sources in attainment areas on nearby nonattainment areas in a more proactive manner; i.e., through PSD offsets and/or tighter emission controls when the source is shown to contribute to a violation of the NAAQS.

- 6. What happens at the end of the interim period?
- a. Transitional NSR areas. As noted above, this transitional option is only intended to apply to certain nonattainment areas that expect to attain the 8-hour ozone NAAQS within 3 years after designation. Therefore, we expect these areas to be in attainment on or before an attainment date in 2007. Accordingly, States must submit, by the attainment date in 2007, an attainment demonstration with a maintenance plan. A State may continue implementing

transitional NSR under appendix S, section VI for 6 months following submission of its attainment plan, or until its attainment plan is approved, whichever is earlier.

- b. Traditional NSR areas. If a State has never been or is no longer operating under a section VI transitional program, it must submit a part D nonattainment NSR plan within 3 years after designation (in 2007). The State may continue implementing traditional part D nonattainment requirements under appendix S until we approve its part D plan.
- 7. What is the legal basis for providing this transitional program?

As stated earlier, appendix S applies during the period after an area is designated nonattainment but before a part D nonattainment NSR plan is due under subparts 1 and 2 of part D. Application of appendix S during this interim period ensures compliance with the section 110(a)(2)(C) "minor" NSR program. However, Congress was ambiguous regarding what specific requirements States must follow for issuing major source permits during the interim period described above. Thus, we have discretion to interpret those regulations in a reasonable manner. Chevron, U.S.A. v. NRDC, 467 U.S. 837 (1984).

The transitional appendix S approach is reasonable for several reasons. First, it would be available only for those areas that are already attaining the 1-hour standard

and that will attain the 8-hour standard within 3 years after designation (before a part D nonattainment NSR SIP revision is due) through national and regional planning. These areas appropriately deserve a different approach for implementing the section 110(a)(2)(C) requirements than areas that are in nonattainment for the 1-hour standard and thus currently implementing NSR, or those areas that are not projected to reach attainment of the 8-hour in the short term.

We believe that the transitional option, as we have constructed it, would result in a level of emissions reductions that is substantially similar to the level that would be achieved from traditional NSR for the small number of sources it will affect in the short period during which these areas are designated nonattainment. Thus, these transitional areas would still be implementing a program that regulates the modification and construction of any stationary source "as necessary" to assure that the NAAQS are achieved as expeditiously as practicable.

Currently, the language of section VI allows all States to exempt a new major source from complying with the requirement to install LAER and obtain offsets if the source will meet all other applicable SIP requirements and not interfere with the area's ability to meet its attainment date. However, we plan to revise section VI to remove this

general exemption and apply the transitional approach. This revision is appropriate because we do not believe that areas not meeting the transitional approach would be able to ensure that they were implementing an NSR program "as necessary" to ensure the attainment of the NAAQS without complying with appendix S in general (e.g., sections I-V). Note that section VI of appendix S originally applied only to secondary NAAQS, and we revised section VI to include primary standards following the 1977 Amendments. exemption provided by section VI applied to areas whose attainment dates were shortly after the CAA was reauthorized in 1977 because these areas had already submitted their attainment plans to us, and we believed that these areas would reach attainment without having to impose LAER and offsets on new major sources.

While nonattainment areas that qualify for the 8-hour ozone standard NSR transitional option are in a similar situation, areas not qualifying for the transitional approach are not. In order to qualify for the NSR transitional option, States will have to submit an attainment plan by the date of designation for the 8-hour NAAQS in 2004. These plans must commit the State to implement by December 31, 2005, all measures necessary to bring the nonattainment area into attainment and to meet a

2007 attainment date. Similar to the nonattainment areas for which section VI originally applied, we believe that nonattainment areas which qualify for the NSR transitional option will be able to meet a 2007 attainment date without imposing LAER and offsets on new major sources.

On its surface, section VI's existing language could be applied in any nonattainment area during the interim period. However, we do not believe that an area that fails to meet the transitional option requirements would be able to show that a new major source or major modification constructing but not applying LAER or obtaining offsets will not interfere with the area's ability to meet its attainment date. Thus, we are proposing to revise the language of section VI to apply only in areas qualifying for the transitional NSR program.

8. How should the NSR requirements be implemented for new 8-hour ozone areas that encompass the old 1-hour ozone nonattainment areas after EPA revokes the 1-hour ozone standard?

Newly-designated 8-hour ozone areas which include areas which have never attained the 1-hour standard will have two different sets of requirements in place until a point in

⁷³The actual attainment date—as proposed elsewhere in this proposed rulemaking—would be 3 years after the effective date of nonattainment designation, which we anticipate will occur in the spring of 2004.

time proposed elsewhere in this proposed rulemaking under the anti-backsliding provisions. (There are two options proposed elsewhere in this proposal (in the anti-backsliding section) for that point in time--until either the level of the 1-hour ozone standard is achieved or the 8-hour ozone standard is attained.) The 1-hour NSR requirements and higher offset ratios (if applicable) will remain in place in the area that was designated nonattainment for the 1-hour standard until that point in time. The remaining portion of the newly-designated 8-hour ozone area must comply only with the 8-hour ozone NSR requirements and offset ratios (if applicable).

9. NSR option to encourage development patterns that reduce overall emissions--Clean Air Development Communities

The EPA is considering two options to recognize the air quality benefits which can accrue when areas site new sources and plan development in a manner that results in overall reduced emissions. The EPA would define a community that changes its development patterns in such a way that air emissions within the non-attainment area are demonstrably reduced as a "Clean Air Development Community" (CADC). We propose that areas that qualify as CADCs would obtain certain flexibilities in implementing CAA programs. We request comments on the options listed here and encourage

commenters to suggest other ways under the CAA that we could encourage development that will result in lower emissions.

In the first option, a CADC would have a more flexible NSR program by: 1) being subject to subpart 1 NSR as opposed to subpart 2 NSR; 2) lowering NSR major source thresholds for these areas to make them similar to the thresholds for PSD areas; and 3) allowing areas that meet certain development criteria (development zones) to receive NSR offsets from State offset pools. In the second option, a CADC would be able to receive a pool of NSR offset credits equal to the reduced emissions from new development patterns. Credits from the pool could be provided to any new or modified source in a "development zone" as offsets.

The first goal of a CADC option is that it would give communities a tool to achieve air quality benefits that can accrue from strategic location of new sources. The location of new sources (often major job centers) can affect regional development patterns and air emissions. As a result, new sources have a dual impact on air quality. The first impact is from their own direct emissions and the second impact is from the emissions associated with other sources whose development is influenced by the new source and any change in travel patterns (positive or negative) that may result. This option attempts to recognize the net impact that a new source has on a region, not just from their own stationary

emissions, but also from their associated stationary, area and mobile source emissions influenced by the location of the new source. It provides a mechanism to recognize the relative emissions reductions associated with locating major job centers in close proximity with transit, commercial/retail destinations, and workforce housing.

commercial/retail destinations, and workforce nousing.

Furthermore, the EPA recognizes that brownfields⁷⁴ are often prime candidates to realize these locational benefits. Brownfields, as sites of previous economic activity, frequently enjoy excellent proximity to a variety of destinations and a range of transportation infrastructure. Second, given their potentially contaminated state, manufacturing or other industrial uses are often the appropriate type of revitalization. The productive re-use of these sites is a priority for the Agency. This option will provide flexibility within CAA programs to achieve the

elds/index.html.

or underutilized properties (especially industrial and commercial facilities) where redevelopment or expansion may be complicated by possible environmental contamination (real or perceived). However, a brownfield site, as defined by The Small Business Liability Relief and Brownfields Revitalization Act of January 11, 2002, is any "real property, the expansion, redevelopment, or reuse of which may be complicated by the presence or potential presence of a hazardous substance, pollutant, or contaminant." Further information is available at: http://www.epa.gov/compliance/resources/fags/cleanup/brownfi

dual goals of brownfields revitalization and reduced air emissions.

The second goal of a CADC program would be that it would allow communities to use the air benefits of their development practices as an incentive for locating new sources and their associated economic growth.

Man-made emissions within a region come from three kinds of sources: mobile sources, areas sources, and stationary sources. Thus, the ability of a region to accommodate new stationary sources is dependent not only on stationary source emissions but also on mobile and area source emissions. Localities which choose to engage in development that reduces emissions from mobile and area sources, with either of these options, could have the opportunity to turn those reductions into incentives for siting new economic activity.

It should be noted that an area that decides to become a CADC is, in effect, transferring emission reductions which normally would remain in the mobile source sector where they could, for example, be used for conformity determinations to the stationary source sector. Areas would have to think through the implications for them of doing this.

While we have not decided to go forward with either of these options at this time, we are continuing to examine them and, therefore, request comment on them. In

particular, we request comment and suggestions on possible legal rationales for supporting these options which would enable them to be implemented through rulemaking. We are also very interested in other potential incentives that we could provide in addition to or instead of those included in this proposal. (We encourage commenters to focus on those incentives that are within EPA control.) In addition, we request comment on implementation barriers, as well as the analytical complexities in the estimation of emission benefits from changes to development patterns that areas would need to calculate in order to become a CADC. Public comments will help us determine how and whether to include either option in the final rulemaking.

a. What is EPA considering? Option 1: The EPA is considering a package of three kinds of flexibility for areas subject to subpart 2 whose land use development meet certain criteria. First, we would allow CADC's to be covered under the NSR program under subpart 1 rather than under subpart 2 if: (a) they adopt specific land use measures into their SIPs that reduced air emissions; and, (b) they demonstrate that air quality would not decrease as a result of using subpart 1 instead of subpart 2. This demonstration would have to quantify the emissions reductions from adopted land use measures in their SIPs and showing that the decreases from the land use measures are

sufficient to offset any potential increase in emissions from using subpart 1 instead of subpart 2. Second, we would lower the NSR major source thresholds for CADC areas to make them similar for those under the PSD provisions. Third, we would allow development zones, areas that meet certain development criteria, to receive NSR offsets from "pools" or "banks" of offsets established by the State. (A pool would be created by the State taking action or requiring others to take actions that meet the criteria for NSR offsets. State would then collect these offsets and they could distribute them to new development that would occur in specific areas.) We believe that these actions would help steer development to development zones where less regional emissions would occur than had the development occurred elsewhere and the change in land use patterns may help areas reduce their mobile source emissions. The EPA requests comments on whether an area should receive all three incentives or only one or two of them.

Option 2: The EPA is also considering a less ambitious program of incentives that focuses on the development zones. In this option, the reduced emissions from improved development patterns are used to create offset pools for use by sources in development zones. We believe that this would also help steer development toward development zones providing the same benefits discussed above. The main

advantage to a CADC compared to option 1 is that the offset pool could start with considerable offset credits and, therefore, the credits would not have to be created through additional actions. It would also have the potential of more carefully targeting new development just to the development zone instead of anywhere in the CADC.

- b. What would a CADC be? A CADC would be a "community" that changes its development patterns in such a way that air emissions within the non-attainment area are demonstrably reduced. A CADC does not have to be, and in most cases probably would not be, an entire metropolitan nonattainment area covered by a SIP. A portion of a nonattainment area could be designated a CADC in those cases where the land use changes did not result in a sufficient emissions reductions to allow the entire nonattainment area to qualify. It should be noted, however, that if a CADC smaller than the entire nonattainment are was designated, any analysis of the effect of any changes in development would have to reflect and consider effects on the nonattainment area as a whole.
- c. What would a development zone be? The EPA proposes that areas that meet certain criteria would be considered "development zones," and new sources in these development zones could receive offsets from State offset pools. The following are a list of criteria that EPA could use to define those zones. The EPA's goal is to help identify

zones which promote environmentally sound development, the preservation of regionally or locally designated open space, and sites which have adequate, existing infrastructure.

Areas would, for example, have to be:

- Located within an 8-hour ozone nonattainment area.
- Located within an "urbanized area" as defined by the
 U.S. Census Bureau.⁷⁵
- Zoned for industrial use.
- Located within 0.25 miles of rail freight facilities.
- Located within 0.5 mile of fixed rail or express bus transit service.
- Designated or qualifies for designation as a Federal or State redevelopment zone.
- Enrolled in a State brownfield remediation plan.
- Designated industrial corridor.
- Adopted land use density indicators such as population, employment, congestion index.

The EPA specifically requests comment on these criteria including whether these criteria are appropriate, should they be changed and, if so, how. We also request comment

⁷⁵Urbanized area - an area consisting of a central place(s) and adjacent urban fringe that together have a minimum residential population of at least 50,000 and generally an overall population density of at least 1,000 people per square mile of land area.
www.census.gov/geo/www.tiger/glossary.html

if a site must meet all or just some of the criteria to qualify.

