

The Texas Commission on Environmental Quality (TCEQ or commission) adopts new §§116.1500, 116.1510, 116.1520, 116.1530, and 116.1540. Sections 116.1500, 116.1510, and 116.1530 are adopted *with changes* to the proposed text as published in the August 25, 2006, issue of the *Texas Register* (31 TexReg 6616). Sections 116.1520 and 116.1540 are adopted *without changes* and will not be republished.

The adopted new sections will be submitted to the United States Environmental Protection Agency (EPA) as revisions to the state implementation plan (SIP).

#### BACKGROUND AND SUMMARY OF THE FACTUAL BASIS FOR THE ADOPTED RULES

The Federal Clean Air Act (FCAA), §169A, Visibility Protection for Federal Class I Areas, and §169B, Visibility (42 United States Code (USC), §7491 and §7492), require the EPA to adopt regulations to address visibility impairment at federal Class I areas due to regional haze. Class I areas are federally designated parks and scenic areas of national importance. There are 156 Class I areas in the United States, including national and international parks and wilderness areas. Regional haze is caused by the emission of air pollutants from numerous sources located over a wide geographic area. The EPA promulgated regulations to address these statutory requirements in 40 Code of Federal Regulations (CFR) Part 51, Subpart P, Protection of Visibility, on July 1, 1999 (64 FR 35763), and promulgated amendments to Subpart P and a new Appendix Y, Guidelines for BART Determinations Under the Regional Haze Rule, to Part 51 on July 6, 2005 (70 FR 39156). The FCAA and implementing regulations require states to submit SIPs to address visibility impairment caused by regional haze and include guidelines for determining best available retrofit technology (BART). As

part of the SIP, states must identify BART-eligible sources. BART-eligible sources belong to one of 26 named source categories, have the potential to emit 250 tons per year (tpy) or more of a visibility-impairing pollutant (nitrogen oxides (NO<sub>x</sub>), sulfur dioxide (SO<sub>2</sub>), and particulate matter (PM)), and were built or reconstructed between August 7, 1962, and August 7, 1977. These sources must be evaluated to determine whether they contribute to visibility impairment at any Class I area. BART-eligible sources that contribute to visibility impairment at any Class I area are subject to BART and owners or operators must conduct a technology evaluation to determine the appropriate level of BART controls. BART is to be determined on a case-by-case basis for each source based on the technology available, the costs of compliance, the energy and non-air quality environmental impacts of controls, any existing pollution control technology used by the source, the remaining useful life of the source, and the degree of visibility improvement that would result from the use of the technology.

The adopted rules revise Chapter 116 to ensure that owners or operators of sources that are subject to BART requirements perform a BART engineering evaluation to determine the appropriate level of BART and subsequently implement any required BART controls. The adopted rules also provide mechanisms for BART-eligible sources to demonstrate that they do not significantly impact visibility in Class I areas and are therefore not subject to BART control requirements.

The TCEQ is required to submit a Regional Haze SIP to the EPA no later than December 17, 2007. In order to develop this SIP in a timely manner, the TCEQ must receive the BART engineering analyses (or BART exemption modeling) from each BART-eligible source no later than April 30, 2007. A corresponding deadline is adopted in the rules.

## SECTION BY SECTION DISCUSSION

### *§116.1500. Definitions.*

The commission adopts new §116.1500, which contains definitions relevant to the rules. The terms defined include BART-eligible source and visibility-impairing air pollutant. The definition of BART-eligible source is similar to the functional definition of this term under 40 CFR §51.301, Definitions, except that the definition refers only to visibility-impairing pollutants, instead of all pollutants. The definition of BART-eligible source has been revised in response to comments, to more clearly indicate that the BART-eligible source is based on an aggregation of emission units, and does not necessarily include all equipment at the plant site. The term “visibility-impairing air pollutant” is also defined and includes NO<sub>x</sub>, SO<sub>2</sub>, and PM, which are the principal species emitted from Texas sources that influence visibility. Note that particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers (PM<sub>10</sub>) may be used as the indicator for PM when assessing BART eligibility. The commission has not included volatile organic compounds (VOCs) or ammonia as visibility-impairing air pollutants. The commission’s research has determined that VOCs are not a significant contributor to visibility impairment at Class I areas that are impacted by Texas facilities. In addition, the commission has not included ammonia because existing background levels in Texas would make visibility improvements from ammonia source reductions only marginally effective. For terms not defined in this section, the definitions contained in 40 CFR §51.301 apply. The effective date of the 40 CFR §51.301 incorporation has been revised to August 30, 1999, in response to a comment.

*§116.1510. Applicability and Exemption Requirements.*

The commission adopts new §116.1510 to specify which facilities will be subject to the adopted rules and identify certain exemptions which may apply. The rules only apply to BART-eligible sources as defined in §116.1500.

Under adopted §116.1510(b), the owner or operator of a BART-eligible source may elect to use modeling to demonstrate that the source does not contribute to visibility impairment at any Class I areas. If the owner or operator successfully demonstrates that the source does not contribute to visibility impairment, the source would not be subject to the requirements of §116.1520, Best Available Retrofit Technology (BART) Analysis, and §116.1530, Best Available Retrofit Technology (BART) Control Implementation. Owners or operators who seek to claim this exemption must submit the exemption modeling to the commission's Air Permits Division no later than April 30, 2007, under seal of a professional engineer licensed in the State of Texas.

BART exemption modeling and modeling conducted as part of the BART analysis must conform to an executive director-approved model and associated guidelines. The executive director has approved the use of the California Puff Model (CALPUFF) and the Central Regional Air Planning Association's (CENRAP) BART Modeling Guidelines, as well as the use of the Comprehensive Air Quality Model with extensions (CAMx) model. Modeling protocols for both CALPUFF and CAMx are available on the TCEQ Web site at: [www.tceq.state.tx.us/implementation/air/sip/bart/haze.html](http://www.tceq.state.tx.us/implementation/air/sip/bart/haze.html).

Persons seeking guidance about the modeling guidelines and other aspects of the BART modeling process should contact the commission's Air Permits Division.

The commission is adopting a 0.5 deciview threshold for determining whether a source contributes to visibility impairment. EPA guidance indicates that 0.5 deciview is the upper limit that states should use for determining whether a source contributes to visibility impairment. Factors that may influence the selection of this threshold are the number of emission sources affecting Class I areas and the magnitude of emissions from the individual sources. In response to comments, the commission has modified the proposed language of §116.1510(b) to refer only to sources that do not contribute to visibility impairment, because this correlates to the selected 0.5 deciview threshold. The commission expects Class I areas to have more than one source affecting visibility, so the *contributing to* threshold, not the *cause* threshold, will be the controlling factor for BART determinations. As a result of comments, the commission has also modified the rule to clarify that the threshold for contributing to visibility impairment is a change in visibility that is greater than or equal to 0.5 deciview, instead of simply greater than 0.5 deciview.

The commission is adopting several exemptions under §116.1510(c). These exemptions are based on examples that the EPA developed for 40 CFR Part 51, Appendix Y. There are two "model plant" exemptions adopted as §116.1510(c)(1) and (2), respectively. The EPA concluded that sources meeting the stated criteria for emissions and distance from Class I areas are unlikely to have a significant effect on visibility. The exemptions in §116.1510(c)(1) and (2) are pollutant specific for NO<sub>x</sub> and SO<sub>2</sub>, such that the owner or operator of the source would still be required to perform the BART engineering

analysis and implement any applicable BART controls for other visibility-impairing pollutants (such as PM).

The exemption adopted under §116.1510(c)(3) is based on *de minimis* emission totals that EPA determined would be unlikely to contribute to regional haze. As is the case with the exemptions in §116.1510(c)(1) and (2), the exemption in §116.1510(c)(3) is pollutant specific. For example, a source may be exempted for purposes of NO<sub>x</sub> or SO<sub>2</sub> while remaining subject to BART requirements for PM. A source claiming this exemption could also be exempted from BART requirements for PM while remaining subject to BART for other visibility-impairing air pollutants. The *de minimis* exemption level in §116.1510(c)(3) is determined by the emissions of PM<sub>10</sub>.

Owners or operators claiming exemption under §116.1510(c) are required to maintain records to demonstrate compliance with the exemption criteria, and shall make such records available to the commission or any local air pollution control agency with jurisdiction upon request.

The commission is adopting §116.1510(d) to provide that electric generating units (EGUs) that are participating in the Clean Air Interstate Rule (CAIR) cap and trade program may avoid a BART analysis and implementation of controls for NO<sub>x</sub> and SO<sub>2</sub>. The EPA has determined that CAIR provides greater reasonable progress than BART and has correspondingly allowed the use of CAIR as an acceptable substitute for the application of BART controls. This subsection only addresses NO<sub>x</sub> and SO<sub>2</sub>, so BART-eligible EGUs would remain subject to BART requirements for PM.

In response to public comment, the commission has added §116.1510(e), to clarify that owners or operators of BART-eligible sources that were screened out by the TCEQ's contractor-performed screening modeling are not required to comply with the requirements for the BART analysis or BART controls for the screened pollutant(s). However, an owner or operator seeking to use this exemption must submit a certification to the TCEQ no later than February 28, 2007, that the modeling inputs used in the screening modeling were valid. Entities that were screened out by the TCEQ's modeling will be notified by mail.

*§116.1520. Best Available Retrofit Technology (BART) Analysis.*

The commission adopts new §116.1520, which contains requirements for the BART engineering analysis. BART-eligible sources that are not exempted under §116.1510 are required to develop a BART engineering analysis to determine BART for that source. The analysis shall be conducted according to the procedures established in 40 CFR Part 51, Appendix Y, Guidelines for BART Determinations Under the Regional Haze Rule, Section IV, The Bart Determination: Analysis of BART Options. The BART analysis must include an evaluation of all technically feasible retrofit technologies in accordance with the five factors stated in FCAA, §169A(g)(2) (42 USC, §7491). The factors to be considered in the BART analysis are: an analysis of the cost of compliance, the energy and non-air quality environmental impacts, the degree of visibility improvement in affected Class I areas resulting from the use of the control technology, the remaining useful life of the source, and any existing control technology present at the source. Based on these statutory factors, the owner or operator must select and identify one of the emission control alternatives as the prospective BART control strategy for the source.

