The EPA Administrator, Gina McCarthy, signed this final rule on 1/13/17, and EPA is submitting it for publication in the *Federal Register* (FR). While we have taken steps to ensure the accuracy of this Internet version of the rule, it is not the official version of the rule. Please refer to the official version in a forthcoming FR publication, which will appear on the Government Printing Office's FDsys website (http://fdsys.gpo.gov/fdsys/search/home.action) and on Regulations.gov (http://www.regulations.gov) in Docket No. EPA-R09-OAR-2016-0339. Once the official version of this document is published in the FR, this version will be removed from the Internet and replaced with a link to the official version.

6560-50-P

#### **ENVIRONMENTAL PROTECTION AGENCY**

#### 40 CFR Part 49

#### [EPA-R09-OAR-2016-0339; FRL-XXX]

#### **Revisions to the Source-Specific Federal Implementation Plan for Four Corners Power**

#### **Plant, Navajo Nation**

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

ACTION: Final rule.

**SUMMARY:** The Environmental Protection Agency (EPA) is finalizing limited revisions to the source-specific Federal Implementation Plan (FIP) that was promulgated to regulate air pollutant emissions from the Four Corners Power Plant (FCPP), a coal-fired power plant located on the reservation lands of the Navajo Nation, near Farmington, New Mexico. These revisions make certain provisions of the FIP consistent with national actions and rulemakings promulgated since 2012; update the FIP to reflect recent operating changes; and add new provisions to the FIP to include the air pollution control requirements for FCPP in a Consent Decree entered in the United States District Court for the District of New Mexico on August 17, 2015.

DATES: This rule is effective on [INSERT DATE 30 DAYS AFTER PUBLICATION IN THE FEDERAL REGISTER].

**ADDRESSES:** The EPA has established a docket for this action, identified by Docket ID number EPA-R09-OAR-2016-0339, at *http://www.regulations.gov*. The index to the docket is available electronically at <u>http://www.regulations.gov</u> or in hard copy at the EPA Region IX office, 75 Hawthorne Street, San Francisco, California. While all documents in the docket are listed in the index, some information may be publicly available only at the hard copy location

(e.g., copyrighted material), and some may not be publicly available in either location (e.g.,

confidential business information). To inspect the hard copy materials, please schedule an

appointment during normal business hours with the contact listed below.

## FOR FURTHER INFORMATION CONTACT: Anita Lee, EPA Region IX, (415) 972-3958,

lee.anita@epa.gov.

SUPPLEMENTARY INFORMATION: Throughout this document, "we," "us" and "our"

refer to the EPA.

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I. Background

- II. Summary of Proposed Action
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## I. Background

FCPP is a coal-fired power plant located on the Navajo Nation Indian Reservation, just west of Farmington, New Mexico. It is co-owned by several entities and operated by Arizona Public Service (APS).<sup>1</sup> Air pollutant emissions from FCPP are regulated in a FIP that includes emission limitations for particulate matter (PM), sulfur dioxide (SO<sub>2</sub>) and oxides of nitrogen (NO<sub>X</sub>) that the EPA promulgated in 2007, and emission limitations for NO<sub>X</sub> that were promulgated in 2012 to meet the Best Available Retrofit Technology (BART) requirements of

<sup>&</sup>lt;sup>1</sup> FCPP is currently co-owned by Arizona Public Service, Public Service Company of New Mexico, Salt River Project, and Tucson Electric Power.

the Regional Haze Rule.<sup>2</sup> The 2007 and 2012 emission limitations are codified in the Code of Federal Regulations (CFR) at 40 CFR 49.5512, and we refer collectively to the provisions from the 2007 and 2012 actions as the "FIP" or the "FCPP FIP."

On December 2, 2016, the EPA proposed limited revisions to the FIP for FCPP.<sup>3</sup> The EPA proposed the revisions to: (1) make certain provisions in the FIP consistent with national actions and rulemakings promulgated since 2012; (2) update the FIP to reflect recent operating changes; and (3) add new provisions to the FIP to include the air pollution control requirements for FCPP in a Consent Decree ("Consent Decree") entered in the United States District Court for the District of New Mexico on August 17, 2015.<sup>4</sup>

For more detailed information on FCPP, the attainment status of the area, the EPA's authority to promulgate a FIP in Indian country, and a historical overview of the FIP actions for FCPP, please see the proposed rule for this action.<sup>5</sup>

#### **II. Summary of Proposed Action**

As discussed in our proposed rule, the EPA is exercising its discretionary authority under sections 301(a) and 301(d)(4) of the Clean Air Act (CAA or "Act") and 40 CFR 49.11(a). The EPA proposed to find that it is "necessary or appropriate" to revise the FCPP FIP because it contains certain provisions that are inconsistent with more recent actions and rulemakings promulgated by the EPA. The revisions that we are now finalizing also improve the enforceability of the FIP.

<sup>&</sup>lt;sup>2</sup> See 72 FR 25698 (May 7, 2007) and 77 FR 51620 (August 24, 2012).

<sup>&</sup>lt;sup>3</sup> See 81 FR 86988 (December 2, 2016).

<sup>&</sup>lt;sup>4</sup> See Consent Decree for *Dine CARE v. Arizona Public Service Company* and *EPA v. Arizona Public Service Company*, US District Court for the District of New Mexico, Case No. 1:11-cv-00889-JB-SCY (August 17, 2015). <sup>5</sup> See 81 FR 86988 (December 2, 2016).

To update the FCPP FIP, we proposed to remove emission limitation exemptions that had applied during periods of startup and shutdown, and proposed to remove a provision allowing for an affirmative defense applicable to excess emissions during periods of malfunctions. These revisions will make the FCPP FIP consistent with the EPA's interpretations of CAA requirements, as reflected in the Agency's recent action concerning how provisions in state implementation plans (SIPs) treat excess emissions during startup, shutdown, and malfunctions ("2015 SSM Action").<sup>6</sup>

The EPA also proposed to update the testing requirements for PM in the FCPP FIP to be consistent with the PM testing requirements promulgated nationally in the New Source Performance Standard for Electric Generating Units (NSPS for EGUs) and the Mercury and Air Toxics Standards (MATS) Rule.<sup>7</sup> The revisions to the PM testing requirements that we are finalizing will increase the frequency of PM testing in the FIP to match the frequency in the MATS Rule, allow APS the option to demonstrate compliance with its PM emission limitation of 0.015 pound per million British thermal unit (lb/MMBtu) using alternative methods, *e.g.*, PM continuous emission monitoring systems (PM CEMS), and streamline the existing PM testing requirements. In addition, consistent with the NSPS for EGUs, the EPA proposed to revise the FIP so that the opacity standard would not apply if APS elects to use the PM CEMS to demonstrate compliance, because the PM emission limitation in the FIP is sufficiently stringent (*i.e.*, 0.030 lb/MMBtu or lower) and the use of PM CEMS would provide robust monitoring of PM emissions that obviates the need for an opacity standard.<sup>8</sup> In addition, we proposed revisions

<sup>&</sup>lt;sup>6</sup> See 80 FR 33840 (June 12, 2015). See also, NRDC v. EPA, 749 F.3d 1055 (D.C. Cir. 2014).

<sup>&</sup>lt;sup>7</sup> See 77 FR 9303 (February 16, 2012) and 81 FR 20172 (April 6, 2016) (Final Technical Corrections).

<sup>&</sup>lt;sup>8</sup> See NSPS for EGUs at 40 CFR part 60 subpart Da at 60.42Da(b). Subpart Da to part 60 is the "Standard of Performance for Electric Utility Steam Generating Units" and applies to units that are capable of combusting more than 73 MW heat input of fossil fuel and for which construction, modification, or reconstruction commenced after September 18, 1978. The units at FCPP were constructed prior to 1978 and are not subject to part 60 subpart Da. *See* also 2015 SSM Action at 80 FR 33840 at 33891 and 33892 (June 12, 2015), stating that "States evaluating how best

to the opacity monitoring requirements that would apply if APS does not elect to demonstrate compliance with its PM emission limitation using its PM CEMS. Currently, FCPP uses continuous opacity monitoring systems (COMS) to demonstrate compliance with the opacity standard. Under certain operating conditions, condensed water vapor in the stacks may be present in the stack gas; these saturated stack conditions interfere with the accuracy of the COMS. <sup>9</sup> To address this issue of water vapor, we proposed to add three options for demonstrating compliance with the opacity standard that are consistent with the NSPS for EGUs and the MATS Rule. We proposed that APS would be required to demonstrate compliance with the opacity standard using any of the three following options: use COMS during dry stack conditions and visible emission (VE) performance testing during of the duration of saturated stack conditions; install and operate a continuous parametric monitoring system (CPMS) supplemented with periodic VE performance testing; or install and operate a bag leak detection system supplemented with periodic VE performance testing.<sup>10</sup>

Finally, the EPA proposed changes to update the FIP to reflect current operation of FCPP, including removing provisions related to Units 1, 2, and 3, which APS retired in 2014, and adding new SO<sub>2</sub>, NO<sub>X</sub>, and PM emission limitations applicable to Units 4 and 5 from the

to replace impermissible SSM exemptions from opacity standards may wish to consider a similar approach conditioned upon the use of PM CEMS and a sufficiently stringent PM emission limitation," and footnote 148, which indicates that 0.030 lb/MMBtu is deemed sufficiently stringent because the contribution of filterable PM to opacity at PM levels of 0.030 lb/MMBtu or less is generally negligible and that those units will therefore operate with little or no visible emissions (*i.e.*, less than 5 percent opacity).