- d. Why is EPA proposing these ideas? The EPA would like to encourage land use practices that reduce emissions, and one possible way could be via NSR program flexibility. The EPA recognizes that the way land use occurs in an area can affect emissions in all sectors, including stationary, area and mobile sources. For on-road mobile sources areas can already include the emissions impacts of their land use choices within their SIP, as well as in their transportation conformity determinations. The EPA would like to encourage areas to adopt land use practices that result in fewer emissions from all sectors by allowing areas to apply the benefits from certain land use measures to the major stationary source sector and creating special NSR flexibilities for areas that do so.
- e. If areas receive NSR flexibility for adopting land use measures, can the air quality benefits of land use measures also be applied to other sectors? As part of any flexibility, EPA wants to ensure that areas do not count the effects of a land use activity twice. For example, if areas decide that they want to apply the emissions benefits that result from certain land use decisions toward NSR, then they cannot also include the air quality benefits of land use choices in their motor vehicle emissions budgets in the SIP,

or in the area's transportation conformity determinations. The EPA recognizes that this means that areas will have to decide for themselves how to apply any emissions benefits of land use activities, and that consultation between all affected parties must occur. For many communities, this could be a difficult decision that would require the input of many stakeholders representing both the mobile and stationary source sectors as well as the general public.

One possible way for areas to avoid double counting would be for EPA to give credit only for new measures that are adopted in response to this proposal. This approach would ensure that the proposal acts as an incentive to encourage new actions that will reduce emissions. Such an approach could, however, be seen as unfairly penalizing areas that have already taken positive actions. The EPA requests comment on how best to balance the issues of ensuring fair treatment for all areas, preventing double counting and making this proposal an effective incentive.

For example, areas would continue to include existing land use measures in their SIP motor vehicle emissions budgets and in their conformity determinations, and apply the reductions from newly adopted land use measures to demonstrate they qualify for the type of flexibilities proposed here. Quantifying the on-road mobile source air quality impacts of land use measures occurs in

transportation modeling (discussed below). Therefore, in a SIP submission that includes land use measures adopted to obtain NSR flexibility, areas would have to show that their motor vehicle emissions budgets do not also include the effects of the newly adopted land use measures. The EPA also recognizes that there may be other, potentially easier ways to avoid double counting and encourages commenters to submit them.

f. How would areas quantify the benefits of land use choices? Areas would quantify the benefits of land use through their air quality modeling process in the SIP process. The EPA's guidance, "Improving Air Quality Through Land Use Activities" provides information about how land use measures are modeled and possibly quantified. The EPA requests comment on other potential methods of quantifying the reductions.

Areas should be aware that quantifying the benefits of land use may not be an easy task. The EPA sees two potential difficulties in quantifying the benefits of land use for application to NSR on which we seek input. First, as stated above, it may be very complicated for areas to avoid counting the same air quality benefits twice. One way areas might reduce the risk of such double counting, would be to do two sets of modeling. One based on the current situation, the next based on the proposed land use changes

made by the community. The difference between this "before and after modeling" would show the emission impacts of the land use changes. We recognize that this modeling is very complex, resource intensive and that this is easier said than done. Complexities arise because in many areas across the country, on-road mobile source emissions are estimated using transportation and emissions models. The locations where people live and work in an area, are important input to the transportation planning and modeling processes. As such, the long range transportation plan which covers at least 20 years into the future was developed to reflect the mobility needs for a specific land use scenario. It has been long recognized that there is a complicated, dynamic and interrelated relationship among air quality, transportation and land use planning. Evaluation may need to be iterative. For example, if land use changes are proposed to gain air quality benefits, the transportation system may need to be re-evaluated to insure, that with the new land use scenario, the transportation system can continue to provide an acceptable level of transportation service to all members of the community. Therefore, it may be difficult for areas to precisely quantify the emissions related to land use choices from this modeling, given the dynamic nature between land use and transportation. conducting this sort of analysis, States should be working

closely with MPOs and other transportation and planning agencies.

The second set of difficulties involves setting the timeframe before emission benefits can be realized. seeks comment on the potential difference in the time period over which benefits may be realized from land use strategies compared to the NSR program. Land use strategies tend to be long term. Once a particular land use strategy is adopted, it may take several years before the change results in air quality benefits. For example, suppose an area decides to change its zoning regulations to encourage mixed-use development. This strategy may ultimately result in lower relative emissions because of people making less vehicle trips because housing, employment, and shopping are located together compared to development patterns that might occur without the changes to the zoning regulations, and the increase in density may generate transportation options such as transit service, bicycling, and walking. However, it may be several years before the zoning regulations actually result in differences in where people and businesses decide to locate. Of course, it should be noted that flexibilities proposed do not necessarily mean that new development will occur right away. The EPA requests comment on how to take this issue of timing into account in our proposal to give program flexibility for adopting land use measures.

- g. How can changes to land development affect air quality? As metropolitan areas continue to expand in both size and population, how and where development occurs has significant implications for many environmental impacts including air quality. For example, establishing land use strategies to increase population and housing densities, and support the provision of mixed use development can make transit, and bicycle and pedestrian facilities more viable options to driving. These strategies may decrease the amount of motor vehicle emissions that would occur compared to development patterns if the strategies were not established.
- h. What is the connection between land use and NSR? A major new source has the potential to be a major economic development generator for a region that may influence development and travel patterns. For example, if a large new facility were to locate outside of the nonattainment area (in many cases this means outside of the area with existing development, infrastructure and density) it may affect regional travel patterns. Such a facility that hires hundreds of people and is located where there are few opportunities to use alternative modes of transportation (e.g., mass transit or walking to work) usually may result in greater amounts of VMT and vehicle trips ("VT") per employee than a similar facility accessible by mass transit. For example, a long-term effect of locating a large facility

in an undeveloped area, particularly one that employs a large number of people, could be that it ultimately attracts additional development. For instance, if enough employees are at the site, the nearby area may attract other service industries (e.g., fast food, drycleaners, and gas stations). These developments may be low density, auto-dependent, and single-use, which may generate additional emissions (both area and mobile sources). The NSR program does not consider or offset these emissions.

On the other hand, if a hypothetical source chooses to locate in an area that is already developed, it may generate less VMT and therefore fewer emissions than one located in an undeveloped area. The source may be able to take advantage of the existing infrastructure and service, without the construction of new infrastructure elements (roads, sewer lines, etc.) that result in their own air emissions and other environmental impacts. Such location in existing developed areas may not open up new areas to development and encourage sprawl. With this option, EPA is trying to recognize the indirect impacts of development. If communities use CADC techniques, they should, compared to communities that do not use such practices, offset some of the indirect emissions from new sources. The NSR program only considers the direct impacts from a development. This option tries to look more broadly at all the impacts of

development. We would reduce the requirements of NSR and would provide increased program flexibility in exchange for the reduced emissions from CADC practices.

A strategy that recognizes the relationships between stationary, area and mobile sources, as well as how these impacts affect total environmental quality, is one that will most effectively deal with today's environmental problems. That is why multiple offices in EPA--the Air Office, the Water Office, the Policy Office and the Brownfields Office--all have programs encouraging development patterns that reduce environmental impacts. These programs use a variety of tools: regulations, information, and partnerships to encourage such development. It would be consistent with these other Agency efforts to try and develop a way to use flexibilities in CAA programs to encourage CADC practices. It would also be consistent with the many States and localities that are interested in accounting for the air quality benefits of their development choices.

i. Are there other environmental impacts that result from land use choices? Yes, low density development patterns tend to disturb more land and create more impervious cover over a region (e.g., paved roads), harming a region's water quality and disrupting habitat. Because of the close interaction between development and the achievement of national environmental goals, EPA has long been engaged in

addressing their environmental impacts. The Office of Water seeks to address the impacts of development through its watershed programs, non-point source programs, source water protection efforts, the National Estuary Program, and Total Maximum Daily Load programs. When EPA reviews projects under the National Environmental Policy Act, it examines the secondary and cumulative impacts of development generated by Federal actions. The Brownfields Office, recognizing the necessity of engaging the private sector, has sought specifically to encourage development on brownfields.

- j. What are some of the land use strategies measures

 included in "Improving Air Quality Through Land Use

 Activities"? The guidance includes a number of different
 activities that may generate on-road mobile source emissions
 reductions. A sampling of them includes:
- Grant incentives to build concentrated activity centers: encouraging pedestrian and transit travel by creating high density mixed use nodes that can be easily linked by a transit network.
- Change zoning regulations to allow or encourage mixeduse development; this encourages pedestrian travel by putting compatible land uses next to each other.
- Build, or require developers to install, pedestrian and bicycle facilities; and increase the number of sidewalks, paths, crosswalks, bike lanes, etc., to make walking and bike use safe.
- Transfer unused development capacity in outlying areas to increase density above existing limits in central areas and near transit nodes; this moves development away from outlying areas and toward already developed areas.

• Provide incentives such as reduced parking requirements to new in-fill development; this takes advantage of existing infrastructure and discourages driving.

If EPA were to go forward with this concept the Guidance would be formally incorporated by reference.

- k. Does the CAA include the concept of increased

 flexibility in the NSR program in cases where development is

 targeted in appropriate areas? Yes, Section 173(a)(1)(B)

 replaces the traditional requirement that a new or modified

 stationary source in a nonattainment area obtain offsets

 with a growth allowance concept in specially designated

 zones to which "economic development should be targeted."

 The EPA recognizes, however, that this proposal differs in

 many respects from section 173.
- 1. <u>Does this option mandate any changes to local land use</u>

 <u>decisions</u>? No. The CAA, in Section 131, clearly supports

 the position that land use decisions are local. This option

 would simply recognize that areas that choose to develop in

 certain patterns are doing more to improve air quality and

 that such efforts should be rewarded.
- m. How would this option be enforced? Since the CADC measures would be in the SIP, they could not be changed without EPA approval of a SIP revision. If measures are changed they must be replaced with other measures of equal or greater effectiveness, and otherwise meet the

requirements of section 110(1) concerning anti-backsliding. Failure to do so would mean that either of these options would no longer apply to the area. The EPA understands that it does not have the authority to control local land use decisions. The choice always rests with the community, however, they don't get the advantages of being a CADC unless they put the measures in their SIPs. Should they decide to change a land use measure in the SIP, the issue for EPA would be whether or not other new measures yield sufficient reductions to allow the area to remain a CADC. The land use measure itself would be approved. The EPA requests comments on how best to enforce these options.

- n. What are the relative advantages of the two options.

 The first option provides greater incentive for communities and is, therefore, more likely to encourage changes to land development policies. The second option is simpler since it does not make changes to NSR. As a result, unlike option 1, it does not need communities to try to estimate the increased emissions that could result from changing NSR applicability which admittedly would be difficult.
- o. What are the disadvantages of this proposal? In addition to the modeling issues discussed above in section f, there are several other issues associated with providing flexibilities, such as reducing NSR requirements, for areas that adopt CADC land use measures. It may be difficult to

ensure that the CADC land use measures are implemented by areas participating in the option. It may also be difficult to design penalty measures if those land use measures are not implemented by areas. In addition, if the CADC should fail to achieve its envisioned land use pattern, how would the MPO model the area for purposes of conformity. By encouraging growth in established areas, this option may raise environmental justice concerns and unanticipated costs for low-income residents. Some States may have difficulties managing and tracking offset pools. The EPA requests comment on all of these issues and how we can best resolve them.

10. Tribal concerns.

In addition, we expect that some Tribal areas will be designated as nonattainment because of pollution that is transported from the surrounding State(s) and will have little control over the ability of areas under their jurisdiction to attain the air quality standards. In the event that such an area fails to attain by the attainment date, additional flexibility for the Tribes will be needed to address the fairness issues created by transported nonattainment problems. Tribes have asked that we consider providing offset set-asides in order to address these issues. We request comment on whether emission offset set-asides, possibly generated by innovative measures to promote

additional emissions reductions, are an appropriate method to help level the playing field for the Tribes in order to support economic development in Tribal areas. In any case, we believe that some provisions will need to be made for Tribal areas, because they will have limited ability, if any, to generate offsets on their own. We may also need to work with States to help provide the Tribes access to offsets from non-Tribal areas. Also, it is important to recognize that the NO_{x} SIP Call does not provide for an emissions budget for Tribes. Therefore, we are asking for comments on how to provide a set-aside to provide fair access to development in these areas.

- P. How will EPA ensure that the 8-hour ozone standard will be implemented in a way which allows an optimal mix of controls for ozone, PM_{2.5}, and regional haze?
- 1. Could an area's 8-hour ozone strategy affect its PM_{2.5} and/or regional haze strategy?

Many of the areas that are violating either the 8-hour ozone or $PM_{2.5}$ NAAQS, may be violating both of these NAAQS. Thus, in many cases, States will have ozone and $PM_{2.5}$ nonattainment areas with overlapping boundaries. Requirements for regional haze apply to all areas. Each State is responsible for developing SIP revisions to meet all the requirements relevant to each nonattainment area for each pollutant as well as developing a regional haze plan.

In some cases, ozone control measures may also be useful for a $PM_{2.5}$ control strategy or a regional haze plan. Similarly, controls for $PM_{2.5}$ may lead to reductions in ozone or regional haze. For example, considered in isolation, a metropolitan area's ozone strategy might be based on additional VOC emissions reductions; if the area needs NO_x reductions for $PM_{2.5}$ attainment, however, an optimal approach might include a more complex ozone strategy using both NO_x and VOC reductions. We believe integration of ozone and $PM_{2.5}$ attainment planning will reduce overall costs of meeting multiple air quality goals.