Adopted §116.1520(b) will require the owner or operator to specify short-term (hourly) and long-term (annual) emission limits associated with the selected BART control strategy. This information is necessary for the commission to develop the required Regional Haze SIP.

Adopted §116.1520(c) establishes a deadline of April 30, 2007, for submission of the BART analysis. This deadline is necessary to provide the commission with sufficient time to review the BART analyses and compile BART emission reductions to develop the required Regional Haze SIP by the December 17, 2007, deadline.

*§116.1530. Best Available Retrofit Technology (BART) Control Implementation.*

The commission adopts new §116.1530, which contains requirements and deadlines associated with the implementation of any required BART controls. Adopted §116.1530(a) establishes the deadline for any required BART controls to be implemented. Federal regulations specify that BART controls must be in place no later than five years after the EPA approves a state's Regional Haze SIP. Given that the commission is required to submit the Regional Haze SIP to EPA by December 17, 2007, and the EPA will require some time to review the SIP, it is likely that the BART control deadline will occur during or after the year 2013. Many factors influence the schedule of the development and approval of the Regional Haze SIP and it would be difficult to estimate a more precise deadline. Adopted §116.1530(a) also contains a requirement for owners or operators to establish procedures to ensure that BART-required control equipment is properly and continuously operated and maintained.

Adopted §116.1530(b) is intended to ensure that owners or operators subject to BART obtain any necessary authorization for new control equipment and establish enforceable mechanisms to ensure ongoing compliance with BART. The adopted rule requires that each owner or operator of a BART-eligible source comply with applicable portions of Subchapters B, F, and H of Chapter 116. The rule has been revised in response to comments from the U.S. EPA, to more clearly identify applicable permitting requirements.

*§116.1540. Exemption from Best Available Retrofit Technology (BART) Control Implementation.*

Adopted new §116.1540 provides a case-specific mechanism for BART-eligible sources to request an exemption from BART control requirements. In order to obtain exemption under this section, the owner or operator seeking exemption must first obtain initial approval from the commission, then obtain final approval from the EPA. Although this exemption may be used to avoid the otherwise-required installation of BART controls, this exemption does not negate the requirement to perform the BART analysis required under adopted §116.1520, or the requirement to submit the analysis no later than April 30, 2007.

**FINAL REGULATORY IMPACT ANALYSIS DETERMINATION**

The commission reviewed the adopted rules in light of the regulatory impact analysis requirements of Texas Government Code, §2001.0225, and determined that the rulemaking meets the definition of a major environmental rule as defined in that statute. A major environmental rule means a rule, the specific intent of which is to protect the environment or reduce risks to human health from environmental exposure, and that may adversely affect in a material way the economy, a sector of the

economy, productivity, competition, jobs, the environment, or the public health and safety of the state or a sector of the state. The adopted rulemaking does not, however, meet any of the four applicability criteria for requiring a regulatory impact analysis for a major environmental rule, which are listed in Texas Government Code, §2001.0225(a). Texas Government Code, §2001.0225, applies only to a major environmental rule, the result of which is to: 1) exceed a standard set by federal law, unless the rule is specifically required by state law; 2) exceed an express requirement of state law, unless the rule is specifically required by federal law; 3) exceed a requirement of a delegation agreement or contract between the state and an agency or representative of the federal government to implement a state and federal program; or 4) adopt a rule solely under the general powers of the agency instead of under a specific state law.

This rulemaking will require BART on certain sources of NO<sub>x</sub>, SO<sub>2</sub>, and PM that contribute to visibility impairment in any Class I area. The adopted new §§116.1500, 116.1510, 116.1520, 116.1530, and 116.1540 will ensure that owners or operators of sources that are subject to BART requirements perform a BART engineering evaluation to determine the appropriate level of BART and subsequently implement any required BART controls. The rules incorporate by reference the EPA's Guidelines for BART Determinations Under the Regional Haze Rule (40 CFR Part 51, Appendix Y). The rules also provide mechanisms for BART-eligible sources to demonstrate that they do not significantly impact visibility in Class I areas and are therefore not subject to BART control requirements. This strategy is intended to address visibility impairment at federally designated parks and scenic areas of national importance (Class I areas) and thus the intent of the adopted rules is protection and improvement of the aesthetic environment in these areas. Furthermore, the commission finds that the revisions to Chapter

116 in this rulemaking could adversely affect in a material way the economy, productivity, competition, jobs, the environment, or the public health and safety of the state or a sector of the state. Under the adopted new sections, BART-eligible sources are those sources that belong to one of 26 named source categories, have the potential to emit 250 tpy or more of a visibility-impairing air pollutant (NO<sub>x</sub>, SO<sub>2</sub>, and PM), and were built or reconstructed between August 7, 1962, and August 7, 1977. The commission has determined that approximately 127 sources may be BART eligible. Sources determined to be subject to BART through the engineering analysis of Appendix Y must install and operate BART controls for the source five years after the EPA approves the state's Regional Haze SIP. The commission anticipates that a fraction of these BART-eligible sources will actually be required to install BART controls, and it is not yet known what BART will be for each source. Some sources will model out of the requirement to determine and ultimately install BART; and EGUs may use CAIR as a substitute for BART for NO<sub>x</sub> and SO<sub>2</sub>. The exact cost of the BART controls for each unit cannot be predicted, but significant costs to comply with the control requirements may be expected from at least some units, which could in turn adversely affect a sector of the economy. The EPA has estimated costs ranging from \$1,000 to \$10,000 per ton of NO<sub>x</sub>, SO<sub>2</sub>, or PM. Given the potential for significant costs, the commission has made the determination that this rulemaking meets the definition of a major environmental rule.

Nevertheless, the adopted new sections to Chapter 116 are not subject to the regulatory analysis provisions of Texas Government Code, §2001.0225(b), because the adopted rules do not meet any of the four applicability requirements in subsection (a) of that section. Specifically, the BART requirements in Chapter 116 were developed to be included in the Regional Haze SIP that will be

submitted to the EPA as required under FCAA, 42 USC, §7491 and §7492, and therefore meet a federal requirement. The Federal Clean Air Act (FCAA, 42 USC, §7491) requires each SIP to include a requirement that each BART-eligible source that is reasonably anticipated to contribute to visibility impairment in any Class I area to procure, install, and operate BART controls. BART is to be determined according to the five factors listed in §7491(g)(2). Section 7492 of the FCAA requires that any regulations promulgated by the EPA pursuant to §7491 require states to revise their SIPs under FCAA, 42 USC, §7410 to include a regional haze plan that includes BART for certain sources.

The requirement to provide a fiscal analysis of proposed regulations in the Texas Government Code was amended by Senate Bill (SB) 633 during the 75th Legislature, 1997. The intent of SB 633 was to require agencies to conduct a regulatory impact analysis of extraordinary rules. These are identified in the statutory language as major environmental rules that will have a material adverse impact and will exceed a requirement of state law, federal law, or a delegated federal program, or are adopted solely under the general powers of the agency. With the understanding that this requirement would seldom apply, the commission provided a cost estimate for SB 633 that concluded *based on an assessment of rules adopted by the agency in the past, it is not anticipated that the bill will have significant fiscal implications for the agency due to its limited application.* The commission also noted that the number of rules that would require assessment under the provisions of the bill was not large. This conclusion was based, in part, on the criteria set forth in the bill that exempted proposed rules from the full analysis unless the rule was a major environmental rule that exceeds a federal law.

The FCAA does not always require specific programs, methods, or reductions in order to meet emission standards or visibility goals and reasonable progress of those goals; thus, states must develop programs and strategies to help ensure that those standards and goals for new and existing sources are met. The same is true for visibility protection. Because of the ongoing need to address nonattainment issues, and to meet the requirements of 42 USC, §7410, the commission routinely proposes and adopts SIP rules. As discussed earlier in this preamble, states must also revise their SIPs under §7410 to incorporate a plan for visibility protection, including requirements for BART. The legislature is presumed to understand this federal scheme. If each rule proposed for inclusion in the SIP was considered to be a major environmental rule that exceeds federal law, then every SIP rule would require the full regulatory impact analysis contemplated by SB 633. This conclusion is inconsistent with the conclusions reached by the commission in its cost estimate and by the Legislative Budget Board (LBB) in its fiscal notes. Since the legislature is presumed to understand the fiscal impacts of the bills it passes, and that presumption is based on information provided by state agencies and the LBB, the commission believes that the intent of SB 633 was only to require the full regulatory impact analysis for rules that are extraordinary in nature. While the SIP rules will have a broad impact, that impact is no greater than is necessary or appropriate to meet the requirements of the FCAA. For these reasons, rules adopted for inclusion in the SIP fall under the exception in Texas Government Code, §2001.0225(a), because they are required by federal law.

The commission has consistently applied this construction to its rules since this statute was enacted in 1997. Since that time, the legislature has revised the Texas Government Code, but left this provision substantially unamended. It is presumed that *when an agency interpretation is in effect at the time the*

*legislature amends the laws without making substantial change in the statute, the legislature is deemed to have accepted the agency's interpretation. Central Power & Light Co. v. Sharp*, 919 S.W.2d 485, 489 (Tex. App. Austin 1995), *writ denied with per curiam opinion respecting another issue*, 960 S.W.2d 617 (Tex. 1997); *Bullock v. Marathon Oil Co.*, 798 S.W.2d 353, 357 (Tex. App. Austin 1990, *no writ*); *Cf. Humble Oil & Refining Co. v. Calvert*, 414 S.W.2d 172 (Tex. 1967); *Dudney v. State Farm Mut. Auto Ins. Co.*, 9 S.W.3d 884, 893 (Tex. App. Austin 2000); *Southwestern Life Ins. Co. v. Montemayor*, 24 S.W.3d 581 (Tex. App. Austin 2000, *pet. denied*); and *Coastal Indust. Water Auth. v. Trinity Portland Cement Div.*, 563 S.W.2d 916 (Tex. 1978).