<sup>&</sup>lt;sup>9</sup> See e.g., Final Rule on quality assurance procedures for COMS at 79 FR 28439 (May 16, 2014), stating at 28442: "Opacity cannot be measured accurately in the presence of condensed water vapor." Typically, the stacks at FCPP are dry but they occasionally experience short periods of saturated stacks during process upsets (*i.e.*, malfunctions). As required in the Consent Decree, by July 31, 2018, APS will modify the stacks and ductwork at FCPP to withstand saturated stack conditions. After this modification is complete, FCPP Units 4 and 5 may experience saturated stacks more frequently.

<sup>&</sup>lt;sup>10</sup> The EPA proposed these provisions at 40 CFR 49.5512(e)(6)(i), (ii), and (iii).

Consent Decree. For a more detailed discussion of all the revisions and the rationale for the proposed changes, please see the proposed rule.<sup>11</sup>

#### **III.** Public Comments and the EPA's Responses

The 30-day comment period for our proposed rule closed on January 3, 2017. We received 3 comment letters prior to the close of the comment period.<sup>12</sup> All comment letters we received were generally supportive of our proposed action. Two of the letters requested additional clarification or recommended additional revisions to the FCPP FIP. None of the comments we received objected to the removal of the provisions providing an affirmative defense for excess emissions as a result of malfunctions. Below, we provide summaries of the major comments we received and an abbreviated version of the EPA's responses to comments. For the full comment summaries and responses, please see the Response to Comments (RTC) document in the docket for this rulemaking.

*Comment 1*: A consortium of non-governmental organizations commented in support of the proposed revisions to the FCPP FIP and agreed with our assessment that the proposed revisions would strengthen the FIP. In particular, the commenters supported revision of the FIP to make it consistent the CAA requirements concerning emissions during SSM events, consistent with requirements of the MATS rule, and more stringent through inclusion of the requirements from the Consent Decree. The consortium encouraged the EPA to finalize the proposed revisions to the FCPP FIP.

Response 1: The EPA is taking final action on our proposed rule to revise the FCPP FIP.

<sup>&</sup>lt;sup>11</sup> See 81 FR 86988 at 86991-86996 (December 2, 2016). See also document titled "2016\_1118 FCPP FIP existing reg text RLSO" in the docket for this rulemaking.

<sup>&</sup>lt;sup>12</sup> See letter dated December 22, 2016, from Andrea Issod, Sierra Club Environmental Law Program, Dan Olson, San Juan Citizens Alliance, Erik Schlenker-Goodrich, Western Environmental Law Center, and Carol Davis, Dine Citizens Against Ruining our Environment, to Anita Lee, EPA; *see* letter dated December 29, 2016, from Donald Benn, Navajo Nation Environmental Protection Agency, to Anita Lee, EPA; *see* letter dated January 3, 2017 from Chas Spell, Arizona Public Service, to Gina McCarthy, EPA.

*Comment 2:* One commenter recommended several revisions to 40 CFR 49.5512(f) and some associated provisions to ensure that all notifications and similar documents that are required to be submitted to the EPA will also be submitted to the Director of the NNEPA.

*Response 2:* The EPA agrees with this comment. We had not intended to limit the dual notification requirement and we are finalizing revised language to ensure that all requests, reports, submittals, notifications, petitions, and other communications that must be submitted to the EPA Regional Administrator must also be submitted to the Director of the NNEPA.<sup>13</sup>

*Comment 3:* One commenter noted that the proposed revision to 40 CFR 49.5512(e)(3) did not specify to whom the notifications required in the paragraph should be sent.

*Response 3*: The EPA agrees with this comment. In this final action, the EPA is amending the relevant provision as recommended.

*Comment 4:* One commenter stated that the proposed dual notification requirement in 40 CFR 49.5512(k)(7) will be redundant to the notification requirements in paragraph (f) if the EPA revises paragraph (f) as discussed in Comment 2.

*Response 4*: The EPA agrees with this comment and is removing the proposed reporting requirement in paragraph (k)(7) in our final action.

*Comment 5:* One commenter recommended that the EPA revise the definition of PM in 40 CFR 49.5512(k)(1)(xvii) to include both filterable and condensable PM because paragraph (k)(5) requires annual source testing for both.

*Response 5*: The EPA disagrees with this comment. The definition of PM as proposed is consistent with the definition PM in the Consent Decree (Section III.40). However, we recognize

<sup>&</sup>lt;sup>13</sup> For clarity, we have included a document titled "FCPP FIP reg text RLSO for NFR.docx" in the docket for this rulemaking to indicate in red-line/strike-out text the changes to the original FCPP FIP that we are promulgating in this final rulemaking.

that using the term "PM" in the requirements to conduct stack tests for condensable PM in paragraph (k)(5)(v) may create confusion. Therefore, in this final action, the EPA is amending paragraph (k)(5)(v). Please refer to the RTC and revised regulatory text for additional details.

*Comment 6:* One commenter recommended that the EPA incorporate Section VII of the Consent Decree, entitled "Prohibition on Netting Credits or Offsets" into the FCPP FIP.

*Response* 6: We agree with this comment. These provisions were required in the Consent Decree and we are adding these provisions pertaining to the prohibition on netting credits and offsets to 40 CFR 49.5512(k)(7). Adding these provisions from the Consent Decree to the revised FIP will ensure continued enforceability after the Consent Decree is terminated.

*Comment 7*: One commenter disagreed with the EPA's proposed revisions to the opacity standard and monitoring requirements during saturated stack conditions in 40 CFR 49.5512(e). The commenter stated that if the baghouse is operating within its normal parameters and if the baghouse is not fully closed, and a high opacity reading occurs, monthly visible emissions (VE) performance testing is adequate to demonstrate compliance with the opacity standard.

*Response 7:* The EPA disagrees with this comment. For reasons discussed in more detail in our RTC, we are finalizing the provisions at 40 CFR 49.5512(e)(6)(i) to require APS to demonstrate compliance with the opacity standard with its existing COMS during dry stack conditions and with VE performance testing for the duration of the saturated stack conditions. This option under paragraph (e)(6)(i) will be available until APS completes its modification of its stacks as required by the Consent Decree by March 2018 and July 2018. After modifying each stack, APS can demonstrate compliance with the opacity standard at that stack by choosing one of 3 methods: (1) by operating its PM continuous emission monitoring system (PM CEMS) to demonstrate compliance with its 0.015 lb/MMBtu emission limitation, which will replace the requirement to comply with the opacity limitation; (2) by operating a CPMS and conducting periodic VE performance tests; or (3) by operating a bag leak detection system and conducting periodic VE performance tests. The revised testing provisions are consistent with the NSPS for EGUs. For the opacity standard at FCPP, the EPA concludes that each of these approaches would be sufficient for compliance demonstration and enforcement purposes. After modification of the stacks, APS must notify the EPA of its selected method and this method will be used for compliance demonstration and enforcement purposes thereafter.

*Comment 8:* One commenter requested that the EPA provide additional time, until March 31, and July 31, 2018, for APS to recertify the PM CEMS after completion of the conversion of Units 4 and 5 to wet stacks to be consistent with the requirements of the Consent Decree.

*Response 8*: The EPA partially agrees with this comment. For more detail, please refer to our RTC. The EPA proposed that the revisions to the FCPP FIP would apply upon the effective date of the final rule; however, we recognize that the operating conditions at FCPP will change following the conversion to wet stack conditions. Therefore, following conversion to wet stacks, the compliance dates for paragraphs (e)(3) and (e)(6) shall be March 31, 2018, for Unit 5 and July 31, 2018, for Unit 4.<sup>14</sup> This revision would allow APS to demonstrate compliance with the opacity standard (if applicable) using any of the options available under (e)(3) and (e)(6) immediately upon the effective date of the final rule, but would also establish a new compliance date after the conversion to wet stack conditions to provide time to recertify the PM CEMS (under paragraph (e)(6)). This revision is consistent with the Consent Decree because it does not change any compliance dates in the Consent Decree for the conversion to wet stack conditions required in 40 CFR 49.5512(k)(ii) and (iii). In addition,

<sup>&</sup>lt;sup>14</sup> The provisions in paragraph (k)(2) and (3) require the installation of SCR and conversion to wet stacks on Unit 5 by no later than March 31, 2018 and on Unit 4 by no later than July 31, 2018.

we are adding a provision under paragraph (e)(6) to require that APS notify the EPA, within 30 calendar days after the compliance dates for the wet stack conversion for each unit, of the option it chooses for demonstrating compliance with the opacity standard.

*Comment 9*: One commenter requested that the EPA provide additional discussion of a CPMS and how a non-certified PM CEMS could be approved as a CPMS.

*Response 9*: As discussed above and in our RTC, we proposed several options for demonstrating compliance with the PM emission limitation and the opacity standard, including a CPMS in accordance with the NSPS for EGUs and the MATS Rule. The EPA generally considers a PM CEMS to be approvable for use as a CPMS if it meets the requirements in the NSPS for EGUs and the MATS Rule even if it does not meet the performance specifications for PM CEMS.

