

45CSR34

TITLE 45
LEGISLATIVE RULE
DEPARTMENT OF ENVIRONMENTAL PROTECTION
AIR QUALITY

SERIES 34
EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS

§45-34-1. General.

1.1. Scope. -- This rule establishes and adopts a program of national emission standards for hazardous air pollutants and other regulatory requirements promulgated by the United States Environmental Protection Agency pursuant to 40 CFR Parts 61, 63 and section 112 of the federal Clean Air Act, as amended. This rule codifies general procedures and criteria to implement emission standards for stationary sources that emit (or have the potential to emit) one or more of the eight substances listed as hazardous air pollutants in 40 CFR §61.01(a), or one or more of the substances listed as hazardous air pollutants in section 112(b) of the CAA. The Secretary hereby adopts these standards by reference. The Secretary also adopts associated reference methods, performance specifications and other test methods which are appended to these standards.

1.2. Authority. -- W.Va. Code §22-5-4.

1.3. Filing Date. -- ~~May 15, 2017.~~

1.4. Effective Date. -- ~~June 1, 2017.~~

1.5. Incorporation by Reference. -- Federal Counterpart Regulation. The Secretary has determined that a federal counterpart regulation exists, and in accordance with the Secretary's recommendation, with limited exception, this rule incorporates by reference 40 CFR Parts 61, 63 and 65, to the extent referenced in 40 CFR Parts 61 and 63, effective ~~June 1, 2016~~ June 1, 2017.

§45-34-2. Definitions.

2.1. "Administrator" means the Administrator of the United States Environmental Protection Agency or his or her authorized representative.

2.2. "Clean Air Act" ("CAA") means the federal Clean Air Act, found at 42 U.S.C. §7401 et seq., as amended.

2.3. "Hazardous air pollutant" means any air pollutant listed pursuant to 40 CFR §61.01(a) or section 112(b) of the CAA.

2.4. "Secretary" means the Secretary of the Department of Environmental Protection or other person to whom the Secretary has delegated authority or duties pursuant to W.Va. Code §§22-1-6 or 22-1-8.

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2.5. Other words and phrases used in this rule, unless otherwise indicated, shall have the meaning ascribed to them in 40 CFR Parts 61 and 63. Words and phrases not defined therein shall have the meaning given to them in federal Clean Air Act.

§45-34-3. Requirements.

3.1. No person may construct, reconstruct, modify, or operate, or cause to be constructed, reconstructed, modified, or operated any source subject to the provisions of 40 CFR Parts 61 and 63 which results or will result in a violation of this rule.

3.2. No person may construct or reconstruct any major source of hazardous air pollutants, unless the Secretary determines that the maximum achievable control technology emission limitation under 40 CFR Part 63 and this rule for new sources will be met.

3.3. The Secretary shall determine and apply case-by-case maximum achievable control technology standards to existing sources categorized by the Administrator pursuant to section 112(c)(1) of the CAA for which the Administrator has not promulgated emission standards in accordance with sections 112(d) and 112(e) of the CAA.

3.4. Prior to constructing, reconstructing or modifying any facility subject to this rule, the owner or operator shall obtain a permit in accordance with the applicable requirements of 45CSR13, 45CSR14, 45CSR19, 45CSR30 and this rule.

§45-34-4. Adoption of Standards.

4.1. The Secretary hereby adopts and incorporates by reference the provisions of 40 CFR Parts 61, 63 and 65, to the extent referenced in 40 CFR Parts 61 and 63, including any reference methods, performance specifications and other test methods which are appended to these standards and contained in 40 CFR Parts 61, 63 and 65, effective ~~June 1, 2016~~ June 1, 2017, for the purposes of implementing a program for emission standards for hazardous air pollutants, except as follows:

4.1.a. 40 CFR §§61.16 and 63.15 are amended to provide that information shall be available to the public in accordance with W.Va. Code §§22-5-1 et seq., 29B-1-1 et seq., and 45CSR31;