The commission's interpretation of the regulatory impact analysis requirements is also supported by a change made to the Texas Administrative Procedure Act (APA) by the legislature in 1999. In an attempt to limit the number of rule challenges based upon APA requirements, the legislature clarified that state agencies are required to meet these sections of the APA against the standard of *substantial compliance*. The legislature specifically identified Texas Government Code, §2001.0225, as falling under this standard. The commission has substantially complied with the requirements of Texas Government Code, §2001.0225.

The specific intent of the rulemaking is to adopt BART rules and incorporate by reference the federal BART determination guidelines, with the objective to reduce visibility impairment in federal Class I areas. There is no contract or delegation agreement that covers the topic that is the subject of this action. Therefore, the adopted rulemaking does not exceed a standard set by federal law, exceed an express requirement of state law, or exceed a requirement of a delegation agreement. Finally, this

rulemaking action was not developed solely under the general powers of the agency, but is authorized by specific sections of Texas Health and Safety Code (THSC), Chapter 382 (also known as the Texas Clean Air Act (TCAA)), and the Texas Water Code (TWC), which are cited in the STATUTORY AUTHORITY section of this preamble, including THSC, §§382.012, 382.017, and 382.051.

Therefore, this rulemaking action is not subject to the regulatory analysis provisions of Texas Government Code, §2001.0225(b), because although the rulemaking meets the definition of a major environmental rule, it does not meet any of the four applicability requirements.

#### TAKINGS IMPACT ASSESSMENT

The commission evaluated the adopted rules and performed an assessment of whether Texas Government Code, Chapter 2007 is applicable. The commission's assessment indicates that Texas Government Code, Chapter 2007 does not apply to this rulemaking because this is an action that is reasonably taken to fulfill an obligation mandated by federal law, which is exempt under Texas Government Code, §2007.003(b)(4). Specifically, the new sections of Chapter 116 require that BART-eligible sources determine whether they are subject to BART controls. Those sources that are subject to BART must perform a BART engineering evaluation to determine the appropriate level of BART, and subsequently implement any required BART controls. The Federal Clean Air Act (FCAA, 42 USC, §7491) requires each state to submit a Regional Haze SIP to address visibility in federal Class 1 areas. The FCAA further mandates that the SIP require each BART-eligible source that is reasonably anticipated to cause or contribute to visibility impairment in any Class 1 area to procure, install, and operate BART. BART is to be determined according to the five federally established factors, listed in 42 USC, §7491(g)(2).

#### CONSISTENCY WITH THE COASTAL MANAGEMENT PROGRAM

The commission determined that this rulemaking action relates to an action or actions subject to the Texas Coastal Management Program (CMP) in accordance with the Coastal Coordination Act of 1991, as amended (Texas Natural Resources Code, §§33.201 *et seq.*), and the commission rules in 30 TAC Chapter 281, Subchapter B, concerning Consistency with the CMP. As required by §281.45(a)(3) and 31 TAC §505.11(b)(2), relating to Actions and Rules Subject to the Coastal Management Program, commission rules governing air pollutant emissions must be consistent with the applicable goals and policies of the CMP. The commission reviewed this action for consistency with the CMP goals and policies in accordance with the rules of the Coastal Coordination Council and determined that the action is consistent with the applicable CMP goals and policies.

The CMP goal applicable to this rulemaking action is the goal to protect, preserve, and enhance the diversity, quality, quantity, functions, and values of coastal natural resource areas (31 TAC §501.12(l)). The adopted rules are intended to implement a federally required program to apply BART emission controls to certain sources of visibility-impairing air pollutants. The adopted changes would tend to reduce undesirable haze at federal Class I areas. Certain aspects of this rulemaking are intended to protect the environment or reduce risks to human health from environmental exposure. The CMP policy applicable to this rulemaking action is the policy that commission rules comply with federal regulations in 40 CFR, to protect and enhance air quality in the coastal areas (31 TAC §501.14(q)). This rulemaking action complies with 40 CFR Part 51, Requirements for Preparation, Adoption, and Submittal of Implementation Plans. Therefore, in accordance with 31 TAC §505.22(e), the commission affirms that this rulemaking action is consistent with CMP goals and policies.

#### EFFECT ON SITES SUBJECT TO THE FEDERAL OPERATING PERMITS PROGRAM

Owners and operators subject to the Federal Operating Permit Program must, consistent with the revision process in 30 TAC Chapter 122, Federal Operating Permits Program, revise their operating permits to include the applicable BART control requirements or emission limits for each source.

#### PUBLIC COMMENT

A public hearing was held on the proposed rules on September 18, 2006, in Austin, Texas. The comment period was originally scheduled to end on September 25, 2006, but was extended at the request of commenters, and closed on October 9, 2006. The commission received comments from American Electric Power (AEP), Alcoa Inc. (Alcoa), Arkema Inc. (Arkema), Ash Grove Texas, L.P. (Ash Grove), Association of Electric Companies of Texas (AECT), BP Products North America Inc. (BP), Dow Chemical Company (Dow), El Paso Electric Company (EPE), Sierra Club-Houston Regional Group (Houston Sierra Club), Source Environmental Sciences, Inc., Texas Chemical Council (TCC), Texas Lehigh Cement Company, Texas Oil and Gas Association (TXOGA), TXU Power (TXU), National Park Service (NPS) a division of the United States Department of Interior, and the United States Environmental Protection Agency, Region 6 (EPA). No individuals provided comments.

BP supported comments submitted by TXOGA. TXU supported comments submitted by AECT.

#### RESPONSE TO COMMENTS

##### *FEDERAL APPROVABILITY*

EPA commented that the *de minimis* exemptions in proposed §116.1510(c)(3) should be modified to clarify that these exemptions apply on a plant-wide basis, as described in 70 FR 39117 and 39161.

**The *de minimis* exemptions are evaluated based on the total potential emissions from the BART-eligible source as a whole, which includes the total emissions from all the emission units that meet the BART-eligibility criteria. Therefore, these exemptions already incorporate a plant-wide approach. Therefore, the commission did not change the rule in response to this comment.**

EPA suggested that in §116.1500(d), Texas should modify the language to make it clear that participation in the CAIR does not absolve a BART-eligible source from possibly being found subject to the BART provisions of the regional haze rule for PM.

**The rule has not been revised in response to this comment. The commission is aware that CAIR controls only NO<sub>x</sub> and SO<sub>2</sub>, and not direct PM. Therefore, CAIR will not cover PM for BART.**

EPA commented that in §116.1520(b), the proposed rule requires the owner or operator to provide detailed information documenting the projected hourly and annual emission limits for the selected BART control strategy. EPA stated that this requirement, although important, could benefit from additional specificity, similar to that required under existing §116.12(1) - (3).

**The proposed requirement to document the projected hourly and annual emission limits is sufficiently straightforward, and it is not clear which aspects of §116.12(1) - (3) would be applicable. No changes were made in response to this comment.**

EPA commented that the commission may wish to define BART-required control equipment as used in §116.1530(a) and (b).

**The term BART-required control equipment simply means the control equipment installed to satisfy the BART rules. Because the meaning is sufficiently straightforward, an explicit definition is not necessary.**

EPA stated that in §116.1530(b), the TCEQ rule discusses how BART-required control equipment must be housed within a permit or other enforcement mechanism. As written, the provision is vague and would not be approvable as a SIP revision. EPA recommended TCEQ provide further clarification and reference any specific permitting rules and procedures that apply. In addition, EPA sought clarification, with respect to modifying emission limits, how §116.1530(b) provides for grandfathered facilities currently operating under Title V permits. Because the BART requirements are *applicable* requirements of the FCAA, EPA states that they must be included as Title V permit conditions according to the procedures established in 40 CFR Part 70 or 40 CFR Part 71. Under §70.7(f)(1)(i), Title V permits must be reopened and revised to include new applicable requirements if the permit has three or more years of life. The reopening must be completed within 18 months after promulgation of

the new applicable requirement and the reopening must follow the same procedures (public comment, etc.) as apply to initial permit issuance.

**The commission has revised the language in §116.1530(b) in response to this comment. The language clarifies that every BART source must comply with the requirements of Subchapter B (for New Source Review Permits) or Subchapter F (for Standard Permits). These subchapters address requirements for permitted facilities to apply for permit amendment, permit alteration, or standard permit, as applicable. The new language will also cover modifications to grandfathered facilities permitted under Chapter 116. Because Texas' Title V program rules (30 TAC Chapter 122), do not reference preconstruction permits issued under Title I of the FCAA, but instead reference preconstruction permits under Chapter 116, Title V sources will be required to revise their operating permits after issuance of the modified permit required under §116.1530(b). Title V sources with BART-subject sources authorized under a grandfathered permit (existing facility or Voluntary Emission Reduction Permit (VERP)) must also revise their Title V permit to reflect the BART limits added to their Chapter 116 authorization.**

EPA questioned the exclusion of VOCs and ammonia in the definition of visibility-impairing pollutant.