*Comment 10*: One commenter requested that the EPA remove the requirement to conduct periodic VE performance tests in conjunction with a CPMS or a bag leak detection system.

*Response 10*: The EPA disagrees with this comment. As discussed in more detail in our RTC, the use of a bag leak detection system or CPMS does not replace the need for opacity monitoring. Periodic VE performance testing in conjunction with these measures is consistent with the NSPS for EGUs.

*Comment 11*: One commenter requested that the EPA amend 40 CFR 49.5512(e)(2) to provide additional flexibility for APS to use its  $SO_2$  CEMS for determining the  $SO_2$  concentration at the inlet to the FGD.

*Response 11*: The existing FIP limits  $SO_2$  emissions to 12.0 percent of the potential coal combustion concentration assuming all the sulfur in the coal is converted to  $SO_2$ . The proposed FIP revisions incorporate requirements of the Consent Decree to require a 95.0 percent  $SO_2$ 

removal efficiency demonstrated at the SO<sub>2</sub> CEMS outlet.<sup>15</sup> As discussed in more detail in the RTC, in this final action, the EPA is amending 40 CFR 49.5512(e)(2) as recommended by the commenter to allow APS to demonstrate compliance with the SO<sub>2</sub> removal efficiency requirement in paragraph (d)(1) using either the inlet SO<sub>2</sub> concentration determined by CEMS or the existing coal sampling requirement.

#### **IV. Summary of Final Action**

We are finalizing our proposal to find that it is necessary or appropriate to revise the FCPP FIP to ensure that the applicable regulations are consistent with national actions the EPA has taken since 2012, to conform the FIP to reflect current operations, include monitoring that demonstrates continuous compliance, and to update the FIP with provisions from the Consent Decree.

In today's final action, the EPA is removing from the FCPP FIP emission limit exemptions that applied during startup and shutdown and a provision that allowed an affirmative defense that APS could assert in the event of an enforcement action for violations that result from malfunctions. The EPA is also updating the testing requirements for PM in the FCPP FIP to be consistent with PM testing requirements promulgated nationally in the MATS Rule, and updating provisions related to the applicability of the opacity standard and monitoring that are consistent with the NSPS for EGUs and the MATS Rule. The revisions to the PM testing requirements will increase the frequency of PM testing in the FIP to match the MATS Rule, allow the operator the option to demonstrate compliance with the applicable PM emission limitation of 0.015 lb/MMBtu using alternative methods, *e.g.*, PM CEMS, and streamline the existing PM testing requirements. The revisions to the opacity requirements provide that the

<sup>&</sup>lt;sup>15</sup> See proposed FIP provisions for 40 CFR 49.5512(k)(3)(iii) and (v).

opacity standard would not apply if APS elects to use PM CEMS to demonstrate compliance with its PM emission limitation, because the PM emission limitation is sufficiently low (*i.e.*, 0.015 lb/MMBtu) and the use of PM CEMS would provide robust monitoring of PM emissions that obviates the need for an opacity standard. If APS does not elect to demonstrate compliance with its PM emission limitation using the PM CEMS, the EPA is finalizing revisions that impose alternative opacity monitoring requirements that are consistent with the NSPS for EGUs and MATS Rule.

To update the FIP to reflect the current operation of FCPP, we are adding a statement to the applicability section of the FIP to clarify that Units 1, 2 and 3 have been permanently retired, and to remove certain provisions related to Units 1, 2, and 3 from the FIP that are no longer applicable following the permanent retirement of those units.

The final changes in this rulemaking add new provisions to the FCPP FIP to include requirements from the Consent Decree entered in 2015. Generally, the Consent Decree requires greater emission reductions of  $SO_2$ ,  $NO_x$ , and PM by establishing lower emission limitations than the existing limitations in the FIP for these pollutants. For further details on additional minor revisions to our proposal, please refer to our RTC.

#### **V. Environmental Justice Considerations**

The FCPP is located on the reservations lands of the Navajo Nation, and the EPA recognizes there is significant community interest in the emissions and environmental effects of this facility. As discussed in our proposed rule, the revisions to the FCPP FIP will strengthen the FIP by removing emission limitation exemptions for periods of startup and shutdown, and by removing an affirmative defense applicable to excess emissions during malfunctions. The revised FIP also codifies more stringent emission limitations for SO<sub>2</sub>, NO<sub>X</sub>, and PM from the Consent

Decree. Additional revisions to the FCPP FIP include streamlining certain testing requirements to be consistent with national rulemakings promulgated since 2008 and removing requirements for units that have permanently ceased operation. These revisions will not relax any condition in the FCPP FIP and will make the FIP more stringent. Therefore, the EPA considers this proposed action to be beneficial for human and environmental health, and to have no potential disproportionately high and adverse effects on minority, low-income, or indigenous populations.

#### VI. Statutory and Executive Order Reviews

A. Executive Order 12866: Regulatory Planning and Review and Executive Order 13563: Improving Regulation and Regulatory Review

This action is not a "significant regulatory action" under the terms of Executive Order 12866 (58 FR 51735, October 4, 1993) and is therefore not subject to review under Executive Orders 12866 and 13563 (76 FR 3821, January 21, 2011). This rule applies to only one facility and is therefore not a rule of general applicability.

#### B. Paperwork Reduction Act (PRA)

This action does not impose an information collection burden under the provisions of the Paperwork Reduction Act, 44 U.S.C. 3501 et seq. This rule applies to only one facility. Therefore, its recordkeeping and reporting provisions do not constitute a "collection of information" as defined under 44 U.S.C. 3502(3) and 5 CFR 1320.3(c).

#### C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities. This action will not impose any requirements on small entities. Firms primarily engaged in the generation, transmission, and/or distribution of electric energy for sale are small if, including affiliates, the total electric output for the preceding fiscal year did not exceed four million megawatt-hours. Each of the owners of the facility (i.e., Arizona Public Service, Salt River Project, Tucson Electric Power, and El Paso Electric) affected by this rule exceed this threshold.

#### D. Unfunded Mandates Reform Act (UMRA)

This action does not contain an unfunded mandate of \$100 million or more as described in UMRA, 2 U.S.C. 1531-1538, and does not significantly or uniquely affect small governments. *E. Executive Order 13132: Federalism* 

This action does not have federalism implications. It will not have substantial direct effects on the states, on the relationship between the national government and the states, or on the distribution of power and responsibilities among the various levels of government. *F. Executive Order 13175: Consultation and Coordination with Indian Tribal Governments* 

This action does not have tribal implications, as specified in Executive Order 13175. Although this final action affects a facility located in Indian country, the limited revisions to existing provisions in the FCPP FIP, and the incorporation of provisions into the FIP from a Consent Decree, which has already undergone public review and was the subject of tribal consultation, will not have substantial direct effects on any Indian tribes, on the relationship between the federal government and Indian tribes, or on the distribution of power and responsibilities between the federal government and Indian tribes. Thus, Executive Order 13175 does not apply to this action. Finally, we also note that we have engaged in numerous discussions with the NNEPA during the development of the proposed and final rules.

G. Executive Order 13045: Protection of Children from Environmental Health Risks and Safety Risks

EPA interprets EO 13045 as applying only to those regulatory actions that concern health

or safety risks that EPA has reason to believe may disproportionately affect children, per the definition of "covered regulatory action" in section 2-202 of the Executive Order. This action is not subject to Executive Order 13045 because it does not concern an environmental health risk or safety risk.

H. Executive Order 13211: Actions Concerning Regulations That Significantly Affect Energy Supply, Distribution, or Use

This action is not subject to Executive Order 13211 because it is not a significant regulatory action under Executive Order 12866.

#### I. National Technology Transfer and Advancement Act

This action involves technical standards. The technical standards in this action are based on the technical standards used in other rulemakings promulgated by the EPA. We refer to the discussion of the technical standards and voluntary consensus standards in the final rule for 40 CFR part 60 subpart Da and 40 CFR part 63 subpart UUUUU at 77 FR 9304 at 9441 (February 16, 2012).

# J. Executive Order 12898: Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations

The EPA believes the human health or environmental risk addressed by this action will not have potential disproportionately high and adverse human health or environmental effects on minority, low-income or indigenous populations. The limited revisions to the FIP will strengthen requirements for periods of startup, shutdown, and malfunction and will not relax any other existing requirements. Additional revisions related to streamlining of PM testing and providing options for PM and opacity testing that are in accordance with other rulemakings from the EPA will not affect air quality in the area surrounding FCPP.

# K. Congressional Review Act (CRA)

The Congressional Review Act, 5 U.S.C. 801 et seq., as added by the Small Business Regulatory Enforcement Fairness Act of 1996, generally provides that before a rule may take effect, the agency promulgating the rule must submit a rule report, which includes a copy of the rule, to each House of the Congress and to the Comptroller General of the United States. Section 804 exempts from section 801 the following types of rules: (1) rules of particular applicability; (2) rules relating to agency management or personnel; and (3) rules of agency organization, procedure, or practice that do not substantially affect the rights or obligations of non-agency parties. 5 U.S.C. 804(3). EPA is not required to submit a rule report regarding this action under section 801 because this is a rule of particular applicability that only applies to a single named facility.