Many of the factors affecting concentrations of ozone also affect concentrations of $PM_{2.5}$. Emissions of NO_x and/or VOC will lead to formation of organic particles and the precursors of particulate nitrate, as well as ozone. The presence of ozone is an important factor affecting $PM_{2.5}$ formation; as ozone builds up, so do OH radicals which are instrumental in oxidizing gas phase SO_2 to sulfuric acid. The sulfuric acid may be converted to sulfate particles, increasing the $PM_{2.5}$ concentration. Further, the local ozone concentrations may be decreased by the reaction of ozone with nitric oxide; thus, in some large urban areas, a decrease in local NO_x emissions can result in higher local ozone concentrations, leading to higher OH radical concentrations and increases in secondary $PM_{2.5}$. Because the

precursors for ozone and $PM_{2.5}$ may be transported hundreds of kilometers, regional scale impacts may also need to be considered.

2. What guidance has EPA provided regarding ozone, $PM_{2.5}$ and regional haze interaction?

As described in an earlier section of today's proposed rulemaking, States must develop ozone attainment demonstrations for many nonattainment areas. General criteria for attainment demonstrations are contained in 40 CFR part 51, appendix W (i.e., "EPA's Guideline on Air Quality Models"). The EPA's May 1999 draft "Guidance on the Use of Models and Other Analyses in Attainment Demonstrations for the 8-Hour Ozone NAAQS" provides a set of general requirements that an air quality model should meet to qualify for use in an attainment demonstration for the 8hour ozone NAAQS. The draft guidance encourages States to integrate ozone control strategies with strategies designed later to attain the NAAQS for $PM_{2.5}$ and to meet reasonable progress goals for regional haze. In addition, the draft quidance presents some modeling/analysis principles to help States develop data bases and capabilities for considering joint effects of control strategies for ozone, $PM_{2.5}$ and regional haze. Because emissions and meteorological conditions vary seasonally, the guidance recommends assessing the effects of an ozone control strategy on annual $PM_{2.5}$ concentrations by estimating effects on mean $PM_{2.5}$ for each season and using the resulting information to estimate annual impacts. Emission estimates for VOC, NO_x , primary $PM_{2.5}$, sulfur dioxide and ammonia will be needed. In addition, the modeling should separately estimate the effects of the ozone strategy on the major components of $PM_{2.5}$: mass associated with sulfates, nitrates, organic carbon, elemental carbon, and all other species. We believe that this approach is adequate to ensure that the 8-hour ozone standard will be implemented by States in a way that allows an optimal mix of controls for ozone, $PM_{2.5}$, and regional haze.

Similarly, EPA's attainment demonstration guidance for $PM_{2.5}$ and regional haze states that models intended to address secondary PM problems should also be capable of simulating ozone formation and transport (January 2, 2001, "Guidance for Demonstrating Attainment of Air Quality Goals for $PM_{2.5}$ and Regional Haze"). The formation and transport of secondary PM are closely related to processes that are important in the formation and transport of ozone. Thus, it makes sense for programs designed to control ozone to be cognizant of programs to reduce $PM_{2.5}$ and improve visibility and vice versa. The $PM_{2.5}$ guidance suggests conducting a "mid-course review" of an approved $PM_{2.5}$ plan to review changes in air quality resulting from implementation of

plans to reduce $PM_{2.5}$, regional haze, and ozone. (The EPA guidance on mid-course review of attainment demonstrations is described earlier in today's proposed rulemaking.)

We realize that in some cases development of control plans will be complicated by the need to assess the impact of the precursors of ozone, PM_{2.5}, and regional haze. The question arises whether such areas may be provided more time to perform the more complicated analyses such that an effective multi-pollutant strategy may be developed. However, the statute provides no express relief for these situations. Thus, the State is still responsible for developing and submitting demonstrations which show that each standard will be attained by the applicable date or dates provided.

3. What is EPA proposing?

Today, we propose to continue the policy of encouraging each State with an ozone nonattainment area which overlaps or is nearby a PM_{2.5} nonattainment area to take all reasonable steps to coordinate the required revisions for these nonattainment areas and meet reasonable progress goals for regional haze. Specifically, we encourage States conducting modeling analyses for ozone to separately estimate effects of a strategy on the following: mass associated with sulfates, nitrates, organic carbon, elemental carbon, and all other species.

Q. What emission inventory requirements should apply under the 8-hour ozone NAAQS?

The Consolidated Emissions Reporting Rule (CERR) (67 FR 39602, June 10, 2002) has established basic emission inventory requirements. Specific SIP-related inventory issues will be detailed in a guidance document. An important difference between inventories submitted in response to the CERR and SIP inventories is the issue of approvability. While it is likely that an inventory submitted under the CERR would be identical to the inventory submitted as part of a SIP, the SIP inventory will need to go through public hearing and formal approval by EPA as a SIP element. This public process can be combined with the public process the State undertakes for other SIP elements. The following discussion presents more details on the emission inventory.

Emission inventories are critical for the efforts of State, local, and Federal agencies to attain and maintain the NAAQS that EPA has established for criteria pollutants including ozone. Pursuant to its authority under section 110 of title I of the CAA, EPA has long required States to submit emission inventories containing information regarding the emissions of criteria pollutants and their precursors. The EPA codified these requirements in 40 CFR part 51, subpart Q in 1979 and amended them in 1987.

The 1990 CAA Amendments revised many of the provisions of the CAA related to attainment of the NAAQS and the protection of visibility in mandatory Class I Federal areas (certain national parks and wilderness areas). These revisions established new periodic emission inventory requirements applicable to certain areas that were designated nonattainment for certain pollutants. In the case of ozone, section 182(a)(3)(A) required that States submit an emission inventory every 3 years for nonattainment areas beginning in 1995 for calendar year 1993. The inventory must include emissions of VOC, NO_x, and carbon monoxide (CO) for point, area, mobile (on-road and non-road), and biogenic sources.

In 1998, EPA promulgated the NO_x SIP Call (§51.121) which calls on the affected States and the District of Columbia to submit SIP revisions providing for NO_x reductions in order to reduce the amount of ozone and ozone precursors transported across State borders. As part of that rule, EPA established emissions reporting requirements for States subject to the SIP Call. 76

 $^{^{76}\}mbox{Although the United States Court of Appeals has remanded certain limited issues regarding the NO<math display="inline">_{x}$ SIP Call to the Agency, those issues do not include the reporting requirements. See *Michigan v. EPA*, 213 F. 3d 663 (D.C. Cir. 2000), and *Appalachian Power Co. v. EPA*, 251 F. 3d 1026 (D.C. Cir. 2001).

In 2002, EPA promulgated the CERR. (67 FR 39602, June 10, 2002). The CERR consolidates the various emissions reporting requirements that already exist into one place in the CFR, establishes new reporting requirements for $PM_{2.5}$ and its precursors and establishes new requirements for the statewide reporting of area source and mobile source emissions.

The CERR establishes two types of required emission inventories:

- Annual inventories, and
- 3-year cycle inventories.

We anticipate that States will use data obtained through their current annual source reporting requirements (annual inventories) to report emissions from larger point sources annually. States will need to get data from smaller point sources every 3rd year. States may also take advantage of data from emission statements that are available to States but not reported to EPA. New nonattainment areas for the 8-hour standard that are classified under subpart 2 will need to establish an emission statement program as specified under section 182(a)(3)(B). We published guidance on emission statements in July 1992 titled, "Guidance on the Implementation of an Emission Statement Program." As appropriate, States may use the emission statement data to meet their reporting requirements for point sources. We are

interested in States' comments on their experience with the emission statement program and how the implementation of the emission statement program can be improved. States are also required to inventory area and mobile source emissions on a statewide basis for the 3-year cycle inventory. Mobile source emissions should be estimated by using the latest emissions models and planning assumptions available. latest approved version of the MOBILE model (MOBILE6 at the time of this proposed rulemaking, see 67 FR 4254, January 29, 2002) should be used to estimate emissions from on-road transportation sources, in combination with the latest available estimates of VMT. The EPA has issued a quidance memo titled "Policy Guidance on the Use of MOBILE6 for SIP Development and Transportation Conformity" dated January 18, 2002, that provides additional information on the use of the MOBILE6 model. The NONROAD model is currently available in draft form and can be used for initial estimates of off-road mobile source emissions. We expect that the final version of the NONROAD model will be released in late 2004, which will not be in time for States to use it for their 2002 emission inventories, which are due June 1, 2004. However, by the time EPA's rulemaking on implementation of the 8-hour ozone standard is final and States need to begin preparing SIPs, a new draft version of NONROAD will have been released in connection with a planned proposal in early 2003

regarding regulation of certain non-road engine categories. When the NONROAD model is final, States may choose to update their 2002 emission inventories using the final NONROAD model. By merging the information on point sources, area sources and mobile sources into a comprehensive emission inventory, State and local agencies may do the following:

- set a baseline for SIP development,
- measure their progress in reducing emissions,
- have a tool they can use to support future trading programs,
- answer public requests for information.

Most importantly, States need these inventories to help nonattainment areas develop and meet SIP requirements to reach the NAAQS.

In April 1999, we published "Emissions Inventory Guidance for Implementation of Ozone and Particulate Matter National Ambient Air Quality Standards (NAAQS) and Regional Haze Regulations," EPA-454/R-99-006. We will be updating this guidance and are soliciting comment on several key points to be addressed in the revised document. These points are:

Section 182(a)(1) requires that marginal and above ozone nonattainment areas submit an emission inventory
 2 years after designation as nonattainment in 1990.
 For nonattainment areas classified under subpart 2 for

the 8-hour ozone standard, we propose to interpret this to mean that an emission inventory would be required 2 years after designation (i.e., in 2006 if EPA designates areas in 2004). The CERR requires comprehensive triennial emission inventories, beginning with the 2002 inventory year, regardless of an area's attainment status. Because these emission inventories will be available, we propose that the emission inventories required by the CERR are sufficient to meet the provisions of section 182(a)(1).

- of Tribal areas have been included in designated nonattainment areas, but when the baseline emission inventory was prepared, emissions from the Tribal lands were not included. This has had the effect of preventing the Tribes from generating emission reductions from existing sources to develop emission offsets, as well as impairing the ability of the State to model as accurately as possible. We are encouraging the States and Tribes to work together to ensure that the information used in developing the baseline emission inventory is inclusive of all emissions from the nonattainment area.
- The emission inventory is used as a tracking metric by some programs such as emission trading, NSR offsets

trading and RFP. This requires that a year is designated as a "baseline" year and used as the reference for the particular program.

An external review draft of the emission inventory guidance titled "Emission Inventory Guidance for Implementation of Ozone and Particulate Matter National Ambient Air Quality Standards (NAAQS) and Regional Haze Regulations" is available at:

http://www.epa.gov/ttn/chief/eiinformation.html. Comments on this document are due at the same time as comments on this proposed rulemaking. However, the review of the emission inventory guidance is not part of this proposed rulemaking. Comments submitted on the emission inventory guidance should be identified as such and will not be docketed nor will a comment/response summary of these comments be a part of the final 8-hour ozone implementation rule. Instructions on how to submit comments are included with the draft guidance document.

R. What quidance should be provided that is specific to Tribes?

This section summarizes guidance for Tribes offered in various parts of this proposal. The TAR (40 CFR part 49), which implements section 301(d) of the CAA, gives Tribes the option of developing TIPs. Unlike States, Tribes are not required to develop implementation plans. Specifically, the

TAR, adopted in 1998, provides for the Tribes to be treated in the same manner as a State in implementing sections of The EPA determined in the TAR that it was inappropriate to treat Tribes in a manner similar to a State with regard to specific plan submittal and implementation deadlines for NAAQS-related requirements, including, but not limited to, such deadlines in CAA sections 110(a)(1), 172(a)(2), 182, 187, and 191. See 40 CFR 49.4(a). If a Tribe elects to do a TIP, we will work with the Tribe to develop an appropriate schedule which meets the needs of each Tribe, and which does not interfere with the attainment of the NAAQS in other jurisdictions. The Tribe developing a TIP can work with the EPA Regional Office on the appropriateness of applying RFP and other SIP requirements that may or may not be appropriate for the Tribe's situation.

The TAR indicates that EPA is ultimately responsible for implementing CAA programs in Indian country, as necessary and appropriate, if Tribes choose not to implement those provisions. For example, an unhealthy air quality situation in Indian country may require EPA to develop a FIP to reduce emissions from sources on the reservation. In such a situation, EPA, in consultation with the Tribe and in consideration of their needs, would work to ensure that the NAAQS are met as expeditiously as practicable. Likewise, if

we determine that sources in Indian country could interfere with a larger nonattainment area meeting the NAAQS by its attainment date, we would develop a FIP for those sources in consultation with the Tribe, as necessary and appropriate.