**The commission understands the commenter's concerns that VOCs and ammonia are not included on the list of BART pollutants. The TCEQ has modeled the visibility impairment impact of VOC emissions from all potentially BART-eligible sources in Texas for Class I areas in Texas and surrounding states. The collective impact of all these sources was below the *de minimis* impact**

**threshold of 0.5 deciview. Therefore, the collective impact of all individual sources and all groupings of sources from among the potentially BART-eligible sources in Texas is below the *de minimis* threshold. For this reason, the commission concludes that it is appropriate not to list VOCs as a visibility-impairing pollutant for potentially BART-eligible sources in Texas. The rules have not been revised in response to these comments.**

**The commission has considered ammonia emissions and has concluded that it would be inappropriate to add ammonia to the list of visibility-impairing pollutants in the BART rule. Industrial ammonia emissions are less than 1% of the total ammonia emissions in Texas, and BART source emissions are only a part of industrial ammonia emissions. Therefore, it is inappropriate to list ammonia from BART sources in Texas as a visibility-impairing pollutant. The Regional Haze SIP will look at visibility-impairing pollutants again and determine if more pollutants should be considered. In the SIP, the uniform rate of progress may require further controls. The rule has not been revised in response to these comments.**

EPA suggested various revisions to the definition of a BART-eligible source to clarify that BART applies on an emission unit basis and not a source-wide or site-wide basis.

**The commission concurs that the definition of BART-eligible source should be rephrased to clarify that BART applicability is determined on an emission unit basis, consistent with EPA guidance, and not on a source-wide or site-wide basis. The commission has modified the definition accordingly.**

EPA strongly urged TCEQ to work with EPA if using alternative approaches to ensure consistency and approvability throughout the process. EPA recommended that any alternative modeling approach used by owner/operator be approved by EPA, in addition to the commission, to ensure that the alternative modeling is equally stringent.

**The commission concurs and will be submitting all BART modeling protocols and analyses to EPA for its review.**

EPA commented that in §116.1530(a), the proposed rule requires that each owner or operator maintain the BART-required control equipment and establish procedures to ensure such equipment is properly and continuously operated and maintained. As written, the requirement to establish procedures appears vague. EPA commented that TCEQ may wish to specify accepted procedures required to continue implementing their controls.

**Specific procedures to ensure that BART-required control equipment is properly and continuously operated and maintained will be addressed in the facility's permit. It would be difficult to specify those procedures in the BART rule given the broad range of unit types and control equipment that are potentially subject to BART. No change to the rule was made in response to this comment.**

*GENERAL COMMENTS*

The Houston Sierra Club commented that the proposal explanation was incomplete and requested the list of 127 sources, a map of source locations, and the amounts of NO<sub>x</sub>, SO<sub>2</sub>, and PM that each source emits. The Houston Sierra Club was concerned that the rule is unclear as to the level of BART control from each individual source or the percentage of control from all BART sources. The Houston Sierra Club commented that it is not clear how interstate consultation will apportion visibility reduction and what constitutes BART and BART control equipment.

**The commission does not agree that the proposed rule explanation is incomplete. The primary purpose of the rule is to create a process for certain sources within the state to determine whether they are subject to the requirements to determine and install BART. Subsequent to this rulemaking, the commission will propose a Regional Haze SIP that will incorporate information on BART at those sources determined to be subject to this rule. When developing a rule, the commission attempts to describe the number of entities that will be affected by the rule and characterize the overall costs and benefits of the rule. There is no requirement for the commission to provide detailed information about each individual source that may be affected by a proposed rule. However, the requested information is now available in the BART resources and guidance documents posted on the TCEQ Web site at:**

***www.tceq.state.tx.us/implementation/air/sip/bart/haze.html*. The CAMx Modeling Guidance contains a map showing the proximity of BART-eligible sites to Class I areas. The Texas Modeling Data file contains the NO<sub>x</sub>, SO<sub>2</sub>, and PM emission rates that were used in the screening modeling.**

**BART is determined on a case-by-case basis, taking into account a combination of factors. There is no defined percentage of control or specific control equipment type associated with BART. The commission cannot project the amount of reductions from BART at this time as no sources have submitted the BART engineering analyses yet; the engineering analyses are due April 30, 2007. The Regional Haze SIP will contain more detailed information about sources that are subject to BART including estimates of pollutant reductions associated with BART.**

Houston Sierra Club commented that the installation of BART should not take 57 years to complete. Houston Sierra Club urges the TCEQ to go beyond regulatory policy that proposes the goal of natural background in 2064 and, instead, consider the goal of 2020.

**The commission appreciates the concern of the Houston Sierra Club that visibility goals are set at 2064, but this 2064 goal is for regional haze not BART. BART controls are scheduled to be in place five years after the EPA approves the Regional Haze SIP or approximately 2013. In 2018, BART controls and other regional haze controls will be reassessed. Under the SIP, the state will reevaluate the rate of progress towards natural visibility every five years until 2064. If the state is not meeting the uniform rate of progress, more controls may be proposed. EPA estimated how long it would take to reach natural conditions based on the rate of visibility improvement being achieved from existing programs. Page 35731 of the 1999 Regional Haze Rule states: *EPA's analyses show that the reductions from CAA and other programs will result in a rate of improvement estimated at approximately 3 deciviews over the period from the mid 1990's to about 2005. The EPA***

*calculated that if this rate of improvement could be sustained, these areas would reach the national goal in 60 years. No change was made in response to this comment.*

TCC commented that it reviewed federal rules regarding regional haze and found no requirement for a once-in-always-in (OIAI) provision. TCC is concerned that until the exemption levels are established by rule, member companies cannot begin to develop or implement control strategies to reduce emissions to exemption levels. TCC suggests that any OIAI provision adopted by the commission apply only after the first compliance date for actual controls, similar to the federal Maximum Achievable Control Technology (MACT) standards.

**The commission has made no changes in response to this comment. The determination that a BART-eligible source is subject to BART, as well as BART engineering analysis, must be made by April 30, 2007, in order for these controls to be reflected in the state's Regional Haze SIP due in December 2007, as required under FCAA, §169A and 40 CFR §51.308. Once a determination is made that a source is subject to BART controls, but prior to installation of the controls or emission limits, §116.1540 provides that the source may apply for an exemption from the executive director and final approval from EPA. It is unnecessary for sources to wait until adoption of this rule to implement controls or other enforceable limits in order to fall below the BART-eligibility thresholds. Sources have the option to revise their Title I (preconstruction) permits to provide synthetic minor limits. However, in response to questions from states and regional planning organizations on SIP requirements (*Additional Regional Haze Questions*, August**

**3, 2006), EPA has stated that the modifications must be completed before the state goes to public hearing on the SIP.**

*DEFINITION OF BART-ELIGIBLE*

Alcoa commented that the rule should provide differentiation between BART-eligible sources and sources that are subject to BART. The terms and requirements of the proposed rule are inconsistent with Appendix Y to Part 51-Guidelines for BART Determinations; Final Rule (EPA). Alcoa also commented that TCEQ treats both classes of sources as one; both are BART-eligible sources.

**Although the proposed rule does not explicitly differentiate between sources that are BART-eligible and sources that are subject to BART, on a functional level the rule is consistent with Part 51 and the associated guideline. A source that is subject to BART is simply a BART-eligible source that emits any air pollutant that may reasonably be anticipated to contribute to any impairment of visibility in any mandatory Class I federal area. The rule allows a source to demonstrate that it does not contribute to visibility impairment (and are therefore not subject to BART), and those sources are not required to implement BART. No changes to the rule were made in response to this comment.**

Alcoa stated that the effective date of 40 CFR §51.301 definitions cited in the rule is incorrect. In the first paragraph of §116.1500, TCEQ proposes that terms not explicitly defined in the rule are to have the meaning given them in 40 CFR §51.301 as effective September 6, 2005. The effective date of the

current version is July 1, 1999. The date reference in TCEQ's BART rule is inconsistent with the effective date of current definitions in 40 CFR §51.301 and produces unnecessary confusion.

**The commission agrees that the most current revision to 40 CFR §51.301 was published on July 1, 1999, and became effective on August 30, 1999. The commission has made a change to §116.1500 to reflect the August 30, 1999, effective date.**

AECT, Alcoa, Ash Grove, and El Paso Electric suggested various revisions to the definition of a BART-eligible source to clarify that BART applies on an emission unit basis, and not a source-wide or site-wide basis.

**The commission concurs that the definition of BART-eligible source should be rephrased to clarify that BART applicability is determined on an emission unit basis, consistent with EPA guidance, and not on a source-wide or site-wide basis. The commission has modified the definition accordingly.**

*DEFINITION OF VISIBILITY-IMPAIRING POLLUTANT*

ACET, Ash Grove, TXU, Dow, and TCC all agreed that the §116.1500 definition of visibility-impairing pollutants should include only NO<sub>x</sub>, SO<sub>2</sub>, and PM.

**The commission appreciates the support of the §116.1500(b) list of BART pollutants as proposed.**

The Houston Sierra Club and NPS questioned the exclusion of VOCs and ammonia in the definition of visibility-impairing pollutant. AEP suggested that the TCEQ reexamine the proposed exclusion of VOCs, especially reactive VOCs, from the definition since the role of VOCs in producing secondary organic aerosols cannot be discounted in developing control strategies.

**The commission disagrees with the suggestions to add VOCs to the list of BART pollutants. The TCEQ has modeled the visibility-impairment impact of VOC emissions from all potentially BART-eligible sources in Texas for Class I areas in Texas and surrounding states. The collective impact of all these sources was below the *de minimis* impact threshold of 0.5 deciview. Therefore, the collective impact of all individual sources and all groupings of sources from among the potentially BART-eligible sources in Texas is below the *de minimis* threshold. For this reason, the commission concludes that it is appropriate not to list VOCs as a visibility-impairing pollutant for potentially BART-eligible sources in Texas. The rules have not been revised in response to these comments.**

**The commission has considered ammonia emissions and has concluded that it would be inappropriate to add ammonia to the list of visibility-impairing pollutants in the BART rule. Industrial ammonia emissions are less than 1% of the total ammonia emissions in Texas, and BART source emissions are only a part of industrial ammonia emissions. Therefore, it is inappropriate to list ammonia from BART sources in Texas as a visibility-impairing pollutant. The Regional Haze SIP will look at visibility-impairing pollutants again and determine if more**

**pollutants should be considered. In the SIP, the uniform rate of progress may require further controls. The rule has not been revised in response to these comments.**

#### *0.5 DECIVIEW THRESHOLD*

AECT, AEP, Alcoa, and TXU all provided comments opposing a threshold lower than the 0.5 deciview proposed in the rule. AECT, TXU, and AEP expressed concern that a lower threshold could lead to inconsistencies and conflicts between states. In addition, AEP and Alcoa concurred that a lower threshold would be unwarranted on the basis that a change of 0.5 deciview is significantly below the well-established threshold of perceptibility given by a change of 1.0 deciviews or greater. Alcoa argued that using a threshold lower than the proposed 0.5 deciview would require additional modeling resources for its justification.

