

**North Carolina Certification For  
Clean Air Act Section 110(a)(1) and (2)  
Infrastructure State Implementation Plan for the  
2010 1-Hour Nitrogen Dioxide  
National Ambient Air Quality Standards**

On January 22, 2010, the United States Environmental Protection Agency (USEPA) revised the National Ambient Air Quality Standards (NAAQS) for nitrogen dioxide (NO<sub>2</sub>). The USEPA made no changes to the existing annual standard of 53 parts per billion (ppb) that was originally promulgated in 1971. However, the USEPA also adopted a new 1-hour standard of 100 ppb, measured as a three-year average of the 98<sup>th</sup> percentile concentration. All of North Carolina is attaining the standard and is designated as unclassifiable/attainment.

When the USEPA revises an existing standard, or as in the case of the 1-hour NO<sub>2</sub> standard, promulgates a new standard, Clean Air Act (CAA) Sections 110(a)(1) and (a)(2) require each state to revise their State Implementation Plan (SIP) to show they have the authority and programs needed to implement, maintain, and enforce the standard. States must submit an infrastructure SIP within three years after a federal standard is adopted or revised.

This document serves as North Carolina's infrastructure SIP for the 2010 1-hour NO<sub>2</sub> NAAQS. Each of the basic or infrastructure requirements is listed below along with the corresponding North Carolina State rule or statute implementing each SIP element. The State rules can be found on the North Carolina Division of Air Quality (NCDAQ) website ([www.ncair.org](http://www.ncair.org)). The North Carolina General Statutes (NCGS) referenced in this document can be found on the North Carolina General Assembly website (<http://www.ncleg.net/gascripts/statutes/Statutes.asp>). These statutes are included as reference material, and should not be adopted as part of North Carolina's SIP.

## **Emission Limits and Other Control Measures [§ 110(a)(2)(A)]:**

Section 110(a)(2)(A) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall -

*“include enforceable emission limitations and other control measures, means, or techniques (including economic incentives such as fees, marketable permits, and auctions of emissions rights), as well as schedules and timetables for compliance, as may be necessary or appropriate to meet the applicable requirements of this [Act].”*

15A North Carolina Administrative Code (NCAC) 2D .0500, “Emission Control Standards”, serves to establish emission limits for NO<sub>2</sub>. The following rules address additional control measures, means and techniques:

- 15A NCAC 2D .0600 “Monitoring: Recordkeeping: Reporting”
- 15A NCAC 2D .1000 “Motor Vehicle Emission Control Standards”
- 15A NCAC 2D .1200 “Control of Emissions from Incinerators”
- 15A NCAC 2D .1400 “Nitrogen Oxides”
- 15A NCAC 2D .1600 “General Conformity”
- 15A NCAC 2D .2000 “Transportation Conformity”
- 15A NCAC 2D .2200 “Special Orders”
- 15A NCAC 2D .2300 “Banking Emission Reduction Credits”
- 15A NCAC 2D .2400 “Clean Air Interstate Rules”
- 15A NCAC 2D .2600 “Source Testing”

NCGS 143-215.107(a)(5), *Air quality standards and classifications*, provides the North Carolina Environmental Management Commission (EMC) with the statutory authority, “To develop and adopt emission control standards as in the judgment of the Commission may be necessary to prohibit, abate, or control air pollution commensurate with established air quality standards.”

**Ambient Air Quality Monitoring/Data System [§ 110(a)(2)(B)]:**

Section 110(a)(2)(B) of the CAA requires that North Carolina's SIP shall -

*“(B) provide for establishment and operation of appropriate devices, methods, systems, and procedures necessary to—*

*(i) monitor, compile, and analyze data on ambient air quality, and*

*(ii) upon request, make such data available to the Administrator.”*

The 2013 Annual Monitoring Network Plan for the NCDAQ (submitted to the USEPA on July 1, 2013) provides for an ambient air quality monitoring system in the State. As of the date of this infrastructure submittal, the development of the NO<sub>2</sub> monitoring network is ongoing; therefore, North Carolina's NO<sub>2</sub> monitoring strategy will be established per the requirements set forth in the 2013 and any subsequent Annual Monitoring Network plan relevant to the development of the State's NO<sub>2</sub> monitoring network.