## L. Petitions for Judicial Review

Under section 307(b)(1) of the Clean Air Act, petitions for judicial review of this action must be filed in the United States Court of Appeals for the appropriate circuit by [**INSERT** 

## DATE 60 DAYS AFTER PUBLICATION IN THE FEDERAL REGISTER]. Filing a

petition for reconsideration by the Administrator of this final rule does not affect the finality of this rule for the purposes of judicial review nor does it extend the time within which a petition for judicial review may be filed, and shall not postpone the effectiveness of such rule or action. This action may not be challenged later in proceedings to enforce its requirements (see section 307(b)(2)). This document is a prepublication version, signed by the EPA Administrator, Gina McCarthy, on 1/13/17. We have taken steps to ensure the accuracy of this version, but it is not the official version.

# **Revisions to the Source-Specific Federal Implementation Plan for Four Corners Power**

# Plant, Navajo Nation

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#### List of Subjects in 40 CFR Part 49

Environmental protection, Administrative practice and procedure, Air pollution control, Incorporation by reference, Indians, Intergovernmental relations, Reporting and recordkeeping requirements, Startup shutdown and malfunction.

Dated: January 13, 2017.

/s/

Gina McCarthy,

Administrator.

Chapter I, title 40, of the Code of Federal Regulations is proposed to be amended as follows:

# PART 49 – INDIAN COUNTRY: AIR QUALITY PLANNING AND MANAGEMENT

1. The authority citation for part 49 continues to read as follows:

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

#### Subpart L – Implementation Plans for Tribes – Region IX

- 2. Section 49.5512 is amended by:
  - a. Revising paragraph (a);
  - b. Revising paragraph (c) introductory text;
  - c. Removing and reserving paragraph (c)(1);
  - d. Revising paragraph (c)(7);
  - e. Revising paragraph (c)(12);
  - f. Revising paragraph (c)(13);
  - g. Revising paragraph (d) introductory text;
  - h. Revising paragraph (d)(2);
  - i. Removing and reserving paragraph (d)(3);
  - j. Revising paragraph (d)(4);
  - k. Revising paragraph (d)(5);
  - 1. Revising paragraph (e) introductory text;
  - m. Revising paragraph (e)(1);
  - n. Revising paragraph (e)(2) introductory text;
  - o. Revising paragraph (e)(3);
  - p. Revising paragraph (e)(6);
  - q. Removing and reserving paragraph (e)(8);

- r. Revising paragraph (f) introductory text;
- s. Revising paragraph (f)(1);
- t. Revising paragraph (f)(3) introductory text;
- u. Revising paragraphs (f)(4)(i) introductory text, (f)(4)(i)(G) and (H) and (f)(4)(ii);
- v. Removing and reserving paragraphs (h)(2) and (3);
- w. Revising paragraph (i)(1);
- x. Revising paragraph (i)(2)(iii)(A); and
- y. Adding paragraph (k).

The text to read as follows:

# § 49.5512 Federal Implementation Plan Provisions for Four Corners Power Plant, Navajo Nation.

(a) Applicability. The provisions of this section shall apply to each owner or operator of the coal burning equipment designated as Units 1, 2, 3, 4, and 5 at the Four Corners Power Plant (the Plant) on the Navajo Nation Indian Reservation located in the Four Corners Interstate Air Quality Control Region (see 40 CFR 81.121). Units 1, 2, and 3 at the Four Corners Power Plant permanently ceased operation by January 1, 2014, pursuant to the requirements of paragraph (i)(3).

\* \* \* \* \*

(c) <u>Definitions</u>. For the purposes of paragraphs (a) - (j):

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(1) [Reserved]
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\* \* \* \* \*

(7) Malfunction means any sudden and unavoidable failure of air pollution control equipment or process equipment or of a process to operate in a normal or usual manner. \* \* \* \* \*

(12) Shutdown means the cessation of operation of any air pollution control equipment, process equipment, or process for any purpose. For Units 4 or 5, shutdown begins when the unit drops below 300 MW net load with the intent to remove the unit from service.
(13) Startup means the setting into operation of any air pollution control equipment, process equipment, or process for any purpose. For Units 4 or 5, startup ends when the unit reaches 400 MW net load.

\* \* \* \* \*

(d) <u>Emissions Standards and Control Measures</u>. The following emission limits shall apply at all times.

\* \* \* \* \*

(2) <u>Particulate Matter</u>. No owner or operator shall discharge or cause the discharge of particulate matter from any coal burning equipment into the atmosphere in excess of 0.050 pounds per million British thermal unit (lb/MMBtu) of heat input (higher heating value).

(3) [Reserved].

(4) <u>Opacity</u>. No owner or operator shall discharge or cause the discharge of emissions from the stacks of Units 4 and 5 into the atmosphere exhibiting greater than 20 percent opacity, averaged over any six (6) minute period, except for one six (6) minute period per hour of not more than 27 percent opacity. The opacity standard in this paragraph (d)(4) and associated requirements in paragraphs (e) and (f) to demonstrate compliance with the opacity standard shall not apply to any unit for which the owner or operator installs, calibrates, maintains, and operates particulate matter CEMS under paragraph (e)(3) to demonstrate compliance with its PM emission limitation in paragraph (i)(1).

(5) <u>Oxides of nitrogen</u>. No owner or operator shall discharge or cause the discharge of  $NO_X$  into the atmosphere in excess of the amounts specified below.

(i) 0.65 lb/MMBtu of heat input per unit averaged over any successive thirty (30) boiler operating-day period from Units 4 and 5;

(ii) 335,000 lb per 24-hour period when coal-burning equipment is operating, on a plant-wide basis; for each hour when coal-burning equipment is not operating, this limitation shall be reduced. If the unit which is not operating is Unit 1, 2, or 3, the limitation shall be reduced by 1,542 lb per hour for each unit which is not operating. If the unit which is not operating is Unit 4 or 5, the limitation shall be reduced by 4,667 lb per hour for each unit which is not operating.

(e) Testing and Monitoring. Compliance with the emissions limits set for  $SO_2$  and  $NO_X$  shall be determined by using data from a CEMS unless otherwise specified in paragraphs (e)(2) and (e)(4) of this section.

(1) The owner or operator shall maintain and operate CEMS for  $SO_2$ , NO or  $NO_x$ , and a diluent, and for Units 4 and 5 only, COMS, in accordance with 40 CFR 60.8 and 60.13, and appendix B of 40 CFR part 60. Completion of 40 CFR part 75 monitor certification requirements shall be deemed to satisfy the requirements under 40 CFR 60.8 and 60.13 and appendix B of part 60. The owner or operator shall comply with the quality assurance procedures for CEMS found in 40 CFR part 75, and all reports required thereunder shall be submitted to the Regional Administrator. The owner or operator shall provide the Regional Administrator notice in accordance with 40 CFR 75.61.

(2) <u>Sulfur Dioxide</u>. For the purpose of determining compliance with this section, the

sulfur dioxide inlet concentration (in lb/MMBtu) shall be calculated using the daily average percent sulfur and BTU content of coal combusted, or after the installation of the SO<sub>2</sub> and any diluent CEMS required under paragraph (k)(3)(v), compliance with the provisions of paragraph (k)(3)(vi). If the sulfur dioxide inlet concentration is calculated, the inlet sulfur concentration and Btu content shall be determined in accordance with American Society for Testing and Materials (ASTM) methods or any other method receiving prior approval from the Regional Administrator. A daily fuel sample shall be collected using the coal sampling tower conforming to the ASTM specifications. The analyses shall be done on the daily sample using ASTM methods or any other method receiving prior approval from the Regional Administrator.

\* \* \* \* \*

(3) The provisions of this paragraph (e)(3) shall apply on **[INSERT DATE 30 DAYS AFTER PUBLICATION IN THE** *FEDERAL* **REGISTER**]. Following modifications to Unit 4 and Unit 5 to withstand wet stack conditions required in paragraph (k)(ii) and (iii), the compliance date for this paragraph (e)(3) is no later than March 31, 2018 for Unit 5 and July 31, 2018 for Unit 4. To assure continuous compliance with the particulate matter limits in paragraphs (d)(2) and (i)(1), the owner or operator shall either conduct particulate matter testing in accordance with the testing specifications outlined in Table 5 of 40 CFR part 63 subpart UUUUU, or install, calibrate, operate, and maintain a continuous parametric monitoring system (CPMS) for that unit in accordance with 40 CFR part 63 subpart UUUUU, or install, calibrate, maintain, and operate particulate matter CEMS in accordance with 40 CFR part 63 subpart UUUUU. The owner or operator shall submit a written notification to the Regional Administrator, in accordance with paragraph (f), of intent to demonstrate compliance with this paragraph by using a CPMS or PM CEMS. This notification shall be sent at least 30 calendar days before the initial startup of the monitor for compliance determination purposes. The owner or operator may discontinue operation of the monitor and instead return to demonstration of compliance with this paragraph using quarterly PM testing by submitting written notification to the Regional Administrator, in accordance with paragraph (f), of such intent at least 30 calendar days before shutdown of the monitor for compliance determination purposes. Nothing in this paragraph replaces or supersedes the requirements for PM CEMS in the August 17, 2015 Consent Decree under paragraph (k).