**The commission will not lower the 0.5 deciview threshold. The TCEQ has received no evidence that a lower threshold is appropriate in Texas. By using only a single threshold, the TCEQ does not intend to imply that the threshold for *causing* visibility impairment is the same as for *contributing to*. Since TCEQ expects all Class I areas have more than one source impacting visibility, any source that *causes* visibility-impairment (such as, using for example, based on the EPA's threshold of a humanly perceptible visibility impact of 1.0 deciview or greater) also *contributes to* the same. So the *contributes to* threshold is the one relevant to this rule. To clarify the rule, the TCEQ will remove the term *causes* in this context, so that the 0.5 deciview value will be applicable only as a contribution threshold. The commission is following EPA guidance, Part**

**51, Appendix Y, Section III.A.1, and has made no changes in §116.1520 and §116.1530 in response to the comments.**

In addition, Alcoa expressed concern that the proposed rule does not provide a clear distinction between *contributing to* and *causing* visibility impairment in Class I areas. In particular, Alcoa does not support using 0.5 deciview as an appropriate threshold for determining that emissions from a single BART source are causing visibility impairment in a Class I area.

**By using only a single threshold, the commission does not intend to imply that the threshold for *causing* visibility impairment is the same as for *contributing to*. Since the commission expects all Class I areas have more than one source impacting visibility, only the threshold for *contributing to* visibility impairment will be examined for the BART determination. To clarify the rule, the commission will remove the term *causes* in this context, so that the 0.5 deciview value will be applicable only as a contribution threshold.**

The Houston Sierra Club expressed the desire that TCEQ revisit the 0.5 deciview threshold after BART has been applied, citing concern that 0.5 deciview threshold may not be stringent enough.

**The commission has made no changes in response to this comment. Since a determination of which BART-eligible sources will be subject to BART engineering analysis must be determined prior to submittal of the Regional Haze SIP to EPA (December 17, 2007), there is no opportunity to revisit the threshold after it has been applied. However, the state must periodically reassess the**

**reasonable progress goals contained in the SIP for each Class I area. This analysis may indicate that additional emission reductions at BART and other non-BART sources are necessary to make reasonable progress toward the goal of natural visibility conditions.**

NPS expressed concern that proposed §116.1510(b) uses a threshold of *greater than 0.5 deciviews* while the EPA uses a threshold of *at or more*. NPS suggests that the rule should specify whether the threshold will be the same as EPA language or if Texas will apply a different threshold.

**The commission agrees with this comment. For consistency with EPA guidance, the commission has changed the wording in the rule accordingly.**

#### *SCREENING TOOLS*

Dow and TCC commented that CALPUFF modeling can be time consuming and resource intensive and that TCEQ's cost estimates for modeling are low.

**The commission acknowledges that the range of costs for exemption modeling will vary depending on a number of factors, including the complexity of the source, the size of the facility, and the proximity of the source to Class I areas and the number of Class I areas to be modeled. No changes to the rule have been made.**

Alcoa, AECT, AEP, Ash Grove, El Paso Electric, and TXU have recommended that *model plant* exemptions from the requirements of §116.1520 and §116.1530 be expanded to include distance and

emissions threshold levels for PM. BP, Dow, TXOGA, and TCC suggested that the TCEQ include additional screening tools for evaluating visibility requirements.

**The commission agrees that additional tools may be needed. Section 116.1510(b) allows for the use of additional modeling screening tools that have been developed or approved by the executive director. Screening tools developed based on the CAMx screening modeling have been included in the modeling guidance documents posted on the BART Web site at:**

***www.tceq.state.tx.us/implementation/air/sip/bart/haze.html*. The screening tools include Texas-specific model plants for PM<sub>10</sub>, NO<sub>x</sub>, and SO<sub>2</sub>. No changes to the rule have been made.**

#### *USE OF COMMISSION VS EXECUTIVE DIRECTOR*

AECT, TXU, Ash Grove, and El Paso Electric recommend that in §116.1510(b), the word *commission* be replaced with *executive director*. The revision is needed because it will be the executive director's staff, not the commissioners, who will evaluate the modeling. Such revision would be consistent with the rest of the BART rules, which use the term *executive director* to refer to the executive director and his staff, and *commission* to refer to the three commissioners.

**The commission agrees with this suggestion and has changed *commission* to *executive director*.**

**The commission notes that this is consistent with references to the *executive director* in other parts of the rule.**

#### *EXTENSION OF SUBMITTAL DATE FOR MODELING AND ENGINEERING ANALYSIS*

BP, Dow, TCC, and TXOGA commented that the TCEQ should extend the April 30, 2007, deadline for submittal of exemption modeling and the engineering analysis to allow adequate time for regulated entities to conduct and submit modeling that shows that the source does not cause or contribute to visibility impairment. Dow and TCC suggested extending the deadline to July 31, 2007, to allow ample time for TCEQ to review this information and develop the required Regional Haze SIP by the December 17, 2007, deadline. Arkema suggested the deadline be effective 150 to 180 days after BART rule promulgation.

**The commission understands the commenters' concerns, however, due to the short time line, the rule has not been changed in response to comments. The Regional Haze SIP is anticipated to go to the commission for proposal in the summer of 2007 to meet the adoption date of December and to meet EPA's deadline of December 17, 2007. It will take months for TCEQ to review modeling and engineering analysis submittals for general completeness and to identify the magnitude of projected BART emission reductions. Therefore, the April 30, 2007, due date cannot change because of the Regional Haze SIP time line.**

#### *MODELING*

The Houston Sierra Club commented that it does not support waiting until the eighth highest 24-hour visibility reading before deciding whether regional haze is at unacceptable levels as it is stated in the Draft Final Modeling Protocol: Screening Analysis of Potentially BART-Eligible Sources in Texas on page 3-3.

**The commission has made no changes in response to these comments. EPA notes in the final BART rule published in the *Federal Register* on July 6, 2005, that if the 98th percentile, or the eighth highest daily value, from the modeling is less than the contribution threshold of 0.5 deciview then it may be concluded that the source does not contribute to visibility impairment and is not subject to BART.**

AECT and AEP commented that the use of CALPUFF could result in false attribution to Texas sources of regional haze impacts on Class I areas in other states. AECT and AEP suggested that the air quality model SCICHEM be considered as an alternative to CALPUFF. SCICHEM is a stand alone plume dispersion and chemistry model that has been used in some visibility studies.

**The commission has made no changes in response to these comments. Currently, CALPUFF is the only EPA-approved model for use in estimating single source pollutant concentrations resulting from the long-range transport of primary pollutants. CALPUFF and CAMx are the two models the executive director has determined are appropriate to use in modeling source emission impacts on Class I areas for the purposes of the BART rule.**

AEP commented that approval of CALPUFF in source-specific exemption modeling should be examined with care given the limitations and consequences of CALPUFF modeling. AEP commented that CALPUFF is recognized to have serious limitations in its chemistry treatment and may overstate secondary particulate matter production. AEP commented that the plume treatment in CALPUFF beyond 200 kilometers is uncertain.

**The commission appreciates the comment and acknowledges that CALPUFF has limitations, but has made no changes in response to these comments. The usefulness of CALPUFF for characterizing transport beyond 200 - 300 kilometers, as well as the limitations of the chemistry treatment in CALPUFF are well known and documented in the EPA document, *Interagency Workgroup on Air Quality Modeling (IWAQM) Phase 2 Summary Report and Recommendations for Modeling Long Range Transport Impacts (December 1998)*. EPA notes in the final BART rule, published in the *Federal Register* on July 6, 2005, that CALPUFF can be used for purposes, such as visibility assessments addressed in the final rule, to account for the chemical transformation of SO<sub>2</sub> and NO<sub>x</sub>. The commission will allow the use of the photochemical grid model, CAMx, for evaluating visibility impacts at Class I areas located beyond 300 kilometers from a source.**

***MODELING-OTHER***

Source Environmental Sciences, Inc. commented that the first sentence of §116.1510(b) be revised to the following in order to be consistent with other TCEQ rules, regulations, and guidelines, *The owner or operator of a BART-eligible source may demonstrate, using an air dispersion model and air dispersion modeling guidelines approved by the commission, that the source does not cause or contribute to visibility impairment in a Class I area.*

**The commission has made no changes in response to this comment. Since the commission will allow the use of the photochemical grid model CAMx for evaluating visibility impacts at Class I areas located beyond 300 kilometers from a source, including the additional wording of *air***

***dispersion in front of model and modeling guidelines would not be an appropriate characterization for numerical grid models, such as CAMx.***

TXU has recommended that TCEQ authorize the use of the photochemical grid model CAMx under §116.1510(b). TXU also cites EPA guidance which notes that the use of photochemical grid models is acceptable and, in some cases, may be more accurate and appropriate to use this model.

**The commission agrees with the commenter. CAMx is an approved model for exemption modeling under §116.1510(b).**

#### *MODELING OF CLASS I AREAS*

Dow and TCC commented that ENVIRON's final report for the screening evaluation was not available to determine how many Class I areas need to be evaluated for source-specific exemption modeling. TCC suggested that the public comment period be re-opened upon the release of the results of the ENVIRON screening evaluation. TCC suggested that this topic be included in the informational meeting being held by the TCEQ on November 9, 2006.