NCGS 143-215.107(a)(2), *Air quality standards and classifications*, provides the EMC with the statutory authority “To determine by means of field sampling and other studies, including the examination of available data collected by any local, State or federal agency or any person, the degree of air contamination and air pollution in the State and the several areas of the State.”

## **Programs for Enforcement of Control Measures and for Construction or Modification of Stationary Sources [§ 110(a)(2)(C)]:**

Section 110(a)(2)(C) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall –

*“(C) include a program to provide for the enforcement of the measures described in subparagraph (A), and regulation of the modification and construction of any stationary source within the areas covered by the plan as necessary to assure that national ambient air quality standards are achieved, including a permit program as required in parts C and D.”*

This element consists of three sub-elements: enforcement, state-wide permitting of minor sources, and permitting of major sources and major modifications in areas designated attainment or unclassifiable for the subject NAAQS (also called the major source Prevention of Significant Determination - PSD program).

NCGS 143-215.61, *Enforcement Procedures*, provides the North Carolina Department of Environment and Natural Resources (DENR) with the statutory authority to enforce air quality rules.

NCGS 143-215.108, *Control of sources of air pollution; permits required*, provides the EMC with the statutory authority to permit sources of air pollution.

NCGS 143-215.107(a)(7), *Air quality standards and classifications*, provides the EMC with the statutory authority “To develop and adopt standards and plans necessary to implement programs for the prevention of significant deterioration and for the attainment of air quality standards in nonattainment areas.”

The following North Carolina air quality rules address permitting requirements:

- 15A NCAC 2D .0500 “*Emission Control Standards*”, 2D .0530 “*Prevention of Significant Deterioration*” applies to the construction of any new major stationary source or any project at an existing major stationary source in an area designated as attainment or unclassifiable.
- 15A NCAC 2D .0531 “*Sources in Nonattainment Areas*” applies to the construction of any new major stationary source or major modification at an existing major stationary source in an area designated as nonattainment.
- 15A NCAC 2Q .0300 “*Construction and Operation Permits*”, requires stationary sources, prior to construction or operation, to have an air permit if the source is above an emission threshold or operates air pollutant control devices.
- 15A NCAC 2Q .0500 “*Title V Procedures*”, establishes an air quality permitting program as required under Title V and 40 CFR Part 70.

North Carolina has submitted three of four PSD requirements to USEPA for approval. Additionally, the NCDAQ plans to submit a SIP revision related to adoption of PSD

requirements established in the 2008 NSR PM<sub>2.5</sub> Rule and the 2010 PM<sub>2.5</sub> Increments-SILs and SMC Rule to comply with 2006 PM<sub>2.5</sub> infrastructure requirements for element C, (D)(i) and (J). These requirements will also satisfy the same elements for the 2010 NO<sub>2</sub> infrastructure SIP. The SIP revision has been approved by the EMC and the Rules Review Committee effective September 1, 2013, and is on track to be submitted by the NCDAQ to the USEPA on or before the prescribed deadline of October 16, 2013.

Part D programs are required for areas that are designated nonattainment for a NAAQS. Since there are no NO<sub>2</sub> nonattainment areas in North Carolina, a Part D permit program is not required.

The USEPA has stated that “structural PSD program provisions need to include provisions necessary for the PSD program to address all regulated sources and New Source Review (NSR) pollutants, including greenhouse gases (GHG).” On October 18, 2011, the USEPA published revisions to North Carolina’s PSD program to incorporate provisions related to GHGs (76 FR 64240).

## **Interstate Pollution Transport Provisions [§ 110(a)(2)(D)(i)]:**

Section 110(a)(2)(D)(i) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall-

*“(D) contain adequate provisions –*

*(i) prohibiting, consistent with the provisions of this subchapter, any source or other type of emissions activity within the State from emitting any air pollutant in amounts which will -*

*(I) contribute significantly to nonattainment in, or interfere with maintenance by, any other State with respect to any such national primary or secondary ambient air quality standard, or*

*(II) interfere with measures required to be included in the applicable implementation plan for any other State under part C of this subchapter to prevent significant deterioration of air quality or to protect visibility.”*

### Subsection 2(D)(i)(I)

Section 110(a)(2)(D)(i)(I) is also known as the good neighbor provision of the CAA in that upwind states are responsible for the effects of their pollution on downwind states. Under this section of the Act, states are responsible for reducing their “significant contribution” to those downwind nonattainment or maintenance areas. The August 21, 2012 decision by The U.S. Court of Appeals for the District of Columbia Circuit to vacate the 2011 Cross-State Air Pollution Rule (CSAPR) (EME Homer City Generation, L.P. b. USEPA, No. 11-1302) clarified that only the USEPA can determine “significant contribution” and that “a SIP cannot be deemed to lack a required submission or be deemed deficient for failing to implement the good neighbor obligation until after USEPA has defined the state's good neighbor obligation.” Once the USEPA determines North Carolina's significant contribution to nonattainment or maintenance areas in downwind states, then the USEPA may require North Carolina to submit a SIP revision under Section 110(k)(5) or submit a new SIP under Section 110(a)(1) of the CAA.