The TAR also provides flexibility for the Tribe in the preparation of a TIP to address the NAAQS. If a Tribe elects to develop a TIP, the TAR offers flexibility to Tribes to identify and implement - on a Tribe-by-Tribe, case-by-case basis - only those CAA programs or program elements needed to address their specific air quality In its proposed Tribal rule, we described this problems. flexible implementation approach as the "modular approach." Each Tribe may evaluate the particular activities, including potential sources of air pollution within the exterior boundaries of its reservation (or within non-reservation areas for which it has demonstrated jurisdiction), which cause or contribute to its air pollution problem. A Tribe may adopt measures for controlling only those sources or ozone precursor emissions, as long as the elements of the TIP are "reasonably severable" from the package of elements that can be included in a whole TIP. A TIP must include regulations designed to solve specific air quality problems for which the Tribe is seeking EPA approval, as well as a demonstration that the Tribal air agency has the authority from the Tribal government to develop and run their program,

the capability to enforce their rules, as well as the resources to implement the program they adopt. In addition, the Tribe must receive an "eligibility determination" from EPA to be treated in the same manner as a State and to receive authorization from EPA to run a CAA program.

We would review and approve, where appropriate, these partial TIPs as one step of an overall air quality plan to attain the NAAQS. A Tribe may step in later to add other elements to the plan, or EPA may step in to fill air quality gaps as necessary and appropriate. In approving a TIP, we would evaluate whether the plan interferes with the overall air quality plan for an area when Tribal lands are part of a multi-jurisdictional area.

Because many of the nonattainment areas will include many jurisdictions, and in some cases both Tribal and State jurisdictions, it is important for the Tribes and the States to work together to coordinate their planning efforts.

States need to incorporate Tribal emissions in their base emission inventories if Indian country is part of an attainment or nonattainment area. Tribes and States need to coordinate their planning activities as appropriate to ensure that neither is adversely affecting attainment of the NAAOS in the area as a whole.

S. What are the requirements for OTRs under the 8-hour ozone standard?

Section 176A of subpart 1 provides the authority to establish interstate transport regions where transport of air pollutants from one or more States contributes significantly to a violation of a NAAQS in one or more other States. When a transport region is established, section 176A requires that a transport commission, comprised of representatives from the States in the transport region, also be established. The role of the transport commission is to assess the degree of interstate transport of the pollutant and precursors throughout the transport region and to evaluate strategies for mitigating the interstate pollution.

Section 184 of subpart 2 establishes additional provisions for OTRs. Section 184(a) specifically established an OTR comprising 12 Northeast and Mid-Atlantic States and the District of Columbia in order to address the longstanding problem of interstate ozone pollution in that region. The general provisions of section 176A apply to any OTR established under section 184. To date, the existing OTR is the only transport region for any pollutant that has been established and is subject to the section 176A requirements.

Section 184(b) of subpart 2 sets forth specific VOC and $\rm NO_x$ control requirements to be applied throughout the entire OTR, in both attainment and nonattainment areas, to reduce

interstate pollution. These additional regional control requirements are part D NSR (for VOC and NO_x), RACT (for VOC and NO_x), enhanced vehicle I/M, and Stage II vapor recovery (for vehicle refueling) or a comparable measure. Some of these requirements duplicate requirements for ozone nonattainment areas that are classified under subpart 2.

We believe the clearest legal interpretation of section 184 is that the current OTR and section 184 control requirements apply for purposes of the 8-hour standard. We believe that this interpretation would not result in any new control requirements for any area in the OTR because these control requirements are not associated with an area's designation or classification and already apply regionwide under the 1-hour ozone standard. Rather, these statutory obligations would remain in place for areas in the existing OTR. If a new OTR is established for purposes of the 8-hour standard pursuant to section 176A, that area would also be subject to the provisions and additional control requirements of section 184.

Because all areas in the existing OTR, including attainment areas, are subject to part D NSR for NO_x and VOC and a number of other control measures, areas in the OTR would not be able to take full advantage of either the transitional option proposed for NSR or the Agency's

existing approach for early reductions, both of which are discussed elsewhere in this proposed rulemaking.

T. Are there any additional requirements related to enforcement and compliance?

Section 172(c)(6) requires nonattainment SIPs to "include enforceable emission limitations, and such other control measures, means or techniques . . . as well as schedules and timetables for compliance , as may be necessary or appropriate to provide for attainment . . ." The current guidance, "Guidance on Preparing Enforceable Regulations and Compliance Programs for the 15 Percent Rateof-Progress Plans (EPA-452/R-93-005, June 1993)" is relevant to rules adopted for SIPs under the 8-hour ozone NAAQS and should be consulted for purposes of developing appropriate nonattainment plan provisions under section 172(c)(6). This document provides States with guidance on how to prepare enforceable stationary and mobile source regulations for their ROP plans. Developing clear, concise, enforceable rules and establishing strong compliance programs helps to ensure that the emissions reductions projected for specific control strategies are actually achieved. The document identifies the minimum criteria and the information sources that we will use to evaluate the enforceability of regulations, and to determine compliance with Federal quidelines and regulations. States should follow the

guidelines provided in this document as part of their quality assurance process involved in the development of control measures for their ROP plans and their attainment demonstrations.

U. What requirements should apply to emergency episodes?

Currently, subpart H of 40 CFR part 51 specifies requirements for SIPs to address emergency air pollution episodes and for preventing air pollutant levels from reaching levels determined to cause significant harm to the health of persons. We anticipate proposing a separate rulemaking in the future to update portions of that rule. This separate rulemaking may be done in conjunction with revisions to the emergency episode rules that will address the PM_{2.5} NAAQS.

V. What ambient monitoring requirements will apply under the 8-hour ozone NAAQS?

Ozone monitoring data play an important role in designations, control strategy development, and related implementation activities. The ambient monitoring requirements are listed in 40 CFR part 58.

We plan to modify these existing ozone monitoring requirements as part of the National Air Monitoring Strategy. These changes are being undertaken in a separate rulemaking effort. We plan to propose a national strategy introducing NCore (national core monitoring sites) as a

replacement for traditional national air monitoring stations/State and local air monitoring stations

(NAMS/SLAMS) monitoring currently codified at 40 CFR part 58.

Part of the NCore network⁷⁷ would include the existing ozone monitoring sites that currently support the NAAQS-related activities. The number and location of the original sites would likely be very similar to the current network. The regulatory modifications are expected to include ozone monitoring requirements based upon the population of an area and its historical/forecasted ozone air quality values.

In addition, we anticipate that we will include a requirement for measuring multiple air pollutants at select locations. The NCore sites are expected to include high-sensitivity nitrogen oxide (NO) and total reactive oxides of nitrogen (NOy) measurements at locations across the nation to support the tracking of national emission strategy efforts such as the NO_x SIP Call and, if created, a statute codifying the Clear Skies Bill, which addresses NO_x reductions across the nation.

Each State, local, and Tribal air monitoring agency is being asked to assess the adequacy of its air pollution

⁷⁷A description of the NCore can be found at the
following web site:
http://www.epa.gov/ttnamtil/files/ambient/monitorstrat/sec4.
pdf.

monitoring networks, including those sites that measure ozone. We will work with these agencies to develop network plans to ensure approval of all network designs. On a local basis, there will be some relocation, addition and removal of ozone sites as a result of regional network assessments.

The CAA requires that ozone precursor monitoring be conducted in any ozone nonattainment area classified as serious, severe, or extreme. We adopted regulations reflecting the statutory requirements in 40 CFR part 58 in 1994 as the Photochemical Assessment Monitoring Stations (PAMS) program. Areas that would be designated under the 8-hour ozone NAAQS are not directly addressed in 40 CFR part 58 for ozone precursor monitoring.

The PAMS monitoring will be retained in areas currently designated as 1-hour ozone serious, severe, and extreme nonattainment areas. The monitoring strategy regulation revisions will consider the possibility of reducing some of the sampling schedules. We also intend to promote the use of individually designed PAMS networks to address the very specific ozone and ozone precursor data needs in PAMS areas.

The revised regulation will also cover all areas that are classified as serious or above for the 8-hour NAAQS.

Once an area is bumped up to serious or above, it would be subject to the enhanced monitoring rule and would be required to develop appropriate PAMS plans. Where

practical, PAMS stations should be incorporated into multipollutant NCORE level 2 sites⁷⁸ that include NOy,
meteorological and CO (a good indicator of mobile emission
measurements.) Alternative plans are recommended for 8-hour
bump-up areas. This will be reflected in the 40 CFR part 58
changes as well.

W. When will EPA require 8-hour attainment demonstration SIP submissions?

1. Background

The time for submission of attainment demonstration SIPs is linked to whether the requirements are specified under subpart 1 or subpart 2. In general, all areas designated nonattainment are subject to the planning requirements of subpart 1. However, if the area is subject to a more specific requirement under subpart 2, the subpart 2 planning obligation controls. As proposed elsewhere in the discussion concerning classification options, some, if not all, 8-hour ozone standard nonattainment areas will be subject to the subpart 2 planning obligations.

Section 172(b) (in subpart 1) provides that at the time EPA promulgates the designation of an area as nonattainment with respect to a NAAQS under section 107(d), the

⁷⁸A description of the NCore level 2 stations can be found at the following web site: http://www.epa.gov/ttnamtil/files/ambient/monitorstrat/sec4. pdf.

Administrator shall establish a schedule for submission of a plan that meets the CAA's requirements for nonattainment areas. This schedule may not extend beyond 3 years after the date of nonattainment designation.

Under subpart 2 of the CAA, attainment demonstration SIP submission deadlines for areas designated nonattainment for the 1-hour ozone standard are linked to the date of enactment of the CAA Amendments, i.e., from November 15, 1990. This date is also the date by which most of these areas were designated and classified by operation of law. \underline{See} CAA section 107(d)(1)(C) and 181(a). Moreover, in subpart 1, Congress linked the time for SIP submission to the time of designations. See CAA section 172(b). Because such dates have long since passed, we believe that it is reasonable to tie the SIP submittal dates to the date of nonattainment designations and classifications for the 8hour standard. 79 While the submission date for all SIP requirements in subpart 2 will be tied to the date of nonattainment designations, this section of the proposed rule discusses the requirement to submit an attainment demonstration. For purposes of the discussion here, we are assuming that designations will occur in 2004.

⁷⁹ Since we anticipate that areas will be designated and classified on the same date, we will use the term "designation" to represent the date of designation and classification.

Subpart 2 requires attainment demonstration submissions at different times depending on an area's classification. Section 182(a) does not require an attainment demonstration for marginal areas. Section 182(b)(A)(1) requires moderate areas to submit an attainment demonstration no later than 3 years after the date of enactment. Section 183(c)(2) requires serious (and higher classified) areas to submit an attainment demonstration no later than 4 years after date of enactment. As provided above, we propose to interpret these times to run from the date of an area's nonattainment designation. Despite the fact that the CAA's provisions for the timing of submission of attainment demonstration SIPs for subpart 1 areas differs from that of subpart 2 areas, we do not believe it is appropriate or desirable to require States to submit attainment demonstrations for areas designated nonattainment under the 8-hour standard at greatly different times. We recognize that photochemical grid modeling--required by the CAA for interstate moderate nonattainment areas, as well as serious and higherclassified areas--will be performed on large enough scales to address transport and will in most cases encompass a number of nonattainment areas. These numerous nonattainment areas may differ by classification (some areas may be intrastate moderate areas, some inter-state moderate areas, and others serious and above nonattainment areas).

areas that may require attainment demonstrations may be subject to subpart 1 while others may be subject to subpart 2. Furthermore, the control strategies that may be modeled for all the areas in the modeling domain will likely be modeled simultaneously, especially if all the areas are located in a single State. Also, we believe that techniques for photochemical grid modeling, while they were more time-consuming when the 1990 CAA Amendments were enacted, are now more standardized and less time-consuming. In light of this, we do not believe it is reasonable to defer submission of attainment demonstrations beyond 3 years after designation.

The TAR, which implements section 301(d) of the CAA, gives Tribes the option of developing TIPs. Specifically, the TAR provides for the Tribes to be treated in the same manner as a State in implementing most of the CAA. However, in the TAR, EPA determined that it was inappropriate to treat Tribes in a manner similar to a State with regard to schedules. Therefore, Tribes are not required to submit a TIP, nor, if they choose to submit a TIP, are they required to submit a TIP in the same timeframe as the States. Where a Tribe chooses to develop a TIP, we will work with them to develop an appropriate schedule that meets the needs of the Tribe but does not interfere with timely attainment of the NAAQS on Tribal land or in other jurisdictions.

2. Option being proposed

In light of the above discussion and rationale, we are proposing to require all nonattainment areas that are required to perform photochemical grid modeling--regardless of coverage under subpart 1 or 2 or regardless of classification under subpart 2--to submit an attainment demonstration within 3 years after designation.

We believe this proposal would result in a closer synchronization of the 8-hour ozone and $PM_{2.5}$ attainment demonstration SIP submittal dates. We discussed the integration of ozone and $PM_{2.5}$ schedules at the three public meetings and numerous conference calls that were held with stakeholder groups. A majority of commenters were supportive of integrating the SIP attainment plan submission schedules for ozone and $PM_{2.5}$ because integration would optimize control strategies, save time and planning resources, streamline deadlines, and maximize cost effectiveness, among other benefits.