**The commission has made no changes in response to these comments. The final report of the ENVIRON screening evaluation is available at the Regional Haze Web site:**

***[www.tceq.state.tx.us/implementation/air/sip/bart/haze.html](http://www.tceq.state.tx.us/implementation/air/sip/bart/haze.html). Future addendums to the final report will be made available as soon as they are ready.***

BP, Dow, TCC, and TXOGA commented that the number of Class I areas to be considered for source-specific exemption modeling is not specified in the proposed rule. BP, Dow, TCC, and TXOGA commented that if multiple Class I areas must be considered, it may increase the cost of modeling significantly. Dow commented that the TCEQ estimates for exemption expenses are low and may not even cover a CALPUFF setup and execution cost for a single source-Class I area combination. BP, Dow, TCC, and TXOGA requested that the final rule specify the number of modeling runs necessary to exempt a source from the BART Engineering Analysis requirements.

**The commission has made no changes in response to these comments. The Class I areas to be considered for source-specific exemption modeling are listed in TCEQ draft modeling documents, *Screening Analysis of Potentially BART-Eligible Sources in Texas and Best Available Retrofit Technology (BART) Modeling Protocol to Determine Sources Subject to BART in the State of Texas*. The range of costs for exemption modeling will vary depending on a number of factors, including the complexity of the source, the size of the facility, and the proximity of the source to Class I areas. The number of modeling runs necessary to exempt a source from the BART Engineering Analysis requirements will vary source-by-source, and specifying a single number would limit sources on how they conduct their modeling.**

#### *MODELING CERTIFICATION*

AECT, Dow, TCC, and TXU requested clarification of the relationship between the screening modeling and the requirement for additional analyses. AECT, Ash Grove, Dow, and TXU suggested that the final rule confirm that no additional modeling is needed if the results of the screening analysis

show that no additional analyses are needed for NO<sub>x</sub>, SO<sub>x</sub>, or PM. Dow and TCC suggested that if the screening analysis shows that no additional analysis is needed for an air contaminant, then the owner/operator be clearly excluded from the requirement to submit additional modeling under §116.1510(b). Dow suggested that the model plant exemptions in §116.1510(c)(1) - (3) remain available in lieu of providing exemption modeling or a BART engineering analysis, if additional analyses are required.

**The commission concurs that the rule should provide greater clarity concerning the TCEQ-conducted screening modeling, the need for additional analyses, and the applicability of the rule, and has revised the rules accordingly. The TCEQ's screening modeling excluded some sources from BART requirements for all pollutants; other sources were excluded for only certain pollutants. If a source was screened out of BART for one or all pollutants by TCEQ's screening modeling, then that source is not required to conduct additional modeling or BART analysis for that pollutant(s). However, sources using the CAMx model must include all the pollutants in their modeled emission inventories and visibility impact assessments. The Interagency Monitoring of Protective Visual Environments (IMPROVE) equation requires that concentrations of all pollutants (exempted or not) be included in the IMPROVE equation.**

**In addition, the source must review the information used as the basis for the screening modeling (emission rates, stack parameters, etc.) and certify that it is correct. The commission has revised the rules to more clearly explain the requirements for sources that were screened out in the TCEQ**

**modeling. The exemptions in §116.1510(c)(1) - (3) remain available, independently of whether or not a source was screened out by the TCEQ screening modeling.**

*BART EXEMPTION SHIELD*

Arkema commented that TCEQ should finalize the BART modeling exemption. Arkema supported TCEQ's proposed approach to allow facilities that can demonstrate no impact on Class I areas to opt out of BART controls. After more review, TCEQ may conclude that the modeling was not performed correctly and that a facility may actually become subject to BART. Arkema commented that TCEQ should modify the proposed rule to shield sources pursuing this option from compliance with the rule until TCEQ approves the modeling demonstration or six months after TCEQ rejects any such modeling demonstration. The six-month period will provide a source facing rejection of their modeling demonstration adequate time to prepare the required BART analysis and will ensure that a source complying with §116.1510 does not inadvertently fail to comply with §116.1520 because of participation in another part of the rule.

**The commission appreciates the support for the §116.1510(b) exemption process. However, the commission does not concur that a shield for sources who submit modeling under this exemption is appropriate or necessary. In addition, such a shield or extension would tend to further delay the submission of the BART analyses. In order to develop the Regional Haze SIP, the commission needs information about BART applicability and BART controls no later than April 30, 2007.**

*MODELING-OTHER*

AECT, Ash Grove, El Paso Electric, and TXU suggested revisions to §116.1510(b) to clarify that a BART-eligible source demonstrating that its emissions of a particular visibility-impairing pollutant do not contribute to visibility impairment at a Class I area is not required to perform BART analysis for that pollutant.

**The commenters suggested changing the rule to make the modeling exemption under §116.1510(b) function on a pollutant-by-pollutant basis. The commission does not agree that the §116.1510(b) exemption should be applied on a pollutant-specific basis. Any owner or operator of a source seeking to claim this exemption must model all visibility-impairing pollutants cumulatively, even in cases where the TCEQ-conducted screening modeling (or model plant exemptions) indicate that one pollutant type would not contribute to visibility impairment.**

AECT, Ash Grove, El Paso Electric, and TXU suggested that §116.1510(b) reflect that the demonstration of no impairment can be met through the CAMx modeling recently performed by TCEQ. El Paso suggested a similar revision to §116.1510(b) to clarify that modeling performed by a source in accordance with the guidelines approved by the TCEQ is sufficient to demonstrate that a source does not contribute to visibility impairment at a Class I area for the purpose of determining whether a BART analysis will be required. The commenters expressed that changes to this subsection are necessary to avoid potential disputes where a particular source models out of BART (i.e., less than 0.5 deciviews) in accordance with an approved protocol and guidelines and a third-party uses an unapproved protocol to show an impact above 0.5 deciviews.

**The commission agrees with the commenters that changes are necessary to this subsection and has therefore made changes to the rule. States must submit their Regional Haze SIPs, including the BART component, by December 17, 2007. Given this relatively short time frame and the potentially large number of BART-eligible sources in Texas, the executive director conducted screen modeling, based on emissions and unit construction data obtained from those sources, to obtain a better idea of how many BART-eligible sources would then be required to implement BART controls. A primary purpose of this modeling exercise was to project the level of agency resources that would be necessary to review the source-specific exemption modeling, engineering analyses, and control determinations in time to meet the SIP submittal deadline. The commission has changed the rule to allow BART-eligible sources that submitted data to the agency to use the modeling performed by the executive director to demonstrate no visibility impairment for one or more visibility-impairing pollutants. The commission has added new §116.1510(e) to reflect that in order to use the executive director's modeling for this demonstration, a source must certify that the emissions and location information provided to the executive director in the survey and used in the modeling analysis is correct.**

*PROFESSIONAL ENGINEER REQUIREMENT*

Dow and TCC requested that TCEQ provide flexibility regarding the submittal of the BART analysis under seal of a Texas licensed professional engineer (P.E.). TCC proposed that the requirement for submittal under seal of a P.E. apply only if the analysis is done by an independent consultant or engineering firm and not if prepared by resources internal to the company owning the source.

**The intended purpose of the P.E. seal requirement for the engineering analysis is to ensure that the submittals meet a high standard of quality and completeness. This indicates that the burden of proof is on the applicant to ensure that applicable guidance and protocols were followed. A P.E. seal should reduce the amount of agency resources expended to deal with incomplete or defective submittals and enable the commission to focus resources more efficiently. This rationale for requiring each BART engineering analysis to be submitted under P.E. seal does not depend on whether the analysis was prepared internally by the owner or operator of the source or using external resources. The commission has not changed the rule in response to this comment.**

BP, Dow, TCC, and TXOGA commented that Texas P.E. licensing requirements do not require in-depth knowledge of CALPUFF or CENRAP BART modeling guidelines, and air modeling skills do not necessarily require P.E. knowledge. Dow commented that out-of-state contractors may not have a Texas-licensed P.E. on staff. Source Environmental commented that no existing TCEQ rules or regulations require the sealing of an air dispersion modeling report with a P.E. seal, and the proposed requirement is unnecessarily restrictive.

**The commission acknowledges that Texas P.E. licensing requirements do not specifically require direct knowledge or experience relating to the CALPUFF or CENRAP modeling. However, a reviewing P.E. should still be able to ensure that modeling staff are following applicable guidelines and protocols. The P.E. seal requirement will tend to reduce the amount of agency resources expended to deal with incomplete or defective submittals and enable the commission to focus**

**resources more efficiently. The P.E. must certify that all of the emission and stack parameter data are accurate, and the modeling protocols were followed.**

Houston Sierra Club commented that TCEQ should not assume that just because the BART analyses and modeling are submitted under the seal of a P.E. that TCEQ does not have to conduct a detailed review of every submittal. Houston Sierra Club suggested that TCEQ must *trust, but verify* each and every submittal in a detailed manner.

**The commission acknowledges that the P.E. seal requirement does not guarantee that every modeling report or BART engineering analysis will be acceptable, although the commission expects that this requirement will result in an overall higher quality level for these submittals. All modeling and engineering analysis submittals will be reviewed for general completeness and to identify the magnitude of projected BART emission reductions. Submittals will be selected for detailed technical review based on a variety of factors, including, but not limited to: quantity of visibility-impairing pollutants; proximity to Class I sites; cases where the source's prospective BART strategy results in little to no improvement in visibility; or cases where the source proposes no additional control. The reviews will be performed with existing commission resources. No changes to the rule were made in response to this comment.**

#### *PARTICULATE MATTER*

AEP has commented that coal fired EGUs have some of the highest efficiency on particulate matter. It recommended that TCEQ drop the requirement in the proposed rule for EGUs to perform source level

modeling to assess the visibility impact and subsequent engineering analysis of primary particulate matter from BART eligible sources.