In addition, the November 19, 2012 USEPA memo from Gina McCarthy, Assistant Administrator, cited the court decision that “a SIP cannot be deemed deficient for failing to meet the good neighbor obligation before EPA quantifies the obligation.”

As of the submission of this document, the USEPA has yet to determine North Carolina's significant contribution of NO<sub>2</sub>, in regards to the 2010 NO<sub>2</sub> NAAQS, to any downwind state. It is also important to note that there are currently no areas designated as nonattainment or maintenance under the 2010 NO<sub>2</sub> NAAQS. Therefore, no revision to North Carolina's SIP is necessary at the time to incorporate this element of Section 110(a) of the CAA.

### Subsection 2(D)(i)(II)

Section 110(a)(2)(D)(i)(II) requires SIPs to include provisions prohibiting any source or other type of emissions activity in one state from interfering with measures required of any other state to prevent significant deterioration of air quality, or from interfering with measures required of any other state to protect visibility.

The following North Carolina air quality rules address the requirements under this subsection: There are no nonattainment areas subject to Nonattainment New Source Review for the 2010 NO<sub>2</sub> NAAQS.

- 15A NCAC 2D .0530 “*Prevention of Significant Deterioration*” applies to the construction of any new major stationary source or any project at an existing major stationary source in an area designated as attainment or unclassifiable.
- “*Regional Haze SIP for North Carolina Class I areas*”, December 17, 2007

North Carolina has developed and implemented a Regional Haze SIP to protect visibility in five Class I areas: Great Smoky Mountains National Park, Joyce Kilmer- Slickrock Wilderness Area, Linville Gorge Wilderness Area, Shining Rock Wilderness Area, and Swanquarter National Wildlife Refuge. North Carolina’s Regional Haze SIP also addresses visibility impacts to downwind states. On June 27, 2012, the USEPA finalized a limited approval of North Carolina’s Regional Haze SIP, as meeting some of the applicable regional haze requirements set forth in Sections 169A and 169b of the Clean Air Act and in 40 CFR 51.300-308. The limited approval was due to the disapproval of certain portions of the SIP which relied on the Clean Air Interstate Rule (CAIR). The CAIR remains in effect due to the August 21, 2012 decision by the U.S. Court of Appeals to vacate CAIR’s replacement, the Cross State Air Pollution Rule (CSAPR). North Carolina plans to address the remaining deficiency in the Regional Haze SIP arising from the CSAPR decision. NCGS 143-215.107(a)(7) provides the authority “To develop and adopt standards and plans necessary to implement programs for the prevention of significant deterioration and for the attainment of air quality standards in nonattainment areas.”

**Interstate Pollution Abatement and International Air Pollution [§ 110(a)(2)(D)(ii)]:**

Section 110(a)(2)(D)(ii) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall -

*“contain adequate provisions -*

*(ii) insuring compliance with the applicable requirements of sections 126 and 115 of this title (relating to interstate and international pollution abatement).”*

The following rules address the requirements of Section 126(a) which directs each SIP to include provisions requiring a new or modified source to notify neighboring states of potential impacts from the source:

- 15A NCAC 2D .0530 *“Prevention of Significant Deterioration”*
- 15A NCAC 2D .0531 *“Sources in Nonattainment Areas”*

North Carolina has submitted three of four PSD requirements to USEPA for approval. Additionally, the NCDAQ plans to submit a SIP revision related to adoption of PSD requirements established in the 2008 NSR PM<sub>2.5</sub> Rule and the 2010 PM<sub>2.5</sub> Increments-SILs and SMC Rule to comply with 2006 PM<sub>2.5</sub> infrastructure requirements for element C, (D)(i) and (J). These requirements will also satisfy the same elements for the 2010 NO<sub>2</sub> infrastructure SIP. The SIP revision has been approved by the EMC and the Rules Review committee effective September 1, 2013, and is on track to be submitted by the NCDAQ to the USEPA on or before the prescribed deadline of October 16, 2013.