The $PM_{2.5}$ standard is anticipated to be implemented under subpart 1 of the CAA, which requires a SIP submission by a date set by EPA, which can be no later than 3 years from designation. Since we are proposing that all 8-hour ozone nonattainment areas that are required to perform photochemical grid modeling submit their attainment demonstration SIPs within 3 years after nonattainment

designation, this would result in a high degree of synchronization and thus allow comprehensive analyses that would evaluate controls to attain both air quality standards. As noted above, we are assuming for this proposed rulemaking that ozone designations will be promulgated in the 2004 timeframe; currently under TEA-21, designations for $PM_{2.5}$ would occur beginning in 2004, and must be completed by the end of 2005. Thus, the later-designated $PM_{2.5}$ areas would not be required to submit their attainment demonstration SIPs until after the ozone SIPs are due. Additional discussion of the benefits of integrating the planning for both standards appears elsewhere in this proposed rulemaking.

VII. PROPOSAL OF INTEGRATED FRAMEWORKS USING VARIOUS OPTIONS

As noted above, we are presenting two possible integrated frameworks that comprise an option from each of the above implementation elements to illustrate how they may work in conjunction with each other. In addition to soliciting comment on the options presented for the individual elements, we are also soliciting comment on how the options can be grouped into an integrated implementation framework. The following frameworks should be considered illustrative of possible ways of combining the element

options. For final rulemaking, however, we may develop a consolidated framework that uses a different combination of the options proposed above, based on comments received and other information that comes to light during the public comment period.

We are proposing for comment two integrated frameworks:

- <u>Framework 1</u>-an approach considered similar to traditional implementation,
- <u>Framework 2</u>-an approach considered more flexible than traditional implementation.

Table 5 illustrates how element options may be combined to form these two frameworks. Elements for which we are proposing only one option would be common to either framework. For elements for which we are proposing several options, only one option has been selected for purposes of illustrating the frameworks depicted below.

In addition, there are several proposed elements where options are presented that only apply to areas that would be covered by subpart 1; these elements include RACT for subpart 1 areas and the NO_x waiver requirement as it would apply to subpart 1 areas. These elements are not shown in Table 5 below, since they are only applicable to subpart 1 areas.

TABLE 5

8-HOUR OZONE NAAQS IMPLEMENTATION ELEMENTS/OPTIONS GROUPED INTO FRAMEWORKS FOR PROPOSAL

(This table only summarizes the options and approaches; the full description of the approach or option in the proposed rulemaking should be consulted)

IMPLEMENTATION ELEMENT	FRAMEWORK 1	FRAMEWORK 2
A. Will subpart 1 or subpart 2 govern classifications?	Classify all areas under subpart 2 using 8-hour design values (Option 1)	Areas with a 1-hour design value ≥ 0.121 ppm would be classified under subpart 2 using 8-hour design values. Areas with a 1-hour design value < 0.121 ppm would be covered under subpart 1. (Option 2)
B. Will areas under subpart 1 be classified?	N/A	No classification (Option 1)
C. When may the State treat measures that applied for purposes of the 1-hour standard as contingency measures, consistent with section 110(1)	When the area attains the 8-hour ozone standard and is designated attainment	

IMPLEMENTATION ELEMENT	FRAMEWORK 1	FRAMEWORK 2
D.1. How will the 15 percent VOC ROP requirement apply?	All areas classified as moderate or above for the 8-hour NAAQS must achieve a 15 percent reduction in VOC emissions for the first 6 years after the base year (2002) (Option 1).	A moderate area that already achieved a 15 percent VOC reduction for the 1-hour ozone standard would be considered to have met the 15 percent requirement already and may instead implement RFP consistent with section 172(c). An area classified as serious or above that already achieved a 15 percent VOC reduction would be considered to have met the 15 percent requirement so it could choose to achieve an average of three percent per year of VOC or NO _x reductions for the 6-year period. (Option 2)
D.2. What is the baseline year for the emission inventory used for RFP/ROP?	All areas would use a 2002 baseline year for preparation of the emissions inventory.	
D.3. What restrictions on creditable measures for RFP/ROP under the 8-hour standard (subpart 2 areas only) will apply?	All emissions reductions that occur after the baseline emissions inventory year from post-1990 Federal measures and any other measures would be creditable for ROP/RFP, except those specifically prohibited in section $182(b(1)(D)$.	

IMPLEMENTATION ELEMENT	FRAMEWORK 1	FRAMEWORK 2
D.4. What will RFP be for areas classified under subpart 1?	N/A	a. Areas with attainment dates 3 years or less after designation. As with marginal areas, those areas would not be subject to a separate RFP requirement. b. Areas with attainment dates between 3 to 6 years after designation. No separate RFP demonstration required except RFP would be met if a State demonstrates emissions reductions needed for attainment would be achieved by the attainment date. (Option 1) c. Areas with attainment dates beyond 6 years after designation. The RFP plan submission would be due with the attainment demonstration within 3 years after designation and would need to provide for certain increments of reductions from the baseline emission year out to the attainment year, proportionate to the time between the base year and the

IMPLEMENTATION ELEMENT	FRAMEWORK 1	FRAMEWORK 2	
		attainment year. (Option 1)	
D.5. How would the 8-hour ROP requirement fit with the 1-hour ROP requirement?	The area would develop new baseline and new ROP emission reduction targets for the 8-hour standard for the entire area and could drop the 1-hour standard target for any periods that overlap with an 8-hour RFP period.		
E. What's the RACT requirement for areas covered under subpart 1?	N/A	If the area is able to demonstrate attainment of the standard as expeditiously as practicable with emission control measures in the SIP, then RACT will be met, and additional measures would not be required as being reasonably available (Option 2).	

IMPLEMENTATION ELEMENT	FRAMEWORK 1	FRAMEWORK 2
F. What will be the NSR requirement?	Status quo approach for all areas - areas subject to NSR obligations for their 8-hour classifications under subpart 2 (Option 1)	Three options which could be implemented in conjunction with each other: Status quo approach for all areas (subpart 1 areas get subpart 1 NSR, subpart 2 areas get subpart 2 NSR) (Option 1); AND A more flexible NSR program (i.e., allowing a pool of offsets, more flexible technology control requirement) for areas that submit early SIPs ("transitional" NSR program) (Option 2); AND A CADC program, which would allow a more flexible NSR program for areas that adopt CADC provisions (Option 3).

VIII. Other Considerations

A. Will EPA be contemplating incentives for areas that want to take early action for reducing ozone under the 8-hour standard?

This section discusses the extent to which we are providing incentives for areas that wish to voluntarily expedite the path to cleaner air by initiating early planning and control actions for reducing ground-level ozone prior to EPA's designations for the 8-hour ozone NAAOS. State, local and Tribal air pollution control agencies have continued to express a need for added flexibility in implementing the 8-hour ozone NAAQS, including incentives for taking action sooner than EPA requires for reducing ground-level ozone. We are encouraging localities to make decisions that will achieve clean air sooner than otherwise is mandated by the CAA. Early planning and early implementation of control measures that improves air quality will likely accelerate protection of public health. issued our policy on early planning on November 14, 2002. We are not proposing action on this approach in this rulemaking and, therefore, we are not entertaining comment on this issue.

1. What are the Ozone Flex Guidelines for the 1-hour ozone NAAQS?

In June 2001 we announced the "Ozone Flex Guidelines" program (Ozone Flex), which supports and rewards innovative, voluntary, local strategies to reduce ground-level ozone. Ozone Flex is a framework for local communities to develop voluntary solutions for areas concerned about potential future nonattainment of the 1-hour ozone standard. Ozone Flex is intended to achieve emissions reductions and avoid future nonattainment problems in those areas designated attainment for the 1-hour standard. While this program is only available to areas to address the 1-hour ozone standard, it also recognizes that areas may secure emissions reductions and public health benefits toward attaining the 8-hour ozone standard prior to EPA's designation of areas. These voluntary measures may be creditable to future planning efforts for the 8-hour standard, to the extent allowed by the CAA and EPA guidance or rules. Any emissions reductions targeted for a period after the base year would provide "credit" for a State, local, or Tribal area in any future plan. Emission reduction credits toward meeting RFP are discussed elsewhere in this proposed rulemaking.

2. What is the "Early Action Compact" for implementing the 8-hour ozone NAAQS?

Following EPA's issuance of the "Ozone Flex Guidelines" for continued attainment of the 1-hour standard, the Texas

Commission on Environmental Quality (TCEQ) encouraged EPA to

consider additional incentives for early planning towards achieving the 8-hour ozone NAAQS. On March 20, 2002, the TCEQ submitted to EPA the Protocol for Early Action Compacts Designed to Achieve and Maintain the 8-hour Ozone Standard (Protocol). The Protocol was designed to achieve emissions reductions and clean air sooner than would otherwise be required under the CAA for implementing the 8-hour ozone NAAQS. The TCEQ proposed that the Protocol would be formalized by "Early Action Compact" agreements (Compacts) primarily developed by local, State and Federal (EPA) officials. The principles of the Compacts are the following:

- early planning, implementation, and emissions
 reductions leading to expeditious attainment and
 maintenance of the 8-hour ozone standard;
- local control of the measures employed, with broadbased public input;
- State support to ensure technical integrity of the early action plan;
- formal incorporation of the early action plan into the SIP;
- designation of all areas attainment or nonattainment in April 2004, but, for Compact areas, deferral of the effective date of the nonattainment designation and/or

designation requirements so long as all Compact terms and milestones continue to be met; and

• safeguards to return areas to traditional SIP attainment requirements should Compact terms be unfulfilled (e.g., if the area fails to attain in 2007), with appropriate credit given for reduction measures already implemented.

Under this approach, an early, voluntary 8-hour air quality plan would be developed through an Early Action

Compact agreement for each area that approaches or monitors exceedances of the 8-hour standard and that is designated attainment for the 1-hour ozone standard. This approach would also apply to maintenance areas for the 1-hour ozone standard to the extent such areas continue to maintain that standard. One-hour ozone maintenance areas are areas that were previously designated nonattainment for the 1-hour ozone standard, but were redesignated to attainment pursuant to section 107(d)(3)(E) and subject to the requirements of section 175A of the CAA.

Under a Compact, the local area would commit to develop a SIP based on recent emission inventories and air quality modeling demonstrating attainment of the 8-hour standard by 2007. In addition, the area would identify additional local controls beyond Federal and State requirements, which would be implemented by 2005. According to the Protocol, we would

recognize the local area's commitment to early, voluntary action by designating the area nonattainment in April 2004 (at the time of national designations for all areas of the country), but deferring the effective date of the nonattainment designation for participating Compact areas that are monitoring a violation of the 8-hour ozone standard, so long as all terms and milestones of the Compact continue to be met, including submission of the early action SIP revision no later than December 31, 2004.80 We circulated the Protocol to numerous organizations for review and comment. A copy of the revised Protocol is available in the docket for this proposed rulemaking.

3. What is EPA's response to the Texas "Early Action Compact?"

In a letter dated June 19, 2002, from Gregg Cooke,
Administrator, Region 6, to Robert Huston, Chairman, TCEQ,
EPA endorsed the principles outlined in the Protocol. The
Protocol was subsequently revised on December 11, 2002,
based on comments from EPA. Upon the completion of Compacts
by December 31, 2002 in areas that meet the requirements of
the Protocol (including 1-hour maintenance areas), we intend
to honor the commitments established in these agreements.

⁸⁰If a Compact area had air quality meeting the 8-hour standard for the period on which designations are based, we would designate the area as attainment without a deferred effective date.

Any control measures identified by a Compact area must be submitted to EPA for approval as a SIP revision.

In a proposed settlement with nine environmental groups, we agreed to designate areas for the 8-hour ozone standard by April 15, 2004. This deadline gives States and Tribes ample time to update their recommendations by April 15, 2003 for nonattainment area boundaries. The EPA lodged the proposed consent decree on November 13, 2002 with the U.S. District Court for the District of Columbia. Also on November 14, 2002, we issued a guidance memorandum outlining the new designations schedule, requirements for designating Tribal areas, and discussing the impact of the designation schedule on areas that are developing early action compacts. (Memorandum dated November 14, 2002, from Jeffrey R. Holmstead, Assistant Administrator, to EPA Regional Administrators.)

We have entered into early action compacts with a number of areas of the country. As a result, we will designate all areas of the country either attainment or nonattainment in April 2004 (including Compact areas). At that time, we plan to propose to defer the effective date of the nonattainment designation for participating Compact areas that are monitoring a violation of the 8-hour ozone standard, provided all terms of the agreement continue to be met, including timely completion of all Compact milestones.

However, as the Compacts were signed prior to the 2004 designations process, the Agency cannot prejudge the outcome of designations. Consequently, States are advised that if EPA determines that any portion of a compact area should become part of an 8-hour ozone nonattainment area, that portion would no longer be eligible for participation in the Early Action Compact, and the effective date of the nonattainment designation for that portion of the Compact would not be deferred. Also, as noted above, this proposed rulemaking does not propose to establish attainment/nonattainment designations, nor does it address the principles that will be considered in the designation process, nor does it take comment on the Early Action Compact program.

4. <u>Did EPA consider other options for incentives for areas</u> that take early actions for reducing ozone?

We did consider another option, which is discussed in a separate document available in the docket.81

5. What is the difference between the early action compact program and the transitional NSR program?

⁸¹Additional Options Considered for "Proposed Rule to Implement the 8-Hour Ozone National Ambient Air Quality Standard." U.S. Environmental Protection Agency, Office of Air Quality Planning and Standards, Research Triangle Park, NC. March 2003.