(6) The provisions of this paragraph (e)(6) shall apply on **[INSERT DATE 30 DAYS FROM PUBLICATION IN THE** *FEDERAL REGISTER*]. By **[INSERT DATE 60 DAYS FROM PUBLICATION IN THE** *FEDERAL REGISTER*], the operator must notify the EPA of the option it chooses to demonstrate compliance with the opacity standard. Following modifications to Units 4 and 5 to wet stacks required in paragraph (k)(ii) and (iii), the compliance date for this paragraph (e)(6) is no later than March 31, 2018 for Unit 5 and July 31, 2018 for Unit 4. The option in paragraph (e)(6)(i) is available only until March 31, 2018 for Unit 5 and July 31, 2018 for Unit 4. For the period of time after the operator has completed modifications to wet stacks pursuant to paragraphs (k)(3)(ii) and (iii) but before the compliance dates in paragraphs (k)(3)(ii) and (iii) of March 31, 2018 for Unit 5 and July 31, 2018 for Unit 4, the operator may use either the provisions in paragraph (e)(6)(i) to demonstrate compliance with the opacity standard, except that the visible emission performance testing shall be conducted weekly instead of for the duration of the saturated stack condition; or the provisions of paragraph (d)(4) so that the opacity standard does not apply except that the PM CEMS must demonstrate compliance with a PM emission limitation of 0.030 lb/MMBtu. By April 30, 2018 for Unit 5 and August 30, 2018 for Unit 4, the operator must notify the EPA of the option it chooses to demonstrate compliance with the opacity standard. If the opacity standard in paragraph (d)(4) applies, the owner or operator shall demonstrate compliance with the opacity standard using one of the following options:

(i) Operate Continuous Opacity Monitoring Systems (COMS) and maintain a set of opacity filters to be used as audit standards. Compliance with the opacity standard during periods of dry (unsaturated) stack conditions shall be determined using COMS. Compliance with the opacity standard during periods of wet (saturated) stack conditions shall be determined using visible emission performance testing specified in 40 CFR part 60 appendix A-4 Method 9 during the duration of the saturated stack condition, or

(ii) Install, calibrate, operate, and maintain a continuous parametric monitoring system (CPMS) for that unit in accordance with 40 CFR part 63 subpart UUUUU, including the requirements for the development of site-specific monitoring plans and recordkeeping and reporting; and conduct periodic performance testing of visible emissions using the procedures specified in paragraphs 40 CFR 60.49Da(a)(3), or (iii) monitor performance of the baghouses using a bag leak detection system in accordance with 40 CFR 60.48Da(o)(4), or an alternative bag leak detection system approved by the EPA, including requirements for the development of site-specific monitoring plans and recordkeeping and reporting; and conduct periodic performance of site-specific

testing of visible emissions using the procedures specified in paragraphs 40 CFR 60.49Da(a)(3).

\* \* \* \* \*

(8) [Reserved]

(f) <u>Reporting and Recordkeeping Requirements</u>. All requests, reports, submittals, notifications, petitions, and other communications to the Regional Administrator, Administrator, or EPA, required by this section and references therein, shall be submitted to the Director, Navajo Nation Environmental Protection Agency, P.O. Box 339, Window Rock, Arizona 86515, (928) 871-7692, (928) 871-7996 (facsimile); to the Regional Administrator, U.S. Environmental Protection Agency, Region IX, to the attention of Mail Code: ORA-1, at 75 Hawthorne Street, San Francisco, California 94105, (415) 947-8000. For each unit subject to the emissions limitation in this section and upon completion of the installation of CEMS and COMS as required in this section, the owner or operator shall comply with the following requirements:

(1) For each emissions limit in this section, comply with the notification and recordkeeping requirements for CEMS and COMS compliance monitoring in 40 CFR 60.7(c) and (d), and for visible emissions testing, if applicable under paragraph (e)(6), record and report results of the test in accordance with 40 CFR 60.7(d).

\* \* \* \* \*

(3) Furnish the Regional Administrator with reports describing the results of the particulate matter emissions tests postmarked within sixty (60) days of completing the tests. Each report shall include the following information:

\* \* \* \* \* \* (4) \* \* \* (i) For excess emissions, the owner or operator shall notify the RegionalAdministrator by telephone or in writing within one business day (initial notification).A complete written report of the incident shall be submitted within ten (10) workingdays of the initial notification. The complete written report shall include:

\* \* \* \* \*

(G) For an opacity exceedance, the 6-minute average opacity monitoring data or visible emission performance test results greater than 20 percent opacity for the 24 hours prior to and during the exceedance for Units 4 and 5; and(H) The efforts taken or being taken to minimize the excess emissions and to repair or otherwise bring the Plant into compliance with the applicable emissions limit(s) or other requirements.

(ii) If the period of excess emissions extends beyond the submittal of the written report, the owner or operator shall also notify the Regional Administrator in writing of the exact time and date when the excess emissions stopped. Compliance with the excess emissions notification provisions of this section shall not excuse or otherwise constitute a defense to any violations of this section or of any law or regulation which such excess emissions or malfunction may cause.

\* \* \* \* \* \* (i) \* \* \*

\*

(1) Particulate Matter from Units 4 and 5 shall be limited to 0.015 lb/MMBtu for each unit. Particulate matter testing shall be performed in accordance with paragraph (e)(3) of this section.

(2) \* \*

(iii) \* \* \*

(A) Within 4 years of the effective date of this rule, FCPP shall have installed add-on post-combustion  $NO_X$  controls on at least 750 MW (net) of generation to meet the interim emission limit in paragraph (i)(2)(ii) of this section.

\* \* \* \* \*

(k) Emission limitations from August 17, 2015 Consent Decree. The emission limitations and other requirements from this paragraph (k), originally contained in a Consent Decree filed on August 17, 2015 in the United States District Court for the District of New Mexico, are in addition to the requirements in paragraphs (a) through (j) of this section.

(1) <u>Definitions</u>. Every term expressly defined in this paragraph (k) shall have the meaning given that term herein. Every other term used in this paragraph (k) that is also a term used under the Act or in a federal regulation implementing the Act shall mean what such term means under the Act or those regulations.

(i) A "30-Day Rolling Average NO<sub>X</sub> Emission Rate" for a Unit shall be expressed in lb/MMBtu and calculated in accordance with the following procedure: first, sum the total pounds of NO<sub>X</sub> emitted from the Unit during the current Unit Operating Day and the previous twenty nine (29) Unit Operating Days; second, sum the total heat input to the Unit in MMBtu during the current Unit Operating Day and the previous twenty-nine (29) Unit Operating Days; and third, divide the total number of pounds of NO<sub>X</sub> emitted during the thirty (30) Unit Operating Days by the total heat input during the thirty (30) Unit Operating Days. A new 30-Day Rolling Average NO<sub>X</sub> Emission Rate shall be calculated for each new Unit Operating Day. Each 30-Day Rolling Average NO<sub>X</sub> Emission Rate shall include all emissions that occur during all periods within any Unit Operating Day, including emissions from startup, shutdown, and Malfunction.

(ii) A "30-Day Rolling Average SO<sub>2</sub> Removal Efficiency" means the percent reduction in the mass of  $SO_2$  achieved by a Unit's FGD system over a thirty (30) Unit Operating Day period and shall be calculated as follows: step one, sum the total pounds of SO<sub>2</sub> emitted as measured at the outlet of the FGD system for the Unit during the current Unit Operating Day and the previous twenty-nine (29) Unit Operating Days as measured at the outlet of the FGD system for that Unit; step two, sum the total pounds of SO<sub>2</sub> delivered to the inlet of the FGD system for the Unit during the current Unit Operating Day and the previous twenty-nine (29) Unit Operating Days as measured at the inlet to the FGD system for that Unit (this shall be calculated by measuring the ratio of the lb/MMBtu SO<sub>2</sub> inlet to the lb/MMBtu  $SO_2$  outlet and multiplying the outlet pounds of  $SO_2$  by that ratio); step three, subtract the outlet  $SO_2$  emissions calculated in step one from the inlet  $SO_2$ emissions calculated in step two; step four, divide the remainder calculated in step three by the inlet  $SO_2$  emissions calculated in step two; and step five, multiply the quotient calculated in step four by 100 to express as a percentage of removal efficiency. A new 30-Day Rolling Average SO<sub>2</sub> Removal Efficiency shall be calculated for each new Unit Operating Day, and shall include all emissions that occur during all periods within each Unit Operating Day, including emissions from startup, shutdown, and Malfunction.

(iii) "Annual Tonnage Limitation" means the limitation on the number of tons of the pollutant in question that may be emitted from FCPP during the relevant calendar year (*i.e.*, January 1 through December 31), and shall include all emissions of the pollutant emitted during periods of startup, shutdown and Malfunction. (iv) "Baghouse" means a full stream (fabric filter) particulate emissions control device.

(v) "Clean Air Act" and "the Act" mean the federal Clean Air Act, 42 USC 7401-7671q, and its implementing regulations.

(vi) "CEMS" and "Continuous Emission Monitoring System," mean, for obligations involving the monitoring of  $NO_X$  and  $SO_2$  emissions under this paragraph (k), the devices defined in 40 CFR 72.2, and the  $SO_2$  monitors required by this paragraph (k) for determining compliance with the 30-Day Rolling Average  $SO_2$  Removal Efficiency requirement set forth in this paragraph (k).