Unless a state is the subject of a Section 126(b) or 126(c) petition with respect to NO<sub>2</sub>, the state has no continuing obligation under these sections. North Carolina is not the subject of a Section 126(b) or 126(c) petition. Since there are no pending USEPA actions pursuant to Section 115 of the CAA, there is no expectation that North Carolina would need to submit anything in regards to Section 115 at this time.

## **Adequate Resources and Authority, Conflict of Interest, and Oversight of Local Governments [§ 110(a)(2)(E)]:**

Section 110(a)(2)(E) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall -

*“provide*

- i. necessary assurances that the State (or, except where the Administrator deems inappropriate, the general purpose local government or governments, or a regional agency designated by the State or general purpose local governments for such purpose) will have adequate personnel, funding, and authority under State (and, as appropriate, local) law to carry out such implementation plan (and is not prohibited by any provision of Federal or State law from carrying out such implementation plan or portion thereof).*
- ii. requirements that the State comply with the requirements respecting State boards under section 128, and*
- iii. necessary assurances that, where the State has relied on a local or regional government, agency, or instrumentality for the implementation of any plan provision, the State has responsibility for ensuring adequate implementation of such plan provision.”*

15A NCAC 2Q .0200 “*Permit Fees*”, provides the mechanism by which stationary sources that emit air pollutants pay a fee based on the quantity of emissions emitted. The statutory authority to allow rulemaking and requiring permit fees can be found in NCGS 143-215.3 *General powers of Commission and Department; auxiliary powers*. Additionally, NCGS 143-215.107(a)(1) *Air quality standards and classifications*, provides the EMC with the statutory authority “To prepare and develop, after proper study, a comprehensive plan or plans for the prevention, abatement and control of air pollution in the State or in any designated area of the State.” In general, the elements of 110(a)(2)(E)(i) are met when the USEPA performs a completeness determination for each SIP submittal. Each submittal provides for adequate personnel, funding, and legal authority under State law to carry out the SIPs and related issues. This information is contained in all final SIP submittal packages in the historical record of the rule.

Section 110(a)(2)(E)(ii) of the CAA, as listed above, requires that the state comply with the requirements of Section 128 “State Boards”. Section 128(a)(1) requires any board or body which approves permits or enforcement orders shall have at least a majority of members who represent the public interest and do not derive any significant portion of their income from persons subject to permits or enforcement orders. Section 128(a)(2) requires any potential conflicts of interest by members of such boards or body or the head of an executive agency with similar powers be adequately disclosed. The North Carolina Department of Environment and Natural Resources (DENR) has submitted Section 128 certification procedures to the USEPA to comply with the 1997 8-hour ozone infrastructure SIP requirements. The pending USEPA approval of this SIP revision will satisfy Section 110(a)(2)(E)(ii) requirements for the 2010 1-hour NO<sub>2</sub> Infrastructure SIP.

North Carolina addresses Section 110(a)(2)(E)(iii) of the CAA as listed above by requiring the state provide the necessary assurances that where the state relied on a local or regional government for the implementation of any plan provision, the state has the responsibility for ensuring adequate implementation of such plan provisions. North Carolina has three local programs that implement the air program. These agencies are located in Buncombe, Forsyth, and Mecklenburg Counties. NCGS 143-215.112 *Local air pollution control programs*, provides the EMC with the statutory authority “to review and have general oversight and supervision over all local air pollution control programs.” In order for submittals made by the local air program deemed complete, all local and regional implementation plans must be submitted through DENR to the USEPA.