Appendix D of this proposed rulemaking contains a table comparing the two programs. It should be noted that areas that may be initially eligible for the Early Action Compact but that become ineligible later may still be eligible for the transitional NSR program.

B. Clarification of how the transition from 1-hour to 8-hour standard will work for early action compact areas, for conformity, and for NSR and PSD

Appendix E presents a table that describes our interpretation of the applicability of conformity and traditional NSR and PSD under the various potential transition scenarios. This table is included for informational purposes only and does not constitute part of the proposed rule. It is intended only to inform comment on the proposal itself. As discussed elsewhere in this preamble, we are proposing options for how areas will transition from the 1-hour standard to the 8-hour standard. Under one of the options, we would revoke the 1-hour standard 1 year after the effective date of the 8-hour designations. For Early Action Compact areas, the nonattainment designation for the 8-hour ozone standard is promulgated, but the effective date of that designation is deferred as long as the area continues to meet compact milestones. These milestones are described in the Holmstead memorandum referenced earlier. Shortly after December 2007

(i.e., by April 2008), we intend to make a determination of whether the area attained the 8-hour ozone standard. For all Compact areas, under the transition option described earlier in this paragraph, we would revoke the 1-hour standard for these areas 1 year after the effective date of the designation of attainment or nonattainment for the 8-hour standard. Therefore, on the 1-year effective date of the determination we make in April 2008, which will include the designation of Compact areas, the 1-hour standard would be revoked (in approximately May or June of 2009).

C. How will EPA's proposal affect funding under the Congestion Mitigation and Air Quality Improvement (CMAQ) Program?

Depending on the specific characteristics of a nonattainment area, revocation of the 1-hour ozone standard will have varying effects on some Federal transportation program funds apportioned to the States through a formula established by the TEA-21. The TEA-21 establishes eligibility for the CMAQ program transportation funds for nonattainment and maintenance areas, designated under section 107(d) of the CAA (42 U.S.C. 7407(d)), provided the area is, or was, classified in accordance with CAA sections 181, 186, and 188. Eligibility, in part, establishes an area's ability to use CMAQ funding. Areas designated

nonattainment after December 31, 1997 are also eligible, but without regard to classification.

The amount of CMAQ funds available to States for use in nonattainment and maintenance areas is set at levels authorized by TEA-21. The funds are apportioned to States through the statutory formula contained in section 104(b) of title 23. The formula is based on a State's weighted population, which takes into account the classifications of ozone and CO nonattainment and maintenance areas, and the population in such areas. The formula does not account for PM nonattainment areas.

As we revoke the 1-hour ozone standard under implementation of the new 8-hour ozone NAAQS, changes regarding the designation and classification of these nonattainment and maintenance areas, will change the amount of CMAQ funds apportioned to each State under the current apportionment formula, and thus available to these areas. Some States with 1-hour ozone nonattainment and maintenance areas will lose CMAQ funding while others may gain without a statutory change. How much will depend on how much a State's weighted population changes because of the revocation.

Furthermore, after revocation any 1-hour ozone nonattainment or maintenance area that is not also designated nonattainment under the 8-hour or the existing CO

or PM-10 standards will lose the ability to spend CMAQ funding. Since 1-hour ozone designations will no longer be in force, the authorized ability to use CMAQ funds under 23 USC 149(b) will be limited to existing CO and PM-10 nonattainment and maintenance areas and areas designated after December 31, 1997, such as those designated under the 8-hour standard.

Finally, nonattainment areas designated under the 8-hour ozone standard would all be eligible for CMAQ funding, but the formula for determining the amount of funds apportioned to the States would only take into account the areas that are classified pursuant to CAA sections 181, 186, and 188. Areas designated but not classified under the 8-hour standard would not be included in the apportionment formula, and States with such areas will not receive any CMAQ funding because of those areas. As noted elsewhere in this proposal, EPA is requesting comment on various concepts for classifying nonattainment areas under the 8-hour standard.

We are aware that apportionment of CMAQ funds is calculated yearly and varies according to changing population, and severity of air pollution. The TEA-21 is due for reauthorization in October, 2003, and adjustments to the CMAQ eligibility criteria and apportionment formula may be possible. We understand the importance of CMAQ funding

to States and nonattainment areas and are prepared to work with DOT and Congress to minimize the unintended impact of the 8-hour ozone NAAQS, on those funds.

D. Are there any environmental impact differences between the two major classification options being proposed?

Both of the major classification options being proposed would result in attainment by an expeditious attainment date. However, the EPA analysis of costs of the options notes that they do not necessarily have the same environmental impact. The subpart 2-only option is more expensive for some of the 10 areas analyzed in the cost analysis—largely because subpart 2 ROP requires more emissions reductions, and it requires these reductions by 2008, 2 years earlier than the attainment date of 2010 that is assumed for the analysis areas. This would result in an earlier air quality benefit. We have not performed air quality modeling to determine the increment of air quality benefit from the subpart 2-only option compared to the option under which some areas are covered under subpart 1.

IX. STATUTORY AND EXECUTIVE ORDER REVIEWS

Upon promulgation of the NAAQS, the CAA requires EPA to designate areas as attaining or not attaining that NAAQS.

The CAA then specifies requirements for areas based on whether such areas are attaining or not attaining the NAAQS.

This proposed rule fleshes out the statutory requirements

that areas not meeting the NAAQS are obligated to meet. In some instances, the statute is ambiguous regarding the statutory obligations that apply—thus we are proposing various options that it believes are consistent with the ambiguous language of the statute. One set of options attempts to provide the most flexible and least—cost option for States and the sources that States may choose to regulate. The other, follows a more traditional statutory interpretation.⁸²

A. <u>Executive Order 12866: Regulatory Planning and Review</u>

Under Executive Order 12866 (58 FR 51735, October 4, 1993), the Agency must determine whether the regulatory action is "significant" and, therefore, subject to Office of Management and Budget (OMB) review and the requirements of the Executive Order. The Order defines "significant regulatory action" as one that is likely to result in a rule that may:

(1) have an annual effect on the economy of \$100 million or more or adversely affect in a material way the economy, a sector of the economy, productivity, competition,

⁸²U.S. EPA, Cost, Emission Reduction, Energy, and Economic Impact Assessment of the Proposed Rule Establishing the Implementation Framework for the 8-Hour, 0.08ppm Ozone National Ambient Air Quality Standard, prepared by the Innovative Strategies and Economics Group, Office of Air Quality Planning and Standards, Research Triangle Park, N.C. April 24, 2003.

jobs, the environment, public health or safety, or State, local, or Tribal governments or communities;

- (2) create a serious inconsistency or otherwise interfere with an action taken or planned by another agency;
- (3) materially alter the budgetary impact of entitlements, grants, user fees, or loan programs or the rights and obligations of recipients thereof; or
- (4) raise novel legal or policy issues arising out of legal mandates, the President's priorities, or the principles set forth in the Executive Order."

Pursuant to the terms of Executive Order 12866, it has been determined that this rule is a "significant regulatory action" because it raises novel legal or policy issues arising out of legal mandates. As such, this action was submitted to OMB for review. Changes made in response to OMB suggestions or recommendations will be documented in the public record.

B. Paperwork Reduction Act

This action does not impose an information collection burden under the provisions of the Paperwork Reduction Act, 44 U.S.C. 3501 et seq.

C. <u>Regulatory Flexibility Act</u>

The Regulatory Flexibility Act generally requires an Agency to prepare a regulatory flexibility analysis of any rule subject to notice and comment rulemaking requirements

under the Administrative Procedures Act or any other statute unless the Agency certifies the rule will not have a significant economic impact on a substantial number of small entities. Small entities include small businesses, small organizations, and small governmental jurisdictions.

For purposes of assessing the impacts of today's proposed rule on small entities, small entity is defined as:

(1) a small business that is a small industrial entity as defined in the U.S. Small Business Administration (SBA) size standards. (See 13 CFR 121.); (2) a governmental jurisdiction that is a government of a city, county, town, school district or special district with a population of less than 50,000; and (3) a small organization that is any not-for-profit enterprise which is independently owned and operated and is not dominant in its field.

After considering the economic impacts of today's proposed rule on small entities, I certify that this action will not have a significant economic impact on a substantial number of small entities. This proposed rule will not impose any requirements on small entities. Rather, this rule interprets the obligations established in the CAA for States to submit implementation plans in order to attain the 8-hour ozone NAAQS.

D. Unfunded Mandates Reform Act

Title II of the Unfunded Mandates Reform Act of 1995 (UMRA), Public Law 104-4, establishes requirements for Federal agencies to assess the effects of their regulatory actions on State, local, and Tribal governments and the private sector. Under section 202 of the UMRA, EPA generally must prepare a written statement, including a cost-benefit analysis, for proposed and final rules with "Federal mandates" that may result in expenditures to State, local, and tribal governments, in the aggregate, or to the private sector, of \$100 million or more in any 1 year. Before promulgating an EPA rule for which a written statement is needed, section 205 of the UMRA generally requires EPA to identify and consider a reasonable number of regulatory alternatives and adopt the least costly, most cost-effective or least burdensome alternative that achieves the objectives of the rule. The provisions of section 205 do not apply when they are inconsistent with applicable law. Moreover, section 205 allows EPA to adopt an alternative other than the least costly, most cost-effective or least burdensome alternative if the Administrator publishes with the final rule an explanation why that alternative was not adopted. Before EPA establishes any regulatory requirements that may significantly or uniquely affect small governments, including Tribal governments, it must have developed under section 203 of the UMRA a small government agency plan.

plan must provide for notifying potentially affected small governments, enabling officials of affected small governments to have meaningful and timely input in the development of EPA regulatory proposals with significant Federal intergovernmental mandates, and informing, educating, and advising small governments on compliance with the regulatory requirements.

The EPA has determined that this rule does not contain a Federal mandate that may result in expenditures of \$100 million or more for State, local, and Tribal governments, in the aggregate, or the private sector in any 1 year. estimated administrative burden hour and costs associated with implementing the 8-hour, 0.08 ppm NAAQS were developed upon promulgation of the standard and presented in Chapter 10 of U.S. EPA 1997, Regulatory Impact Analyses for the Particulate Matter and Ozone National Ambient Air Quality Standards, Innovative Strategies and Economics Group, Office of Air Quality Planning and Standards, Research Triangle Park, N.C., July 16, 1997. The estimated costs presented there for States in 1990 dollars totaled \$0.9 million. corresponding estimate in 1997 dollars is \$1.1 million. Should the more traditional classification option be adopted as the implementation framework, these costs may increase modestly, but would not reach \$100 million. Thus, today's

rule is not subject to the requirements of section 202 and 205 of the UMRA.

The CAA imposes the obligation for States to submit SIPs to implement the 8-hour ozone NAAQS; in this rule, EPA is merely fleshing out those requirements. However, even if this rule did establish a requirement for States to submit SIPs, it is questionable whether a requirement to submit a SIP revision would constitute a Federal mandate in any case. The obligation for a State to submit a SIP that arises out of section 110 and part D of the CAA is not legally enforceable by a court of law, and at most is a condition for continued receipt of highway funds. Therefore, it is possible to view an action requiring such a submittal as not creating any enforceable duty within the meaning of section 421(5)(9a)(I) of UMRA (2 U.S.C. 658(a)(I)). Even if it did, the duty could be viewed as falling within the exception for a condition of Federal assistance under section 421(5)(a)(i)(I) of UMRA (2 U.S.C. 658(5)(a)(i)(I)).

In the proposal, EPA has determined that this proposed rule contains no regulatory requirements that may significantly or uniquely affect small governments, including Tribal governments. Nonetheless, EPA carried out consultations with governmental entities affected by this rule.

E. <u>Executive Order 131</u>32: Federalism

Executive Order 13132, entitled "Federalism" (64 FR 43255, August 10, 1999), requires EPA to develop an accountable process to ensure "meaningful and timely input by State and local officials in the development of regulatory policies that have federalism implications."

"Policies that have federalism implications" is defined in the Executive Order to include regulations that have
"substantial direct effects on the States, on the relationship between the national government and the States, or on the distribution of power and responsibilities among the various levels of government."

This proposed rule does not have federalism implications. It will not have substantial direct effects on the States, on the relationship between the national government and the States, or on the distribution of power and responsibilities among the various levels of government, as specified in Executive Order 13132. As described in section D, above (on UMRA), EPA previously determined the costs to States to implement the 8-hour ozone NAAQS to be approximately \$1 million. While this proposed rule considers options not addressed at the time the NAAQS were promulgated, the costs for implementation under these options would rise only marginally. This rule fleshes out the statutory obligations of States in implementing the 8-hour ozone NAAQS. Finally, the CAA establishes the scheme

whereby States take the lead in developing plans to meet the NAAQS. This proposed rule would not modify the relationship of the States and EPA for purposes of developing programs to implement the NAAQS. Thus, Executive Order 13132 does not apply to this proposed rule.