(vii) "Continuous Operation," "Continuously Operate," and "Continuously Operating" mean that when a pollution control technology or combustion control is required to be used at a Unit pursuant to this paragraph (k) (including, but not limited to, SCR, FGD, or Baghouse), it shall be operated at all times such Unit is in operation, consistent with the technological limitations, manufacturers' specifications, good engineering and maintenance practices, and good air pollution control practices for minimizing emissions (as defined in 40 CFR 60.11(d)) for such equipment and the Unit.

(viii) "Day" means calendar day unless otherwise specified in this paragraph (k).(ix) "Emission Rate" means, for a given pollutant, the number of pounds of that pollutant emitted per million British thermal units of heat input ("lb/MMBtu"), measured in accordance with this paragraph (k).

(x) "Flue Gas Desulfurization System" and "FGD" mean a pollution control device that employs flue gas desulfurization technology, including an absorber utilizing lime slurry, for the reduction of SO<sub>2</sub> emissions.

(xi) "Fossil Fuel" means any hydrocarbon fuel, including coal, petroleum coke, petroleum oil, or natural gas.

(xii) "lb/MMBtu" means one pound of a pollutant per million British thermal units of heat input.

(xiii) "Make-Right Vendor Guarantee" means, for an SCR, a guarantee offered by an SCR vendor that covers the SCR, including the catalyst, ammonia injection system, and support structure, under operating conditions (excluding any Malfunctions) above minimum operating temperature for the SCR, the achievement of which is demonstrated solely during two performance tests: one performance test no later than 90 Days after initial operation of the SCR, and one performance test after no fewer than 16,000 hours of SCR operation, but no later than December 31, 2020 regardless of the number of operating hours achieved. If the SCR does not meet the guarantee in one of these two performance tests, a Make-Right Vendor Guarantee requires the SCR vendor to repair, replace, or correct the SCR to meet the specified guaranteed Emission Rate, which is demonstrated by successful achievement of a performance test.

(xiv) "Malfunction" means any sudden, infrequent, and not reasonably preventable failure of air pollution control equipment, process equipment, or a process to operate in a normal or usual manner. Failures that are caused in part by poor maintenance or careless operation are not Malfunctions. (xv) "NO<sub>X</sub> Allowance" means an authorization or credit to emit a specified amount of NO<sub>X</sub> that is allocated or issued under an emissions trading or marketable permit program of any kind established under the Clean Air Act or an applicable implementation plan. Although no NO<sub>X</sub> Allowance program is applicable to FCPP as of the promulgation of this paragraph (k), this definition of "NO<sub>X</sub> Allowance" includes authorizations or credits that may be allocated or issued under emissions trading or marketable permit programs that may become applicable to FCPP in the future.

(xvi) "Operating Day" means any Day on which a Unit fires Fossil Fuel.

(xvii) "PM" means total filterable particulate matter, measured in accordance with the provisions of this paragraph (k).

(xviii) "PM CEMS" and "PM Continuous Emission Monitoring System" mean, for obligations involving the monitoring of PM emissions under this paragraph (k), the equipment that samples, analyzes, measures, and provides, by readings taken at frequent intervals, an electronic and/or paper record of PM emissions.

(xix) "Removal Efficiency" means, for a given pollutant, the percentage of that pollutant removed by the applicable emission control device, measured in accordance with the provisions of this paragraph (k).

(xx) "Selective Catalytic Reduction" and "SCR" mean a pollution control device that destroys  $NO_X$  by injecting a reducing agent (*e.g.*, ammonia) into the flue gas that, in the presence of a catalyst (*e.g.*, vanadium, titanium, or zeolite), converts  $NO_X$  into molecular nitrogen and water.

(xxi) "Semi-annual reports" are periodic reports that are submitted to EPA within

60 days after the end of each half of the calendar year.

(xxii) "SO<sub>2</sub> Allowance" means an authorization to emit a specified amount of SO<sub>2</sub> that is allocated or issued under an emissions trading or marketable permit program of any kind established under the Clean Air Act or an applicable implementation plan, including as defined at 42 USC 7651a(3).

(xxiii) "Surrender" means to permanently surrender  $SO_2$  Allowances so that such  $SO_2$  Allowances can never be used to meet any compliance requirement under the Clean Air Act or this paragraph (k).

(xxiv) "Unit" means, solely for purposes of this paragraph (k), collectively, the coal pulverizer, stationary equipment that feeds coal to the boiler, the boiler that produces steam for the steam turbine, the steam turbine, the generator, equipment necessary to operate the generator, steam turbine and boiler, and all ancillary equipment, including pollution control equipment, at or serving a coal-fired steam electric generating unit at FCPP.

(xxv) "Wet Stack" means a stack designed to be capable of use with a saturated gas stream constructed with liner material(s) consisting of one or more of the following: carbon steel with a protective lining (organic resin, fluoroelastomers, borosilicate glass blocks or a thin cladding of a corrosion-resistant alloy), fiberglass-reinforced plastic, solid corrosion-resistant alloy, or acid-resistant brick and mortar.

(2) <u>NO<sub>X</sub> Emission Limitations and Control Requirements.</u> (i) The owner or operator shall install and commence Continuous Operation of an SCR on FCPP Unit 5 by no later than March 31, 2018. Commencing no later than 30 Operating Days thereafter, the owner or operator shall Continuously Operate the SCR so as to achieve and maintain a 30-Day

Rolling Average NO<sub>X</sub> Emission Rate of no greater than 0.080 lb/MMBtu, subject to the petition process paragraph (k)(2)(iii).

(ii) The owner or operator shall install and commence Continuous Operation of an SCR on the FCPP Unit 4 by no later than July 31, 2018. Commencing no later than 30 Operating Days thereafter, the owner or operator shall Continuously Operate the SCR so as to achieve and maintain a 30-Day Rolling Average NO<sub>X</sub> Emission Rate of no greater than 0.080 lb/MMBtu, subject to the petition process in paragraph (k)(2)(iii).

(iii) At any time after March 31, 2019 but before December 31, 2020, the owner or operator may submit to EPA a petition for a proposed revision to the 30-DayRolling Average NO<sub>X</sub> Emission Rate of 0.080 lb/MMBtu for either or both of theFCPP Units. The petition must demonstrate all of the following:

(A) That the design of the SCR system met the following parameters:

(1) The SCR system was designed to meet a NO<sub>X</sub> emission rate of 0.049
 lb/MMBtu, on an hourly average basis, under normal operating
 conditions once the minimum operating temperature of the SCR catalyst
 is achieved; and

(2) The owner or operator obtained a Make-Right Vendor Guarantee for a NO<sub>X</sub> emission rate of 0.049 lb/MMBtu;

(B) That best efforts have been taken to achieve the 30-Day Rolling Average NO<sub>X</sub> Emission Rate of 0.080 lb/MMBtu. Best efforts include but are not limited to exhausting the Make-Right Vendor Guarantee and obtaining independent outside support from a registered professional engineer expert in SCR design. To demonstrate best efforts have been taken, the petition shall also include:

(1) The request for bid for the subject SCR;

(2) Winning bid documents, including all warranties and design information;

(3) NO<sub>X</sub>, NH<sub>3</sub>, and heat rate CEMS data and all related stack tests;

(4) Daily coal quality data, including sulfur, ash, and heat content;

(5) Operating and maintenance logs documenting all exceedances of the

0.080 lb/MMBtu 30-Day Rolling Average NO<sub>X</sub> Emission Rate and measures taken to correct them;

(6) Vendor certification pursuant to a Make-Right Vendor Guarantee that the 0.080 lb/MMBtu 30-Day Rolling Average NO<sub>X</sub> Emission Rate cannot be met by the SCR as designed;

(7) A signed and sealed report by a registered professional engineer expert in SCR design confirming the 0.080 lb/MMBtu 30-Day Rolling Average NO<sub>X</sub> Emission Rate cannot be met by the SCR as designed; and

(8) Affidavits documenting causes of failure to meet the 0.080lb/MMBtu 30-Day Rolling Average NO<sub>X</sub> Emission Rate, signed and sealed by a licensed professional engineer;

(C) That the SCR system was properly operated and maintained pursuant to the manufacturer's specifications for achieving and Continuously Operating to meet the design  $NO_X$  emission rate of 0.049 lb/MMBtu; and

(D) That the owner or operator Continuously Operated the SCR and maximized the percent of flue gas or water bypassed around the economizer during any startup and shutdown events in a manner to attain minimum operating temperature as quickly as reasonably possible during startup and to maintain minimum operating temperature during shutdowns as long as reasonably possible;

(E) That the owner or operator Continuously Operated the SCR and controlled the percent of flue gas or water bypassed around the economizer to maintain minimum operating temperature during load changes.