## Stationary Source Monitoring and Reporting [§ 110(a)(2)(F)]

Section 110(a)(2)(F) of the CAA dictates that North Carolina’s SIP for the 2010 NO<sub>2</sub> NAAQS shall -

*“require, as may be prescribed by the Administrator—*

- (i) the installation, maintenance, and replacement of equipment, and the implementation of other necessary steps, by owners or operators of stationary sources to monitor emissions from such sources,*
- (ii) periodic reports on the nature and amounts of emissions and emissions-related data from such sources, and*
- (iii) correlation of such reports by the State agency with any emission limitations or standards established pursuant to this chapter, which reports shall be available at reasonable times for public inspection.”*

The following North Carolina rules require monitoring of emissions from stationary sources:

- 15A NCAC 2D .0604 *“Exceptions to Monitoring and Reporting Requirements”*
- 15A NCAC 2D .0605 *“General Recordkeeping and Reporting Requirements”*
- 15A NCAC 2D .0611 *“Monitoring Emissions from Other Sources”*
- 15A NCAC 2D .0612 *“Alternative Monitoring and Reporting Procedures”*
- 15A NCAC 2D .0613 *“Quality Assurance Program”*
- 15A NCAC 2D .0614 *“Compliance Assurance Monitoring”*
- 15A NCAC 2Q .0207 *“Annual Emissions Reporting”*

The Annual Emissions Reporting Rule requires stationary sources to submit periodic emissions reports to the State. These requirements meet the emissions reporting requirements of 40 CFR Part 51, including the Air Emissions Reporting Requirements (AERR). NCGS 143-215.107(a)(4) *Air quality standards and classifications*, provides the EMC with the statutory authority “To collect information or to require reporting from classes of sources which, in the judgment of the [EMC], may cause or contribute to air pollution.”

## **Emergency Episodes [§ 110(a)(2)(G)]:**

Section 110(a)(2)(G) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall –

*“provide for authority comparable to that in section 303 of this title and adequate contingency plans to implement such authority.”*

Section 303 provides legal authority to the USEPA to stop the emission of air pollutants that present an imminent and substantial endangerment to public health or welfare or the environment. The USEPA is authorized to either bring a lawsuit in federal court or, if such civil action cannot assure prompt protection of public health or welfare, to issue such orders as may be necessary to protect public health or welfare or the environment. The requirement for states to provide adequate contingency plans (40 CFR 51.150 through 51.153) to implement such authority is intended to establish emergency episode plans for responding to elevated pollutant levels in urban areas. Emergency episode plans are required in areas that record ambient pollutant concentrations in excess of threshold levels specified in 40 CFR Part 51.150.

Section 110(a)(2)(G) of the CAA requires that SIPs must provide for the authority comparable to that in Section 303 and must include adequate contingency plans to implement such authority. Pursuant to these provisions, the USEPA promulgated 40 CFR 51.16 (36 FR 24002), which established “significant harm levels” for five criteria pollutants – sulfur dioxide, inhalable particulate matter (PM<sub>10</sub>), 2010 NO<sub>2</sub>, CO, and ozone. Part 51.16 was restructured as Subpart H and Appendix L of Part 51 (51 FR 40668). The requirement to submit an emergency plan for the five criteria pollutants is based on a priority classification scheme under 40 CFR Part 51 Subpart H.

The threshold concentration for a Priority I NO<sub>2</sub> area is 60 parts per billion (ppb), based on the annual average concentration. Areas with annual average concentrations below 60 ppb are classified as Priority III areas. Under 40 CFR 51.152, Priority III areas do not need to develop an emergency episode plan. States that do not meet this threshold would be classified as Priority III and would not be required to develop an emergency episode plan for NO<sub>2</sub>.

15A NCAC 2D .0300 “*Air Pollution Emergencies*” provides the means to implement emergency air pollution episode measures and is authorized under NCGS 143-215.3(a)(1) and NCGS 143.215.3(a)(12). There are no monitoring stations in North Carolina reporting a value of greater than 60 ppb. Based on this criterion, North Carolina would be classified as a Priority III area and therefore is not required to adopt an Emergency Episode Plan for NO<sub>2</sub>.

**Future SIP Revisions [§ 110(a)(2)(H)]:**

Section 110(a)(2)(H) of the CAA requires that North Carolina’s SIP for the 2010 NO<sub>2</sub> NAAQS shall –

*“provide for revision of such plan—*

- (i) from time to time as may be necessary to take account of revisions of such national primary or secondary ambient air quality standard or the availability of improved or more expeditious methods of attaining such standard, and*
- (ii) except as provided in paragraph (3)(C), whenever the Administrator finds on the basis of information available to the Administrator that the plan is substantially inadequate to attain the national ambient air quality standard which it implements or to otherwise comply with any additional requirements established under this chapter.”*

NCGS 143-215.107(a)(1) and (a)(10) provide the authority “To prepare and develop, after proper study, a comprehensive plan or plans for the prevention, abatement and control of air pollution in the State or in any designated area of the State” and “To develop and adopt standards and plans necessary to implement requirements of the federal Clean Air Act and implementing regulations adopted by the United States Environmental Protection Agency”, respectively. In addition, 15A NCAC 2D .2401(d) states that “The EMC may specify through rulemaking a specific emission limit lower than that established under this rule for a specific source if compliance with the lower emission limit is required to attain or maintain the ambient air quality standard for ozone or PM<sub>2.5</sub> or any other ambient air quality standard in Section 15A NCAC 2D .0400.”