Although section 6 of Executive Order 13132 does not apply to this rule, EPA actively engaged the States in the development of this proposed rule. The EPA held regular calls with representatives of State and local air pollution control agencies. The EPA also held three public hearings at which it described the approaches it was considering and provided an opportunity for States and various other governmental officials to comment on the options being considered.

In the spirit of Executive Order 13132, and consistent with EPA policy to promote communications between EPA and State and local governments, EPA specifically solicits comment on this proposed rule from State and local officials F. Executive Order 13175: Consultation and Coordination

with Indian Tribal Governments

Executive Order 13175, entitled "Consultation and Coordination with Indian Tribal Governments" (65 FR 67249, November 9, 2000), requires EPA to develop an accountable process to ensure "meaningful and timely input by tribal officials in the development of regulatory policies that

have tribal implications." This proposed rule does not have "Tribal implications" as specified in Executive Order 13175.

This proposed rule concerns the implementation of the 8-hour ozone standard in areas designated nonattainment for that standard. The CAA provides for States and Tribes to develop plans to regulate emissions of air pollutants within their jurisdictions. The proposed regulations flesh out the statutory obligations of States and Tribes that develop plans to implement the 8-hour ozone NAAQS. The TAR gives Tribes the opportunity to develop and implement CAA programs such as the 8-hour ozone NAAQS, but it leaves to the discretion of the Tribe whether to develop these programs and which programs, or appropriate elements of a program, they will adopt.

This proposed rule does not have Tribal implications as defined by Executive Order 13175. It does not have a substantial direct effect on one or more Indian Tribes, since no Tribe has implemented a CAA program to attain the 8-hour ozone NAAQS at this time. Furthermore, this proposed rule does not affect the relationship or distribution of power and responsibilities between the Federal government and Indian Tribes. The CAA and the TAR establish the relationship of the Federal government and Tribes in developing plans to attain the NAAQS, and this proposed rule does nothing to modify that relationship. Because this

proposed rule does not have Tribal implications, Executive Order 13175 does not apply.

Assuming a Tribe is implementing such a plan at this time, while the proposed rule would have Tribal implications upon that Tribe, it would not impose substantial direct costs upon it, nor would it preempt Tribal law. As provided above, EPA has determined that the total costs for implementing the 8-hour ozone by State, local, and Tribal governments is approximately \$1 million in all areas designated nonattainment for the standard. The percentage of Tribal land that will be designated nonattainment for the 8-hour ozone standard is very small. For Tribes that choose to regulate sources in Indian country, the costs would be attributed to inspecting regulated facilities and enforcing adopted regulations.

Although Executive Order 13175 does not apply to this proposed rule, EPA consulted with Tribal officials in developing this proposed rule. The EPA has encouraged Tribal input at an early stage. The EPA supports a national "Tribal Designations and Implementation Work Group" which provides an open forum for all Tribes to voice concerns to EPA about the designation and implementation process for the 8-hour ozone standard. These discussions have given EPA valuable information about Tribal concerns regarding implementation of the 8-hour ozone NAAQS. The work group

sends issue summaries and suggestions for addressing them to the newly formed National Tribal Air Association, who in turn will send them to Tribal leaders. The EPA has encouraged Tribes to participate in the national public meetings held to take comment on early approaches to the proposed rule. Several Tribes made public comments at the April 2002 public meeting in Tempe, Arizona.

Furthermore, EPA will send individualized letters to all federally recognized Tribes about this proposal and will give Tribal leaders the opportunity for consultation. The EPA specifically solicits additional comment on this proposed rule from Tribal officials.

G. Executive Order 13045: Protection of Children from Environmental Health and Safety Risks

Executive Order 13045: "Protection of Children From Environmental Health and Safety Risks" (62 FR 19885, April 23, 1997) applies to any rule that (1) is determined to be "economically significant" as defined under Executive Order 12866, and (2) concerns an environmental health or safety risk that EPA has reason to believe may have disproportionate effect on children. If the regulatory action meets both criteria, the Agency must evaluate the environmental health or safety effects of the planned rule on children, and explain why the planned regulation is

preferable to other potentially effective and reasonably feasible alternatives considered by the Agency.

The proposed rule is not subject to Executive Order 13045 because the Agency does not have reason to believe the environmental health risks or safety risks addressed by this action present a disproportionate risk to children.

Nonetheless, we have evaluated the environmental health or safety effects of the 8-hour ozone NAAQS on children. The results of this evaluation are contained in 40 CFR part 50, National Ambient Air Quality Standards for Ozone, Final Rule (62 FR 38855-38896; specifically, 62 FR 38854, 62 FR 38860 and 62 FR 38865).

H. Executive Order 13211: Actions That Significantly Affect Energy Supply, Distribution, or Use

This proposed rule is not a "significant energy action" as defined in Executive Order 13211, "Actions That Significantly Affect Energy Supply, Distribution, or Use," (66 FR 28355, May 22, 2001) because it is not likely to have a significant adverse effect on the supply, distribution, or use of energy.

Information on the methodology and data regarding the assessment of potential energy impacts is found in Chapter 6 of U.S. EPA 2002, Cost, Emission Reduction, Energy, and Economic Impact Assessment of the Proposed Rule Establishing the Implementation Framework for the 8-Hour, 0.08 ppm Ozone

National Ambient Air Quality Standard, prepared by the Innovative Strategies and Economics Group, Office of Air Quality Planning and Standards, Research Triangle Park, N.C. April 24, 2003.

I. <u>National Technology Transfer Advancement Act</u>

Section 12(d) of the National Technology Transfer

Advancement Act of 1995 (NTTAA), Public Law No. 104-113,

section 12(d) (15 U.S.C. 272 note) directs EPA to use

voluntary consensus standards (VCS) in its regulatory

activities unless to do so would be inconsistent with

applicable law or otherwise impractical. Voluntary

consensus standards are technical standards (e.g., materials

specifications, test methods, sampling procedures, and

business practices) that are developed or adopted by VCS

bodies. The NTTAA directs EPA to provide Congress, through

OMB, explanations when the Agency decides not to use

available and applicable VCS.

This proposed rulemaking does not involve technical standards. Therefore, EPA is not considering the use of any VCS.

The EPA will encourage the States and Tribes to consider the use of such standards, where appropriate, in the development of the implementation plans.

J. Executive Order 12898: Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations

Executive Order 12898 requires that each Federal agency make achieving environmental justice part of its mission by identifying and addressing, as appropriate, disproportionate high and adverse human health or environmental effects of its programs, policies, and activities on minorities and low-income populations.

The EPA believes that this proposed rule should not raise any environmental justice issues. The health and environmental risks associated with ozone were considered in the establishment of the 8-hour, 0.08 ppm ozone NAAQS. The level is designed to be protective with an adequate margin

Proposed Rule to Implement the 8-Hour Ozone Standard Page 323 of 351 of safety. The proposed rule provides a framework for improving environmental quality and reducing health risks for areas that may be designated nonattainment.

LIST OF SUBJECTS in 40 CFR Part 51

Air pollution control, Intergovernmental relations, Ozone, Particulate matter, Transportation, Volatile organic compounds.

AUTHORITY

Dated:

Administrator.

42 U.S.C. 7408; 42 U.S.C. 7410; 42 U.S.C. 7501-7511f; 42 U.S.C. 7601(a)(1).

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X. APPENDICES

NOTE: The following appendices will not appear in the Code of Federal Regulations.

APPENDIX A COMPARISON OF SUBPART 1 & 2 REQUIREMENTS

This is only an outline of the general requirements of subparts 1 and 2 and should not be relied on for regulatory purposes.

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
Attainment Dates For all areas, attainment should occur as expeditiously as practicable, but no later than specified timeframe Up to 5 years after nonattainment designation; may extend up to 10 years based on specified considerations	Marginal	3 years from CAA Amendments enactment	
	Moderate	6 years from CAA Amendments enactment	
	Serious	9 years from CAA Amendments enactment	
		Severe-15	15 years from CAA Amendments enactment
		Severe-17	17 years from CAA Amendments enactment
		Extreme	20 years from CAA Amendments enactment

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
RFP	"annual incremental	Marginal	none
emissions reductions"	Moderate	15% VOC reduction from baseline within 6 years of enactment	
		Serious	moderate req't plus 9% VOC/NO _x reductions for years 7-9 after CAA Amendments enactment
		Severe-15	serious req't plus 9% VOC/NO _x for years 9-15 after CAA Amendments enactment
		Severe-17	serious req't plus 9% VOC/NO _x for years 9-17 after CAA Amendments enactment
	Extreme	severe req't plus 9% VOC/NO _x for years 9-20 after CAAA enactment	

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
Milestone Compliance Determination	Not required as such; contingency measures supposed	Marginal/moderate	no further requirement
	to be implemented upon failure to meet RFP	Serious & above	requires milestone compliance demonstration to be made following milestone; failing area must elect one of the following: 1. bump-up 2. implement contingency measures 3. economic incentive
Attainment	EPA sets date which	Marginal	none
submission	can be no later than 3 years after designation	Moderate	due 3 years after CAA Amendments enactment
		Serious	due 4 years from CAA Amendments enactment

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
		Severe	due 4 years from CAA Amendments enactment
		Extreme	due 4 years from CAA Amendments enactment

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
NSR and RACT major	100 TPY	Marginal	100 TPY
source applicability		Moderate	100 TPY
_		Serious	50 TPY
		Severe	25 TPY
		Extreme	10 TPY
NSR offsets	>1 to 1	Marginal	1.1 to 1
		Moderate	1.15 to 1
		Serious	1.2 to 1
		Severe	1.3 to 1
		Extreme	1.5 to 1
NSR permits	Permits required	All	construction permits for new or modified major stationary sources pre-1990 permit program corrections
Bump-up to higher classification	NA	All except severe & extreme	required to bump-up to higher classification if area doesn't meet attainment date

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
${ m NO_x}$ control for RACT	no specificity	Moderate & above; all areas in OTC	Requirements under this subpart for major stationary VOC sources (NSR & RACT) also apply to all major NO _x sources, unless EPA approves NO _x waiver
NO_{x} control for NSR	no specificity	Marginal & above	
Emission inventory	required in nonattainment area; no express requirement for updates or emission statements	All	Comprehensive emissions inventory within 2 years of enactment; update every 3 years (until area attains). Provision for submission to State of annual emissions statements from VOC and NO _x stationary sources
RACM/RACT general requirement for RACM including RACT		Marginal & above	Pre-1990 RACT fix- up
	Moderate & above	RACT for all CTG sources and all other major sources	

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
I/M	Nothing specified	Marginal	Pre-1990 corrections to previously required I&M programs immediately upon CAA Amendments enactment
		Moderate	Basic I&M
		Serious & above	Enhanced I&M within 2 years of CAA Amendments enactment
Conformity (transportation and general)	required	All	No additional specificity
Stage II vapor recovery (VOC)	not specified	Moderate & above	Stage II for gas stations within 2 years
Consequences of failure to attain	EPA to specify additional requirements; up to 10 more years to attain	Marginal, moderate and serious	Bump-up for failure to attain

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
		Severe and extreme	Fee system; continued ROP; possible stricter NSR major source cut-offs
Maintenance	Requirement for maintenance plans for areas redesignated from nonattainment to attainment	All	No additional specificity
Contingency measures	Required for failure to make RFP or attainment	All	Required for failure to meet ROP milestones or attain
Enhanced (ambient) monitoring (PAMS)	Not specified	Marginal and moderate	Not specified
		Serious & above	Ambient ozone precursor monitoring (VOC and NO_x)
VMT demonstration and transportation control measures (TCMs) if needed	Not specified	Marginal and moderate	Not specified

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
		Serious & above	Demonstration of whether current aggregate vehicle mileage, emissions, congestion levels are consistent with attainment demo
Clean fuels program	Not specified	Marginal and moderate	Not specified
		Serious & above	Certain percentage of fleet vehicles for 1998 and higher to be clean vehicles and use alternative fuels (if needed)

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
Reformulated Gas*	Not specified	Marginal, moderate & serious	Not specified
*required under section 211(k)(10)(D), which requires the use of reformulated gasoline in 9 covered areas, and areas that are bumped-up to Severe under section 181(d)		Severe & above	Prohibition of sale of gas that has not been reformulated to be less polluting
TCMs to offset growth in VMT	Not specified	Marginal, moderate & serious	Not specified
emissions		Severe & above	Enforceable transportation control strategies and TCMs to offset any emissions growth due to VMT growth

ELEMENT	SUBPART 1	SUBPART 2	
		Classification	Requirement
Clean Fuels for Boilers	Not specified	Marginal, moderate, serious & severe	Not specified
		Extreme areas	Use of clean fuels or advanced technology for certain boilers that emit more than 25 TPY of NO _x
TCMs during heavy traffic hours	Not specified	Marginal, moderate, serious & severe	Not specified
		Extreme areas	Option to have TCMs during periods of heavy traffic that reduce use of high polluting or heavyduty vehicles
New Technologies	Not specified	Marginal, moderate, serious & severe	Not specified
		Extreme areas	New or future technologies for emissions reductions