(iv) In any petition submitted pursuant to paragraph (k)(2)(iii), the owner or operator shall include an alternate 30-Day Rolling Average NO<sub>X</sub> Emission Rate, but in no event may the owner or operator propose a 30-Day Rolling Average NO<sub>X</sub> Emission Rate more than 0.085 lb/MMBtu. The owner or operator shall also submit all studies, reports, and/or recommendations from the vendor and contractor(s) required by this paragraph and paragraph (k)(2)(iii), evaluating each measure undertaken in an effort to meet a 30-Day Rolling Average NO<sub>X</sub> Emission Rate of no greater than 0.080 lb/MMBtu. The owner or operator shall also deliver with each submission all pertinent documents and data that support or were considered in preparing such submission, as well as all data pertaining to the performance of the SCR in question since August 17, 2015 and the operational history of the Unit since August 17, 2015. (v) In addition to meeting the emissions rates set forth in paragraphs (k)(2)(i) and (k)(2)(ii), all Units at FCPP, collectively, shall not emit NO<sub>X</sub> in excess of the following Annual Tonnage Limitation: 31,060 tons of NO<sub>X</sub> per year in 2016 and 2017; 12,165 tons of NO<sub>X</sub> per year in 2018; and 4,968 tons of NO<sub>X</sub> per year in 2019 and thereafter. However, if the 30-Day Rolling Average NO<sub>X</sub> Emission Rate of 0.080 lb/MMBtu required under Paragraphs (k)(2)(i) and (k)(2)(ii) is revised pursuant to the petition process set forth in paragraphs (k)(2)(iii) and (k)(2)(iv), the annual NO<sub>X</sub> tonnage limitations set forth as follows shall increase by the ratio of the new NO<sub>X</sub> rate in lb/MMBtu determined pursuant to paragraphs (k)(2)(iii) and (k)(2)(iv) divided by 0.080 lb/MMBtu.

(vi) In determining the 30-Day Rolling Average NO<sub>X</sub> Emission Rate, the owner or operator shall use CEMS in accordance with the procedures of 40 CFR part 75, except that NO<sub>X</sub> emissions data for the 30-Day Rolling Average NO<sub>X</sub> Emission Rate need not be bias adjusted and the missing data substitution procedures of 40 CFR part 75 shall not apply. Diluent capping (*i.e.*, 5 percent CO<sub>2</sub>) will be applied to the NO<sub>X</sub> emission calculation for any hours where the measured CO<sub>2</sub> concentration is less than 5 percent following the procedures in 40 CFR part 75, Appendix F, Section 3.3.4.1. The owner or operator shall report semiannually all hours where diluent capping procedures were applied during the reporting period.

(vii) For purposes of determining compliance with the Annual Tonnage Limitations in paragraph (k)(2)(v), the owner or operator shall use CEMS in accordance with the procedures specified in 40 CFR Part 75.

(viii) The owner or operator shall not sell, trade, or transfer any surplus  $NO_X$ Allowances allocated to FCPP that would otherwise be available for sale or trade as a result of the actions taken by the owner or operator to comply with the requirements of this rule.

#### (3) <u>SO<sub>2</sub> Emission Limitations and Control Requirements.</u>

(i) Beginning on August 17, 2015, the owner or operator shall continuously operate the existing FGDs at FCPP Unit 4 and Unit 5 so as to emit  $SO_2$  from FCPP at an amount no greater than 10.0 percent of the potential combustion concentration assuming all of the sulfur in the coal is converted to  $SO_2$ . Compliance with this emissions standard shall be determined on a rolling 365-Operating Day basis using the applicable methodologies set forth in paragraph (e)(2) of this section. The first day for determining compliance with this emissions standard shall be 365 Days after August 17, 2015. The requirements of this paragraph shall remain in effect until the owner or operator achieve compliance with the requirements set forth in paragraphs (k)(3)(ii) and (k)(3)(iii).

(ii) By no later than March 31, 2018, the owner or operator shall convert the existing ductwork and stack at FCPP Unit 5 to a Wet Stack, so as to eliminate the need to bypass flue gas around the FGD absorbers for reheat purposes. Commencing no later than 30 Operating Days thereafter, the owner or operator shall continuously operate the existing FGD at FCPP Unit 5 so as to achieve and maintain a 30-Day Rolling Average SO<sub>2</sub> Removal Efficiency of at least 95.0 percent.

(iii) By no later than July 31, 2018, the owner or operator shall convert the existing ductwork and stack at FCPP Unit 4 to a Wet Stack, so as to eliminate the need to bypass flue gas around the FGD absorbers for reheat purposes. Commencing no later than 30 Operating Days thereafter, the owner or operator shall Continuously Operate the existing FGD at FCPP Unit 4 so as to achieve and maintain a 30-Day Rolling Average SO<sub>2</sub> Removal Efficiency of at least 95.0 percent.

(iv) In addition to meeting the emission rates set forth in paragraphs (k)(3)(i),

(k)(3)(ii) and (k)(3)(iii), all Units at FCPP, collectively, shall not emit SO<sub>2</sub> in excess of the following Annual Tonnage Limitations: 13,300 tons of SO<sub>2</sub> per year in 2016 and 2017; 8,300 tons of SO<sub>2</sub> per year in 2018; 6,800 tons of SO<sub>2</sub> per year in 2019 and thereafter.

(v) By each of the dates by which the owner or operator must comply with the 30-Day Rolling Average SO<sub>2</sub> Removal Efficiency required under paragraphs (k)(3)(ii) and (k)(3)(iii), the owner or operator shall install, certify, maintain, and operate FGD inlet SO<sub>2</sub> and any associated diluent CEMS with respect to that Unit in accordance with the requirements of paragraph (e)(1) of this section.

(vi) In determining the 30-Day Rolling Average SO<sub>2</sub> Removal Efficiency, the owner or operator shall use CEMS in accordance with the procedures of 40 CFR part 75, except that SO<sub>2</sub> emissions data for the 30-Day Rolling Average SO<sub>2</sub> Removal Efficiency need not be bias adjusted, and the missing data substitution procedures of 40 CFR part 75 shall not apply. Diluent capping (*i.e.*, 5 percent CO<sub>2</sub>) will be applied to the SO<sub>2</sub> emission calculation for any hours where the measured CO<sub>2</sub> concentration is less than 5 percent following the procedures in 40 CFR part 75, Appendix F, Section 3.3.4.1. The owner or operator shall submit a semi-annual report that includes all hours where diluent capping procedures were applied during the reporting period.

(vii) For purposes of determining compliance with the Annual Tonnage Limitations in paragraph (k)(3)(iv), the owner or operator shall use CEMS in accordance with the procedures specified in 40 CFR part 75.

(4) Use and Surrender of SO<sub>2</sub> Allowances. (i) The owner or operator shall not use SO<sub>2</sub>

Allowances to comply with any requirement of paragraph (k), including by claiming compliance with any emission limitation required by paragraph (k) by using, tendering, or otherwise applying SO<sub>2</sub> Allowances to offset any excess emissions.

(ii) Except as provided in paragraph (k), the owner or operator shall not sell, bank, trade, or transfer any SO<sub>2</sub> Allowances allocated to FCPP.

(iii) Beginning with calendar year 2015, and continuing each calendar year thereafter, the owner or operator shall surrender to EPA, or transfer to a non-profit third party selected by the owner or operator for Surrender, all SO<sub>2</sub> Allowances allocated to FCPP for that calendar year that the owner or operator does not need in order to meet their own federal and/or state Clean Air Act statutory or regulatory requirements for the FCPP Units.

 (iv) Nothing in paragraph (k)(4) shall prevent the owners or operator from purchasing or otherwise obtaining SO<sub>2</sub> Allowances from another source for purposes of complying with Clean Air Act requirements to the extent otherwise allowed by law.

(v) For any given calendar year, provided that FCPP is in compliance for that calendar year with all emissions limitations for  $SO_2$  set forth in this section, nothing in paragraph (k), including the provisions of paragraphs (k)(4)(ii) and (k)(4)(iii) pertaining to the Use and Surrender of  $SO_2$  Allowances, shall preclude the owner or operator from selling, trading, or transferring  $SO_2$  Allowances allocated to FCPP that become available for sale or trade that calendar year solely as a result of:

(A) The installation and operation of any pollution control technology or technique at Unit 4 or Unit 5 that is not otherwise required by paragraph (k);

or

(B) Achievement and maintenance of a 30-Day Rolling Average SO<sub>2</sub>
Removal Efficiency at Unit 4 or Unit 5 at a higher removal efficiency than the 30-Day Rolling Average SO<sub>2</sub> Removal Efficiency required by paragraph
(k)(3); so long as the owner or operator submits a semi-annual report of the generation of such surplus SO<sub>2</sub> Allowances that occur after August 17, 2015.

(vi) The owner or operator shall Surrender, or transfer to a non-profit third party selected by the owner or operator for Surrender, all SO<sub>2</sub> Allowances required to be Surrendered pursuant to paragraph (k)(4)(iii) by April 30 of the immediately following calendar year. Surrender need not include the specific SO<sub>2</sub> Allowances that were allocated to FCPP, so long as the owner or operator Surrender SO<sub>2</sub> Allowances that are from the same year and that are equal to the number required to be Surrendered under paragraph (k)(4)(vii).

(vii) If any SO<sub>2</sub> Allowances are transferred directly to a non-profit third party, the owner or operator shall include a description of such transfer in the next semiannual report submitted to EPA. Such report shall:

(A) Provide the identity of the non-profit third-party recipient(s) of the SO<sub>2</sub>Allowances and a listing of the serial numbers of the transferred SO<sub>2</sub>

Allowances; and

(B) Include a certification by the third-party recipient(s) certifying under the penalty of law that the recipient(s) will not sell, trade, or otherwise exchange any of the allowances and will not use any of the SO<sub>2</sub> Allowances to meet any obligation imposed by any environmental law. The certification must also

include a statement that the recipient understands that there are significant penalties for submitting false, inaccurate or incomplete information to the United States.