**Plan Revisions for Nonattainment Areas [§ 110(a)(2)(I)]:**

Section 110(a)(2)(I) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall -

*“in the case of a plan or plan revision for an area designated as a nonattainment area, meet the applicable requirements of part D of this subchapter (relating to nonattainment areas).”*

This requirement only applies when an area is designated as nonattainment with the NO<sub>2</sub> NAAQS and is only addressed when an attainment demonstration is required, as required by a separate provision and schedule as defined by the CAA. Therefore, no submission for this element is necessary.

## Consultation and Public Notification [§ 110(a)(2)(J)]:

Section 110(a)(2)(J) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall –

*“meet the applicable requirements of section 121 of this title (relating to consultation), section 127 of this title (relating to public notification), and part C of this subchapter (relating to prevention of significant deterioration of air quality and visibility protection).”*

This element contains four separable sub-elements: consultation with identified officials on certain air agency actions, public notification, prevention of significant deterioration, and visibility protection.

Consultation with identified officials on certain actions: Section 121 requires that states provide a satisfactory process of consultation with general purpose local governments, designated organizations of elected officials of local governments, and any affected federal land manager (FLM) in carrying out CAA requirements. North Carolina's authority to satisfy these requirements is found in:

- 15A NCAC 2D .2000 *“Transportation Conformity”*
- 15A NCAC 2D .1600 *“General Conformity”*
- 15A NCAC 2D .0531 *“Sources in Nonattainment Areas”* address consultation requirements with the FLMs when permitting stationary sources.
- *“Regional Haze SIP for North Carolina Class I areas”*, December 17, 2007

Public Notification: Section 127 requires states to provide measures which will be effective to notify the public on a regular basis of instances or areas in which any air quality standard is exceeded during the preceding calendar year, to advise the public of the health hazards associated with such pollution, and to enhance public awareness of measures that can be taken to prevent such standards from being exceeded. North Carolina's authority to satisfy these requirements is found in:

- 15A NCAC 2D .0300 *“Air Pollution Emergencies”*

Additionally, NCDAQ has an extensive outreach program to educate the public and promote voluntary emission reduction measures through the North Carolina Air Awareness Program. North Carolina also participates in the USEPA AirNOW program, which enhances public awareness of air quality in North Carolina and throughout the United States. The NCDAQ Ambient Monitoring web page provides information regarding current and historical air quality across the state.

Prevention of Significant Determination: The requirements for Element J are the same as those described earlier with respect to Element C. North Carolina's authority resides in the following rules:

- 15A NCAC 2D .0530 "*Prevention of Significant Deterioration*"
- 15A NCAC 2D .0531 "*Sources in Nonattainment Areas*"
- 15A NCAC 2Q .0300 "*Construction and Operation permits*"
- 15A NCAC 2Q 0.500 "*Title V Procedures*"

North Carolina has submitted three of four PSD requirements to USEPA for approval. Additionally, the NCDAQ plans to submit a SIP revision related to adoption of PSD requirements established in the 2008 NSR PM<sub>2.5</sub> Rule and the 2010 PM<sub>2.5</sub> Increments-SILs and SMC Rule to comply with 2006 PM<sub>2.5</sub> infrastructure requirements for element C, (D)(i) and (J). These requirements will also satisfy the same elements for the 2010 NO<sub>2</sub> infrastructure SIP. The SIP revision has been approved by the EMC and the Rules Review committee effective September 1, 2013, and is on track to be submitted by the NCDAQ to the USEPA on or before the prescribed deadline of October 16, 2013.