**The commission will not allow sources to eliminate source level modeling for EGUs based on controls in place. Many other source categories also have controls in place. The commission will keep the modeling requirement for all potentially BART-eligible sources to either assess the potential visibility using protocols outlined by the TCEQ or continue directly with an engineering analysis. If a source models its visibility impacts below the threshold of 0.5 deciview, no further analysis will be required. Additionally, as described in the EPA BART rule, the analysis of control options step allows the source to take into consideration any controls in use at a particular unit. Other considerations include the assessment of available retrofit control options, costs of compliance with control, remaining useful life of the facility, and energy and non-air quality environmental impacts of control options. No changes to the rule were made in response to this comment.**

Ash Grove, Dow, El Paso Electric, and TCC noted that the preamble to the proposal stated that PM<sub>10</sub> may be used as the indicator for PM when assessing BART-eligibility. TCC seeks clarification regarding how PM<sub>10</sub> can be used as an indicator for PM when assessing BART eligibility considering the exemption in §116.1510(c)(3). This exemption states that any BART-eligible source that has a potential to emit (PTE) of less than 15 tpy of PM<sub>10</sub> is not subject to BART for PM<sub>10</sub>. TCC asked, when evaluating the definition of a BART-eligible source, whether it is necessary to determine both the potential to emit for PM and PM<sub>10</sub> and then compare both to the 250 tpy criteria.

**The commission notes that Appendix Y to CFR, Part 51, the federal BART guidelines incorporated by reference in this rule, provides that a source may use PM<sub>10</sub> as an indicator for PM when comparing it to the 250 tpy cutoff for BART eligibility. Section 116.1510 contains pollutant-specific exemptions to BART control analysis and implementation requirements. Section 116.1510(c)(3) reflects the commission's decision to include in the rule the *de minimis* levels established by EPA under CFR, Part 51, Appendix Y. EPA specifically established the 15 tpy level for PM<sub>10</sub>.**

#### *PUBLIC RECORDS*

Houston Sierra Club commented that the public should have access to the records that an owner or operator must maintain under §116.1510(c), to demonstrate compliance with applicable exemption criteria. Houston Sierra Club commented that the public has the right to see and obtain a copy of the documents that are the basis for the exemption that was granted by TCEQ. This right of public access to these documents should be written into the rules.

**No changes are made in response to this comment. Section 116.1510(c) provides three ways for smaller sources to be exempted from BART requirements due to their relatively low emission rates. The broadest exemption is the *de minimis* exemption in §116.1510(c)(3). Hundreds of sources may meet this *de minimis* exemption. Since hundreds of sources may meet this exemption, it is not practical for the commission to collect and retain information on these *de minimis* sources.**

**The other exemptions, in §116.1510(c)(1) and (2), are based on permit limits and distance information that is already on file at the commission and available for public review.**

*MODELING DISTANCES*

The Houston Sierra Club commented that in the rule, the distances 31.05 and 62.1 miles appear to be too close to Big Bend and Guadalupe to not have an influence. Houston Sierra Club recommends that greater distances be required before the exemption is allowed.

**The commission disagrees with the commenter. The distances that the commenter is referring to are based on the model plants that the EPA developed for 40 CFR Part 51, Appendix Y. There are two model plant exemptions adopted as §116.1510(c)(1) and (2), respectively. The EPA concluded that sources meeting the stated criteria for emissions and distance from Class I areas are unlikely to have a significant effect on visibility. The commission agrees with EPA's assertion. The exemptions in §116.1510(c)(1) and (2) are pollutant specific for NO<sub>x</sub> and SO<sub>2</sub>, such that the owner or operator of the source would still be required to perform the BART engineering analysis and implement any applicable BART controls for other visibility-impairing pollutants (such as PM). No changes have been made to the rule.**

*CAIR EQUALS BART*

AECT and TXU strongly concur with proposed §116.1510(d), which would provide that EGUs that are participating in the CAIR cap and trade program will not be subject to BART analysis or control requirements for NO<sub>x</sub> and SO<sub>2</sub>.

**The commission thanks the commenters for their support.**

AECT, El Paso Electric, and TXU commented that the proposed rule be revised to exclude PM<sub>10</sub> from the consideration of BART-eligibility for EGUs participating in the CAIR trading program.

**The rule has not been revised in response to these comments. CAIR controls only NO<sub>x</sub> and SO<sub>2</sub>, and not direct PM. Therefore, CAIR will not cover PM for BART. EPA has stated that BART applies to individual sources for PM if the PM emissions are above *de minimis* levels (i.e., PTE of 15 tpy) and the impact from the BART-eligible units at the source causes or contributes to visibility impairment. PM that is associated with determining BART-eligibility are direct emissions of PM, not the precursors, therefore they must be considered in determining BART eligibility for all potential BART sources, including EGUs.**

The Houston Sierra Club commented that under the TCEQ's Draft Final Modeling Protocol, Screening Analysis of Potentially BART-Eligible Sources in Texas on pages 1-6 and 4-1, the Houston Sierra Club does not agree with EPA that complying with CAIR will necessarily result in sufficient SO<sub>2</sub> and NO<sub>x</sub> reductions to meet the regional haze visibility requirements.

**The rule has not been revised in response to this comment. The commission has taken the option of using EPA's guidance that allows states to utilize the CAIR cap and trade programs as a means to satisfy BART for affected EGUs. The TCEQ has determined that CAIR will satisfy the BART**

**requirements for NO<sub>x</sub> and SO<sub>2</sub> emissions for EGUs participating in the CAIR program. However, EPA requires that each state set reasonable progress goals as provided by the Regional Haze Rule and cannot assume that CAIR will satisfy all of its visibility related obligations.**

Arkema also commented that CAIR should not equate to BART for EGUs. Their concern regarding CAIR is that individual sources that participate may either reduce emissions to meet a limit or purchase allowances to comply with the CAIR rule, and there is not a mechanism to ensure that an individual member of a cap and trade system that has a significant impact on a Class I area is required to reduce emissions. The purchase of CAIR allowances could allow EGUs to shift their BART compliance burden to smaller, more expensive to control, sources, such as Arkema's Houston facility. Arkema advocates applying emission controls to meet agency visibility and attainment goals to the sources that can do so in the most cost-effective manner, however using an unrelated trading program to shift a regulatory burden to smaller entities should not be allowed under this proposal.

**The rules have not been revised in response to this comment. The commission has taken the option of using EPA's guidance that allows states to utilize the CAIR cap and trade programs as a means to satisfy BART for affected EGUs. CAIR controls NO<sub>x</sub> and SO<sub>2</sub> and not direct PM. However, CAIR will not cover PM for BART, and EGUs that meet the individual source PM emissions and are above *de minimis* levels (i.e., PTE of 15 tpy) will be required to do a BART-eligible analysis on their units to determine if the source causes or contributes to visibility impairment of Class I areas. In addition to BART, the EPA requires that each state set**

**reasonable progress goals as provided by the Regional Haze Rule and cannot assume that CAIR will satisfy all of its visibility related obligations.**

*CUMULATIVE IMPACT*

Houston Sierra Clubs does not understand how the TCEQ will account for the cumulative impacts that many exempted sources plus non-exempted sources will have on visibility. There should be some type of cumulative effects analysis in the rules that ensures that exempted and area sources do not lead to delays in reducing visibility obscuring pollutants or cause a failure to meet visibility time frames.

**The commission understands the commenter's concern. The BART rule does not require a cumulative analysis, but a cumulative analysis is required for the Regional Haze SIP, of which BART is just a piece. The CENRAP modeling for regional haze will take into account the reductions and includes all the point, area, and mobile sources in the United States and parts of Canada and Mexico. CAMx and CMAQ will be the modeling platforms used to look at the cumulative effect of BART reductions.**

*BART ANALYSIS CLARIFICATION*

NPS supports continuing the inclusion of all sources of particulate matter in the BART analyses.

**The commission agrees to include all BART sources in PM modeling that meet the EPA criteria. EGUs and non-EGUs were included in the PM modeling. No change has been made to the rule.**

Alcoa commented that the requirement to conduct an analysis of emissions control alternatives for all visibility impairing pollutants at §116.1520(a) should be revised. Alcoa commented that as proposed, an analysis is required by BART-eligible sources, as opposed to sources determined to be subject to BART. Alcoa recommended the proposed language be revised to state: *(a) Except as provided under section 116.1510(b), (c), or (d) of this title (relating to Applicability and Exemption Requirements), each BART-eligible source that is subject to BART shall conduct an analysis of emissions control alternatives for visibility-impairing pollutants determined to be causing or contributing to visibility impairment in a Class I area.*

**The change recommended by Alcoa is not necessary because sources that are not subject to BART are already covered by the reference to §116.1510(b). Section 116.1510(b) is the mechanism by which sources demonstrate that they are not subject to BART. No changes were made in response to this comment.**

Arkema commented that TCEQ should finalize proposed minimum emission thresholds. The commenter supports exemptions limiting applicability to the BART analysis to be required in the proposal. The commenter agrees that TCEQ limit the impact of the proposed BART regulations to those facilities that are more likely to have significant impact on Class I area visibility, while not burdening smaller facilities with no identifiable impact on visibility. The commenter expressed that the proposed emissions/distance (Q/D) relationships are appropriate.

**The commission appreciates the support of the commenter. CAMx screening modeling by TCEQ has exempted many of the smaller sources. Model plants have been developed for exempting more sources. Even though there is no *de minimis* size on individual units, a source can group its smaller emission units into a pseudo-source for CALPUFF. No changes were made in response to the comment.**

*BART CONTROL IMPLEMENTATION*

No comments were made concerning §116.1540.

*MISCELLANEOUS*

Houston Sierra Club is concerned that the Regional Haze SIP does not show sufficient visibility air pollutant reductions due to transboundary emissions from other states. There apparently is no guidance or direction from EPA about how attainment will be obtained in such cases. Houston Sierra Club agrees that each state must reduce its share of visibility air pollutants for its own state's Regional Haze SIP. Houston Sierra Club agrees that when one state affects the attainment of the Regional Haze SIP of a second state then the first state must reduce its visibility air pollutants to assist in attainment of the Regional Haze SIP of the second state.