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APPENDIX B

"APPLICABLE REQUIREMENTS" UNDER SUBPART 2

ELEMENT	Classification	Requirement
RFP	Moderate	15% VOC reduction from baseline within 6 years of enactment
	Serious	moderate req't plus 9% VOC/NO _x reductions for years 7-9 after CAA Amendments enactment
	Severe-15	serious req't plus 9% VOC/NO _x for years 9-15 after CAA Amendments enactment
	Severe-17	serious req't plus 9% VOC/NO _x for years 9-17 after CAA Amendments enactment
	Extreme	severe req't plus 9% VOC/NO _x for years 9-20 after CAA Amendments enactment

ELEMENT	Classification	Requirement
Milestone Compliance Determination	Serious & above	requires milestone compliance demonstration to be made following milestone; failing area must elect one of the following: 1. bump-up 2. implement contingency measures 3. economic incentive
NSR and RACT major source	Marginal	100 TPY
applicability	Moderate	100 TPY
	Serious	50 TPY
	Severe	25 TPY
	Extreme	10 TPY
NSR offsets	Marginal	1.1 to 1
	Moderate	1.15 to 1
	Serious	1.2 to 1
	Severe	1.3 to 1
	Extreme	1.5 to 1

ELEMENT	Classification	Requirement
NSR permits	All	construction permits for new or modified major stationary sources pre-1990 permit program corrections
NO_{x} control for RACT	Moderate & above; all areas in OTC	Requirements under this subpart for major stationary VOC sources
NO_{x} control for NSR	Marginal & above	(NSR & RACT) also apply to all major NO _x sources, unless EPA approves NO _x waiver
RACM/RACT	Marginal & above	Pre-1990 RACT fix-up
	Moderate & above	RACT for all CTG sources and all other major sources
I/M	Marginal	Pre-1990 corrections to previously required I&M programs immediately upon CAA Amendments enactment
	Moderate	Basic I&M

ELEMENT	Classification	Requirement
	Serious & above	Enhanced I&M within 2 years of CAA Amendments enactment
Stage II vapor recovery (VOC)	Moderate & above	Stage II for gas stations within 2 years
Maintenance	All	No additional specificity
Enhanced (ambient) monitoring (PAMS)	Serious & above	Ambient ozone precursor monitoring (VOC and $\mathrm{NO_x}$)
VMT demonstration and transportation control measures (TCMs) if needed	Serious & above	Demonstration of whether current aggregate vehicle mileage, emissions, congestion levels are consistent with attainment demo
Clean fuels program	Serious & above	Certain percentage of fleet vehicles for 1998 and higher to be clean vehicles and use alternative fuels (if needed)
Reformulated Gas*	Severe & above	Prohibition of sale of gas that has not been reformulated to be less polluting

ELEMENT	Classification	Requirement
TCMs to offset growth in VMT emissions	Marginal, moderate & serious	Not specified
	Severe & above	Enforceable transportation control strategies and TCMs to offset any emissions growth due to VMT growth
Clean Fuels for Boilers	Extreme areas	Use of clean fuels or advanced technology for certain boilers that emit more than 25 TPY of NO _x
TCMs during heavy traffic hours	Extreme areas	Option to have TCMs during periods of heavy traffic that reduce use of high polluting or heavy-duty vehicles
New Technologies	Extreme areas	New or future technologies for emission reductions

^{*}required under section 211(k)(10)(D), which requires the use of reformulated gasoline in 9 covered areas, and areas that are bumped-up to Severe under section 181(d)

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APPENDIX C

COMPARISON OF TRANSITIONAL NSR AND EARLY ACTION COMPACT PROGRAMS

Program Elements	Transitional New Source Review (NSR)	8-hour Early Action Compact
Eligibility*	Meet 1-hr standardMust be 8-hr nonattainmentMust be covered under Subpart1**	Must have monitoring datameeting 1-hr standardMust be designated attainmentfor 1-hr standard
Initiation Date	Submit attainment demonstration by designations date (4/15/04)	Signed compact by 12/31/02
Other Dates	- All measures must be implemented by 12/31/05 - Projected attainment of 8-hr standard by April 2007	- Submit progress reports every 6 months beginning 6/03 - Describe planned measures by 6/16/03 - Submit local plan to State by 3/31/04 - Submit SIP to State by 12/31/04 - Implement all measures by 12/31/05 - Submit progress report to certify continued implementation & air quality improvements - Area must attain 8-hr standard by 12/31/07

Program Elements	Transitional New Source Review (NSR)	8-hour Early Action Compact
Benefits	- BACT instead of LAER (cite NSR workshop manual) - No required emission offsets	- Deferred effective date of nonattainment designation - Implies no NSR or conformity - Implementation of measures earlier than required by CAA (early reductions in emissions)
Consequences	If 2007 attainment date is missed, State must submit by April 2007 a Part D NSR plan, which meets requirements under sec. 51.165 (i.e., traditional nonattainment NSR)	- Nonattainment designation becomes effective soon after failure to meet milestone - Nonattainment requirements must be met (NSR, conformity, RACT, etc) if missed milestone

^{*}Areas not eligible for Early Action Compact may still be eligible for transitional NSR.

^{**}Areas in the Ozone Transport Region are not eligible for transitional NSR because they are not covered under Subpart 1 for purposes of NSR applicability.

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APPENDIX D

GLOSSARY OF TERMS AND ACRONYMS

ACT Alternative control techniques
BACT Best available control technology
bump-up Reclassify to higher classification

CAA Clean Air Act

CAAA 1990 Clean Air Act Amendments
CADC Clean Air Development Community

CASAC Clean Air Scientific Advisory Committee CERR Consolidated Emissions Reporting Rule

CFR Code of Federal Regulations

CO Carbon monoxide

Compacts Early Action Compact Agreements

CSA Clear Skies Act

CTGs Control techniques guidelines
DOT Department of Transportation
EPA Environmental Protection Agency
FACA Federal Advisory Committee Act
FIPs Federal implementation plans

FMVCP Federal Motor Vehicle Control Program

GAM Generalized additive models
HAPs Hazardous air pollutants
HEI Health Effects Institute

LAER Lowest achievable emission rate

MACT Maximum achievable control technology

MCR Mid-course review

MPO Metropolitan Planning Organization NAAQS National Ambient Air Quality Standards

NAMS National Air Monitoring Stations NCore National Core Monitoring Sites

NMMAPS National Morbidity, Mortality, and Air Pollution

Study

NO, Nitrogen oxides

NO., Reactive oxides of nitrogen

NO₂ Nitrogen dioxide

NSCR Non-selective catalytic reduction

NSR New source review

NTTAA National Technology Transfer Advancement Act of

1995

OH Hydroxyl

OMB Office of Management and Budget
OTAG Ozone Transport Assessment Group

OTC Ozone Transport Commission OTR Ozone Transport Region

Ozone Flex

Ozone Flex Guidelines Program

PAMS Photochemical Assessment Monitoring Stations

PM Particulate matter

 $PM_{2.5}$ Fine particle ppm Parts per million

Protocol Protocol for Early Action Compacts designed to

achieve and maintain the 8-hour ozone standard

PSD Prevention of significant deterioration RACM Reasonably available control measures RACT Reasonably available control technology

RFP Reasonable further progress

ROP Rate of progress

RPOs Regional Planning Organizations SBA Small Business Administration SIPs State implementation plans

SLAMS State and Local Air Monitoring Stations

TAR Tribal Authority Rule

TCEQ Texas Commission on Environmental Quality

TCMs Transportation control measures

TEA-21 Transportation Equity Act for the Twenty-first

Century

TIP Tribal implementation plan
TSP Total suspended particulates

UMRA Unfunded Mandates Reform Act of 1995

VCS Voluntary consensus standards

VMT Vehicle miles traveled VOC Volatile organic compound

VT Vehicle trips

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APPENDIX E

APPLICATION OF CONFORMITY, NEW SOURCE REVIEW AND PREVENTION OF SIGNIFICANT DETERIORATION UNDER VARIOUS TRANSITION CASES

If an area's 1-hr situation is:	And its 8- hr situation is:	How would conformity apply?	How would traditional ¹ NSR/PSD apply?
Designated Attainment (never been nonattain-	Designated Attainment	<u>Under 1 hr std:</u> Conformity does not apply.	Under 1 hr std: PSD continues to apply until the 1-hr standard is revoked.
ment)		<u>Under 8 hr std:</u> Conformity does not apply.	<pre>Under 8 hr std: PSD applies (Note: PSD applies as long as area is attainment for</pre>
			the 8-hr std.)

If an area's 1-hr situation is:	And its 8- hr situation is:	How would conformity apply?	How would traditional ¹ NSR/PSD apply?
	Designated Nonattain- ment	Under 1 hr std: Conformity does not apply. Under 8 hr std: Conformity applies 1 year after the effective date of designation (2005).	Under 1 hr std: PSD applies until the 1-hr standard is revoked (but nonattainment NSR requirements for 8-hr std. would tend to override). Under 8-hr std: (1) NSR under 40 CFR appendix S applies before SIP (containing \$51.165(a) NSR program) is approved by EPA. (2) Nonattainment NSR under \$51.165 applies after SIP approval

If an area's 1-hr situation is:	And its 8- hr situation is:	How would conformity apply?	How would traditional ¹ NSR/PSD apply?
	Early Action Compact (EAC)	Under 1 hr std: Conformity does not apply. Under 8 hr std: Assuming all milestones are met, conformity would not apply through 2007. If the area is violating in 2007, its nonattainment designation would become effective 4/15/2008, and conformity would apply 1 year later (4/15/2009). If area not violating in 2007, the area would be designated attainment, and no conformity would apply.	Under 1 hr std: PSD continues to apply to EAC areas until the 1-hr standard is revoked. Under 8 hr std: Assuming all milestones are met, PSD would apply through 2007. ² If the area is violating in 2007, it would become subject to nonattainment NSR. If area is not violating in 2007, the area would be designated attainment, and PSD continues to apply.
Designated Nonattain- ment	Designated Attainment	Under 1 hr std: Conformity applies until 1 year after the effective date of the area's designation under the 8-hr standard (2005). Under 8 hr std: Conformity does not apply.	Under 1 hr std: Nonattainment NSR applies until it is no longer an "applicable requirement" (see proposal on antibacksliding). Under 8 hr std: PSD applies.3

If an area's 1-hr situation is:	And its 8- hr situation is:	How would conformity apply?	How would traditional ¹ NSR/PSD apply?
	Designated Nonattain- ment	Under 1 hr std: Conformity applies until 1 year after the effective date of the area's designation under the 8-hr standard (2005). Under 8 hr std: Conformity would apply 1 year after the effective date of the area's designation (2005).	Under 1 hr std: Nonattainment NSR continues to apply until it is no longer an "applicable requirement" (see proposal on anti-backsliding). Under 8 hr std: (1) Nonattainment NSR under appendix S applies until the nonattainment NSR SIP (containing \$51.165(a) NSR program) is approved by EPA; (2) Nonattainment NSR applies under \$51.165 after SIP approval.
	(EAC: Not eligible)		

If an area's 1-hr situation is:	And its 8- hr situation is:	How would conformity apply?	How would traditional ¹ NSR/PSD apply?
Designated attainment with Maintenance Plan	Designated Attainment	Under 1 hr std: Conformity applies until 1 year after the effective date of the area's designation under the 8-hr standard (2005). Under 8 hr std: Conformity does not apply.	<pre>Under 1 hr std: PSD applies until 1-hr std. is revoked. Under 8 hr std: PSD applies.</pre>
	Designated Nonattain- ment	Under 1 hr std: Conformity applies until 1 year after the effective date of the area's designation under the 8-hr standard (2005). Under 8 hr std: Conformity would apply 1 year after the effective date of the area's designation under the 8-hr standard (2005).	Under 1 hr std: PSD applies until the 1-hr standard is revoked. Under 8-hr std: (1) NSR under 40 CFR appendix S applies before SIP (containing \$51.165(a) NSR program) is approved by EPA; (2) Nonattainment NSR under \$51.165 applies after SIP approval.

If an area's 1-hr situation is:	And its 8- hr situation is:	How would conformity apply?	How would traditional ¹ NSR/PSD apply?
	Early Action Compact	Under 1 hr std: 1-hour conformity applies until 1 year after the effective date of the area's designation under the 8-hr standard (4/15/2009, or earlier if the area misses an EAC milestone). Under 8 hr std: Assuming all milestones are met, conformity would not apply through 2007. If the area is violating in 2007, its nonattainment designation would become effective 4/15/2008 and conformity would apply 1 year later (4/15/2009). If area not violating in 2007, the area would be designated attainment, and no conformity would apply.	Under 1 hr std: PSD continues to apply until the 1-hr standard is revoked. Under 8 hr std: Assuming all milestones are met, PSD would apply through 2007. ² If the area is violating in 2007, it would become subject to nonattainment NSR. If area is not violating in 2007, the area would be designated attainment, and PSD continues to apply.

¹ Traditional NSR is nonattainment NSR under 40 CFR part 51, either §51.165 or appendix S.

 $^{^{2}}$ PSD applies even if the attainment designation under the 8-hr standard is not yet effective.

³ Generally, nonattainment NSR requirements would supersede most PSD requirements. However, note that in specific instances PSD may mandate additional analyses, such as preconstruction monitoring or analysis of impacts on Class I areas.