Visibility Protection: These requirements are addressed through –

- 15A NCAC 2D .0530 "*Prevention of Significant Deterioration*"
- "*Regional Haze SIP for North Carolina Class I areas*", December 17, 2007

On June 27, 2012, the USEPA finalized a limited approval of a revision to the North Carolina's Regional Haze SIP, as meeting some of the applicable regional haze requirements set forth in Sections 169A and 169b of the Clean Air Act and in 40 CFR 51.300-308. North Carolina plans to address the remaining deficiency in the Regional Haze SIP arising from the August 21, 2012 decision by the U.S. Court of Appeals to vacate the 2011 Cross-State Air Pollution Rule. NCGS 143-215.107(a)(7) provides the authority "To develop and adopt standards and plans necessary to implement programs for the prevention of significant deterioration and for the attainment of air quality standards in nonattainment areas."

There are no other applicable visibility protection obligations under Section 110(a)(2)(J) as a result of the 2010 NO<sub>2</sub> NAAQS.

## **Air Quality Modeling and Reporting [§ 110(a)(2)(K)]:**

Section 110(a)(2)(K) of the CAA requires that North Carolina's SIP for the 2010 NO<sub>2</sub> NAAQS shall -

*“provide for-*

- (i) the performance of such air quality modeling as the Administrator may prescribe for the purpose of predicting the effect on ambient air quality of any emissions of any air pollutant for which the Administrator has established a national ambient air quality standard, and*
- (ii) the submission, upon request, of data related to such air quality modeling to the Administrator.”*

All current attainment demonstrations submitted to the USEPA provide air quality modeling for the purpose of predicting the effect of emission sources on the ambient air quality. This modeling work complies with the USEPA's final guidance on the use of models in attainment demonstrations, and uses latest methods and techniques to document modeling information and computer model performance evaluations. Emissions data collected through 15A NCAC 2D .0600 *“Monitoring: Recordkeeping: Reporting”* (authorized under NCGS 143-215.107(a)(4)) provide the necessary information to model potential impact of major and some minor sources. The NCDAQ works closely with the southeast region and other areas to conduct air quality modeling to ensure compatibility with federal guidelines. The NCDAQ currently has personnel with training and experience to conduct source-oriented dispersion modeling with models approved by the USEPA.

### **Permitting Fees [§ 110(a)(2)(L)]:**

Section 110(a)(2)(L) of the CAA requires that North Carolina’s SIP for the 2010 NO<sub>2</sub> NAAQS shall –

*“require the owner or operator of each major stationary source to pay to the permitting authority, as a condition of any permit required under this chapter, a fee sufficient to cover—*

- (i) the reasonable costs of reviewing and acting upon any application for such a permit, and*
- (ii) if the owner or operator receives a permit for such source, the reasonable costs of implementing and enforcing the terms and conditions of any such permit (not including any court costs or other costs associated with any enforcement action), until such fee requirement is superseded with respect to such sources by the Administrator’s approval of a fee program under subchapter V of this chapter.”*

North Carolina’s authority to satisfy these requirements is found in:

- 15A NCAC 2Q .0200 *“Permit Fees”*

This rule provides the mechanism by which stationary sources that emit air pollutants pay a fee based on the type of permit and the quantity of emissions emitted. These fees cover the costs of reviewing, approving, implementing and enforcing a permit. The statutory authority to allow permit fees can be found in NCGS 143-215.3 *General powers of Commission and Department; auxiliary powers.*

### **Consultation and Participation by Affected Local Entities [§ 110(a)(2)(M)]:**

Section 110(a)(2)(M) of the CAA requires that North Carolina’s SIP for the 2010 NO<sub>2</sub> NAAQS shall –

*“provide for consultation and participation by local political subdivisions affected by the plan.”*

North Carolina’s authority related to this element is found in:

- 15A NCAC 2D .0530 *“Prevention of Significant Deterioration”* requires that the Department notify the public of the application, preliminary determination, degree of incremental consumption, and the opportunity for comment prior to making a final permitting decision.
- 15A NCAC 2D .2000 *“Transportation Conformity”* requires a consultation with all affected partners to be implemented for transportation conformity determinations.

All State rules go through the public review process as defined in the North Carolina Administrative Procedures Act (NCGS 150B-21.1 and 150B-21.2). All Attainment Demonstrations, Redesignation Demonstrations, and Maintenance Plans go through a public notification process prior to submittal to the USEPA for inclusion in the SIP. Additionally, the Regional Haze State Implementation Plan went through an extensive consultation process between appropriate state, local, and tribal air pollution control agencies as well as the corresponding FLMs. Finally, the NCDAQ organizes stakeholder meetings to support SIP development and rule-making efforts.