**The issues the commenter raises deal with the Regional Haze SIP rather than the BART rule. No changes were made to the rule.**

Lehigh Cement asked for an extension of the comment period to October 9, 2006.

**The commission agreed. It extended the comment period from September 25, 2006, to October 9, 2006. A notice in the *Texas Register* and an e-mail to the entire BART list serve announced this change.**

Houston Sierra Club does not understand why the BART rule was not released with the SIP, since both are usually released together. The public was not able to cross-reference both documents and determine whether the rules adequately implement the SIP. The public needs both documents to review, comment on, and understand. Houston Sierra Club understands that late in 2007 the Regional Haze SIP will be released and the BART is part of that package. However, by that time the engineering analysis and modeling will be complete and the public will have lost an opportunity to compare the rules and SIP before implementation of BART analyses.

**The reason for adopting the BART rule before proposing the Regional Haze SIP is that BART analyses will be part of the SIP. The companies required to carry out BART analyses need time to prepare the analyses. EPA is requiring BART information in the SIP. In Texas, the SIP requires the BART rule promulgation to collect the appropriate industry information for the SIP package. The public will have a chance to view the BART information during the SIP proposal period and make comments. No changes will be made to the rule.**

**SUBCHAPTER M: BEST AVAILABLE RETROFIT TECHNOLOGY (BART)**

**§§116.1500, 116.1510, 116.1520, 116.1530, 116.1540**

**STATUTORY AUTHORITY**

These new sections are adopted under Texas Water Code (TWC), §5.103, concerning Rules, and §5.105, concerning General Policy, which authorize the commission to adopt rules necessary to carry out its powers and duties under the TWC and other laws of the state. The new sections are also adopted under Texas Health and Safety Code (THSC), §382.002, concerning Policy and Purpose, which establishes the commission's purpose to safeguard the state's air resources, consistent with the protection of public health, general welfare, and physical property, including the esthetic enjoyment of air resources by the public and maintenance of adequate visibility; §382.011, concerning General Powers and Duties, which authorizes the commission to establish and control the level of quality to be maintained in the state's air; §382.012, concerning State Air Control Plan, which authorizes the commission to prepare and develop a comprehensive plan for the control of the state's air; §382.017, concerning Rules, which authorizes the commission to adopt rules consistent with the policy and purpose of the Texas Clean Air Act (TCAA); and §382.051, concerning Permitting Authority of Commission; Rules, which authorizes the commission to issue permits to construct new facilities or modify existing facilities that may emit air contaminants, or to operate a federal source, and to adopt rules as necessary to comply with changes in federal law or regulations applicable to permits issued under the TCAA.

The adopted new sections implement TWC, §5.103 and §5.105; and THSC, §§382.002, 382.011, 382.012, 382.017, and 382.051.

**§116.1500. Definitions.**

The following terms, when used in this subchapter, have the following meanings unless the context clearly indicates otherwise. For terms not defined in this section, the definitions contained in 40 Code of Federal Regulations (CFR) §51.301, as effective August 30, 1999, are incorporated by reference.

(1) **Best available retrofit technology (BART)-eligible source**--Any emissions units that comprise any of the following stationary sources of air pollutants, including any reconstructed source, that were not in operation prior to August 7, 1962, and were in existence on August 7, 1977, and collectively have the potential to emit 250 tons per year (including fugitive emissions, to the extent quantifiable) of any visibility-impairing air pollutant:

(A) fossil fuel-fired steam electric plants of more than 250 million British thermal units (BTU) per hour heat input;

(B) coal-cleaning plants (thermal dryers);

(C) kraft pulp mills;

(D) portland cement plants;

(E) primary zinc smelters;

(F) iron and steel mill plants;

(G) primary aluminum ore reduction plants;

(H) primary copper smelters;

(I) municipal incinerators capable of charging more than 250 tons of refuse per  
day;

(J) hydrofluoric, sulfuric, and nitric acid plants;

(K) petroleum refineries;

(L) lime plants;

(M) phosphate rock processing plants;

(N) coke oven batteries;

(O) sulfur recovery plants;

(P) carbon black plants (furnace process);

(Q) primary lead smelters;

(R) fuel conversion plants;

(S) sintering plants;

(T) secondary metal production facilities;

(U) chemical process plants;

(V) fossil fuel-fired boilers of more than 250 million BTUs per hour heat

input;

(W) petroleum storage and transfer facilities with capacity exceeding 300,000

barrels;

(X) taconite ore processing facilities;

(Y) glass fiber processing plants; and

(Z) charcoal production facilities.

(2) **Visibility-impairing air pollutant**--Any of the following: nitrogen oxides, sulfur dioxide, or particulate matter.

**§116.1510. Applicability and Exemption Requirements.**

(a) The requirements of this subchapter apply to best available retrofit technology (BART)-eligible sources as defined in §116.1500 of this title (relating to Definitions).

(b) The owner or operator of a BART-eligible source may demonstrate, using a model and modeling guidelines approved by the executive director, that the source does not contribute to visibility impairment at a Class I area. A BART-eligible source that does not contribute to visibility impairment at any Class I area is not subject to the requirements of §116.1520 or §116.1530 of this title (relating to Best Available Retrofit Technology (BART) Analysis and Best Available Retrofit Technology (BART) Control Implementation). A source is considered to not contribute to visibility impairment if, as demonstrated by modeling performed by the executive director or performed in accordance with the guidelines approved by the executive director, it causes a visibility impairment of less than 0.5 deciviews at all Class I areas. The modeling demonstration must be submitted under seal of a Texas

licensed professional engineer and must be received by the commission's Air Permits Division no later than April 30, 2007.

(c) The following BART-eligible sources are not subject to the requirements of §116.1520 or §116.1530 of this title for the indicated pollutant(s). Owners or operators claiming exemption under this subsection shall maintain records sufficient to demonstrate compliance with the exemption criteria, and shall make such records available upon request of personnel from the commission or any local air pollution control agency having jurisdiction.

(1) Any BART-eligible source that has the potential to emit less than 500 tons per year of combined nitrogen oxides ( $\text{NO}_x$ ) and sulfur dioxide ( $\text{SO}_2$ ) and that is located more than 50 kilometers from any Class I area is not subject to BART for  $\text{NO}_x$  and  $\text{SO}_2$ .

(2) Any BART-eligible source that has the potential to emit less than 1,000 tons per year of combined  $\text{NO}_x$  and  $\text{SO}_2$  and that is located more than 100 kilometers from any Class I area is not subject to BART for  $\text{NO}_x$  and  $\text{SO}_2$ .

(3) Any BART-eligible source that has the potential to emit less than 40 tons per year of  $\text{NO}_x$  or 40 tons per year of  $\text{SO}_2$  is not subject to BART for  $\text{NO}_x$  or  $\text{SO}_2$ , respectively. Any BART-eligible source that has the potential to emit less than 15 tons per year of particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers ( $\text{PM}_{10}$ ) is not subject to BART for  $\text{PM}_{10}$ .

(d) BART-eligible electric generating units participating in the Clean Air Interstate Rule Trading Program are not subject to the requirements of §116.1520 or §116.1530 of this title for NO<sub>x</sub> and SO<sub>2</sub>.

(e) Any BART-eligible source that has been screened out by the Texas Commission on Environmental Quality-conducted screening modeling is not subject to the requirements of §116.1520 or §116.1530 of this title, for the specified pollutant(s), if the owner or operator has reviewed the modeling inputs for that source and the executive director receives written certification that the inputs are correct no later than February 28, 2007.

**§116.1520. Best Available Retrofit Technology (BART) Analysis.**

(a) Except as provided under §116.1510(b), (c), or (d) of this title (relating to Applicability and Exemption Requirements), each best available retrofit technology (BART)-eligible source shall conduct an analysis of emissions control alternatives for all visibility-impairing pollutants. This analysis must include the identification of all available, technically feasible retrofit technologies, and for each technology identified, an analysis of the cost of compliance, the energy and non-air quality environmental impacts, the degree of visibility improvement in affected Class I areas resulting from the use of the control technology, the remaining useful life of the source, and any existing control technology present at the source. Based on this analysis, the owner or operator shall identify an emission control strategy as the prospective BART control strategy for the source. The determination

of BART must be made according to 40 Code of Federal Regulations Part 51, Appendix Y, as effective September 6, 2005.

(b) As part of the BART analysis required in subsection (a) of this section, the owner or operator shall include detailed information documenting the projected hourly and annual emission limits for the selected BART control strategy.

(c) The owner or operator of each BART-eligible source shall submit a completed BART analysis to the commission's Air Permits Division under seal of a Texas licensed professional engineer. The completed BART analysis must be received by the commission's Air Permits Division no later than April 30, 2007.

**§116.1530. Best Available Retrofit Technology (BART) Control Implementation.**

(a) Each owner or operator of a best available retrofit technology (BART)-eligible source shall install and operate BART-required control equipment no later than five years after the United States Environmental Protection Agency has approved a Regional Haze State Implementation Plan for the State of Texas. Each owner or operator shall maintain the BART-required control equipment and establish procedures to ensure such equipment is properly and continuously operated and maintained.

(b) Prior to any installation of BART-required control equipment, each owner or operator of a BART-eligible source shall comply with the requirements under Subchapter B of this chapter (relating

to New Source Review Permits), Subchapter F of this chapter (relating to Standard Permits) or Subchapter H of this chapter (relating to Permits for Grandfathered Facilities) as applicable to authorize the construction or modification and to establish emission limitations of BART.

**§116.1540. Exemption from Best Available Retrofit Technology (BART) Control Implementation.**

The owner or operator of any best available retrofit technology (BART)-eligible source may apply for an exemption from the requirement to install, operate, and maintain BART-required control equipment, pursuant to the provisions of 40 Code of Federal Regulations §51.303. Any exemption request under this section requires initial approval from the executive director and final approval from the administrator of the United States Environmental Protection Agency (EPA). Exemption requests submitted to the EPA must be accompanied by written concurrence from the executive director.