(C) No later than the third semi-annual report due after the transfer of any SO<sub>2</sub> Allowances, the owner or operator shall include a statement that the thirdparty recipient(s) Surrendered the SO<sub>2</sub> Allowances for permanent Surrender to EPA in accordance with the provisions of paragraph (k)(4)(ix) within one (1) year after the owner or operator transferred the SO<sub>2</sub> Allowances to them. The owner or operator shall not have complied with the SO<sub>2</sub> Allowance Surrender requirements of subparagraph (k)(4)(viii) until all third-party recipient(s) shall have actually Surrendered the transferred SO<sub>2</sub> Allowances to EPA.

(viii) For all SO<sub>2</sub> Allowances Surrendered to EPA, the owner or operator or the third-party recipient(s) (as the case may be) shall first submit an SO<sub>2</sub> Allowance transfer request form to the EPA Office of Air and Radiation's Clean Air Markets Division directing the transfer of such SO<sub>2</sub> Allowances to the EPA Enforcement Surrender Account or to any other EPA account that EPA may direct in writing. Such SO<sub>2</sub> Allowance transfer requests may be made in an electronic manner using the EPA's Clean Air Markets Division Business System or similar system provided by EPA. As part of submitting these transfer requests, the owner or operator or the third-party recipient(s) shall irrevocably authorize the transfer of these SO<sub>2</sub> Allowances and identify -- by name of account and any applicable serial or other identification numbers or station names -- the source and location of the SO<sub>2</sub>

Allowances being Surrendered.

#### (5) PM Emission Reduction Requirements

(i) The owner or operator shall operate each FCPP Unit in a manner consistent with good air pollution control practice for minimizing PM emissions, as set forth in paragraph (g). In addition, with respect to FCPP Units 4 and 5, the owner or operator shall, at a minimum, to the extent practicable:

(A) Operate each compartment of the Baghouse for each Unit (except the compartment provided as a spare compartment under the design of the baghouse), regardless of whether those actions are needed to comply with opacity limits;

(B) Repair any failed Baghouse compartment at the next planned Unit outage (or unplanned outage of sufficient length);

(C) Maintain and replace bags on each Baghouse as needed to achieve the required collection efficiency;

(D) Inspect for and repair during the next planned Unit outage (or unplanned outage of sufficient length) any openings in Baghouse casings, ductwork, and expansion joints to minimize air leakage; and

(E) Ensure that a bag leak detection program is developed and implemented to detect leaks and promptly repair any identified leaks.

(ii) The owner or operator shall Continuously Operate a Baghouse at FCPP Unit 4 and Unit 5 so as to achieve and maintain a filterable PM Emission Rate no greater than 0.0150 lb/MMBtu.

(iii) Once in each calendar year, the owner or operator shall conduct stack tests for

PM at FCPP Units 4 and 5. Alternatively, following the installation and operation of PM CEMS as required by paragraph (k)(6), the owner or operator may seek written approval to forego stack testing and instead demonstrate continuous compliance with an applicable filterable PM Emission Rate using CEMS on a 24-hour rolling average basis.

(iv) Unless EPA approves a request to demonstrate continuous compliance using CEMS under paragraph (k)(5)(iii) to determine compliance with the PM Emission Rate established in subparagraph (k)(5)(ii), the owner or operator shall use the reference methods and procedures (filterable portion only) specified in 40 CFR part 60, App. A-3, Method 5, Method 5 as described in subpart UUUUU, Table 5, or App. A-6, Method 17 (provided that Method 17 shall only be used for stack tests conducted prior to conversion of an FCPP Unit to a Wet Stack), or alternative stack tests or methods that are requested by the owner or operator and approved by EPA. Each test shall consist of three separate runs performed under representative operating conditions not including periods of startup, shutdown, or Malfunction. The sampling time for each run shall be at least 120 minutes and the volume of each run shall be at least 1.70 dry standard cubic meters (60 dry standard cubic feet). The owner or operator shall calculate the PM Emission Rate from the stack test results in accordance with 40 CFR 60.8(f). The results of each PM stack test shall be submitted to EPA and NNEPA within 60 Days of completion of each test. (v) Once each calendar year, the owner or operator shall conduct a stack test for condensable particulate matter at FCPP Units 4 and 5, using the reference methods and procedures set forth at 40 C.F.R. Part 51, Appendix M, Method 202 and as set

forth in paragraph (vi). This test shall be conducted under as similar operating conditions and as close in time as reasonably possible as the test for PM in paragraph (k)(5)(iv). Each test shall consist of three separate runs performed under representative operating conditions not including periods of startup, shutdown, or Malfunction. The sampling time for each run shall be at least 120 minutes and the volume of each run shall be at least 1.70 dry standard cubic meters (60 dry standard cubic feet). The owner or operator shall calculate the number of pounds of condensable particulate matter emitted in lb/MMBtu of heat input from the stack test results in accordance with 40 CFR 60.8(f). The results of the condensable particulate matter stack test conducted pursuant to this paragraph shall not be used for the purpose of determining compliance with the PM Emission Rates required by paragraph (k). The results of each condensable particulate matter stack test shall be submitted to EPA within sixty (60) Days of completion of each test. If EPA approves a request to demonstrate continuous compliance with an applicable PM Emission Rate at a Unit using PM CEMS under paragraph (k)(5)(iii), annual stack testing for condensable particulate matter using the reference methods and procedures set forth at 40 CFR part 51, Appendix M, Method 202 is not required for that Unit.

(6) <u>PM CEMS</u>. (i) The owner or operator shall install, correlate, maintain, and operate a PM CEMS for FCPP Unit 4 and FCPP Unit 5 as specified below. The PM CEMS shall comprise a continuous-particle mass monitor measuring particulate matter concentration, directly or indirectly, on an hourly average basis and a diluent monitor used to convert the concentration to units expressed in lb/MMBtu. The PM CEMS installed at each Unit must be appropriate for the anticipated stack conditions and capable of measuring PM concentrations on an hourly average basis. Each PM CEMS shall complete a minimum of one cycle of operations (sampling, analyzing and data recording) for each successive 15-minute period. The owner or operator shall maintain, in an electronic database, the hourly-average emission values of all PM CEMS in lb/MMBtu. Except for periods of monitor malfunction, maintenance, or repair, the owner or operator shall continuously operate the PM CEMS at all times when the Unit it serves is operating.

(ii) By no later than February 16, 2017, the owner or operator shall ensure that the PM CEMS are installed, correlated, maintained and operated at FCPP Units 4 and 5.
(iii) The owner or operator shall ensure that performance specification tests on the PM CEMS are conducted and shall ensure compliance with the PM CEMS installation plan and QA/QC protocol submitted to and approved by EPA. The PM CEMS shall be operated in accordance with the approved plan and QA/QC protocol.
(iv) The data recorded by the PM CEMS during Unit operation, expressed in lb/MMBtu on a 3-hour, 24-hour, and 30-Day rolling average basis, shall be included in the semiannual report submitted to EPA in electronic format (Microsoft Excelcompatible).

(v) Notwithstanding any other provision of paragraph (k), exceedances of the PM Emission Rate that occur as a result of detuning emission controls as required to achieve the high-level PM test runs during the correlation testing shall not be considered a violation of the requirements of this section provided that the owner or operator made best efforts to keep the high-level PM test runs during such correlation testing below the applicable PM Emission Rate. (vi) Stack testing conducted pursuant to paragraph (k)(5)(iv) shall be the compliance method for the PM Emission Rates established by paragraph (k)(5), unless EPA approves a request under paragraph (k)(5)(iii), in which case PM CEMS shall be used to demonstrate continuous compliance with an applicable PM Emission Rate on a 24hour rolling average basis. Data from PM CEMS shall be used, at a minimum, to monitor progress in reducing PM emissions on a continuous basis.

(7) <u>Prohibition on Netting Credits or Offsets.</u> Emission reductions that result from the actions taken by the owner or operator after August 17, 2015, to comply with the requirements of paragraph (k), shall not be considered as a creditable contemporaneous emission decrease for the purpose of obtaining netting credit or offset under the Clean Air Act's Nonattainment NSR and PSD programs.

(i) The limitations on the generation and use of netting credits or offsets set forth in paragraph (k)(7) do not apply to emission reductions achieved by FCPP Units that are greater than those required under paragraph (k). For purposes of paragraph (k)(7)(i), emission reductions from an FCPP unit are greater than those required under paragraph (k) if, for example, they result from the owner or operator's compliance with federally enforceable emission limits that are more stringent than those limits imposed on individual FCPP Units under paragraph (k) and under applicable provisions of the Act.

(ii) Nothing in paragraph (k) is intended to preclude the emission reductions generated under paragraph (k) from being considered by the NNEPA or EPA as creditable contemporaneous emission decreases for the purposes of attainment demonstrations submitted pursuant to Section 110 of the Act, 42 U.S.C. 7410, or in determining impacts on National Ambient Air Quality Standards, PSD increment, or

air quality related values, including visibility in a Class I area.