4.1.b. Subpart E of 40 CFR Part 63 and any provision related to section 112(r) of the CAA, notwithstanding any requirements of 45CSR30 shall be excluded;

4.1.c. Subparts DDDDDD, LLLLLL, OOOOOO, PPPPPP, QQQQQQ, TTTTTT, WWWW, ZZZZZ, HHHHHH, BBBBBB, CCCCCC, WWWWWW, XXXXXX, YYYYYY, ZZZZZZ, BBBBBB, CCCCCC, and DDDDDDD of 40 CFR Part 63 shall be excluded; and

4.1.d. Subparts B, H, I, K, Q, R, T, and W; Methods 111, 114, 115 and Appendix D and E of 40 CFR Part 61 shall be excluded.

§45-34-5. Secretary.

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5.1. Any and all references in 40 CFR Parts 63 and 65 to the “Administrator” are amended to be the “Secretary” except as follows:

5.1.a. where the federal regulations specifically provide that the Administrator shall retain authority and not transfer authority to the Secretary;

5.1.b. where provisions occur which refer to:

5.1.b.1. alternate means of emission limitations;

5.1.b.2. alternate control technologies;

5.1.b.3. innovative technology waivers;

5.1.b.4. alternate test methods;

5.1.b.5. alternate monitoring methods;

5.1.b.6. waivers/adjustments to recordkeeping and reporting;

5.1.b.7. emissions averaging; or

5.1.b.8. applicability determinations; or

5.1.c. where the context of the regulation clearly requires otherwise.

§45-34-6. Permits.

6.1. Nothing contained in this rule shall be construed or inferred to mean that permit requirements in accordance with applicable rules shall in any way be limited or inapplicable.

§45-34-7. Inconsistency Between Rules.

7.1. In the event of any inconsistency between this rule and any other rule of the Division of Air Quality, the inconsistency shall be resolved by the determination of the Secretary and the determination shall be based upon the application of the more stringent provision, term, condition, method or rule.

under paragraphs (a) of this section to address the inconsistent application of any rule, regulation, or policy that may arise in response to the limited jurisdiction of either a federal circuit court decision arising from challenges to “locally or regionally applicable” actions, as provided in Clean Air Act section 307(b) (42 U.S.C. 7607(b)), or a federal district court decision.

* * * * *

■ 4. Section 56.5 is amended by revising paragraph (b) to read as follows:

§ 56.5 Mechanisms for fairness and uniformity—Responsibilities of Regional Office employees.

* * * * *

(b) A responsible official in a Regional office shall seek concurrence from the appropriate EPA Headquarters office on any interpretation of the Act, or rule, regulation, or program directive when such interpretation may result in application of the act or rule, regulation, or program directive that is inconsistent with Agency policy. However, the responsible official in a Regional office will not be required to seek such concurrence from the appropriate EPA Headquarters office for actions that may result in inconsistent application if such inconsistent application is required in order to act in accordance with a federal court decision:

(1) Issued by a Circuit Court in challenges to “locally or regionally applicable” actions, as provided in Clean Air Act section 307(b) (42 U.S.C. 7607(b)), if that circuit court has direct jurisdiction over the geographic areas that the Regional office official is addressing, or (2) Issued by a district court in a specific case if the party the Regional office official is addressing was also a party in the case that resulted in the decision.

* * * * *

[FR Doc. 2016-17899 Filed 8-2-16; 8:45 a.m.]

BILLING CODE 6560-50-P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 63

[EPA-HQ-OAR-2014-0830; FRL-9950-10-OAR]

RIN 2060-AS99

National Emission Standards for Aerospace Manufacturing and Rework Facilities Risk and Technology Review; Clarification

AGENCY: Environmental Protection Agency (EPA).

ACTION: Direct final rule.

SUMMARY: The Environmental Protection Agency (EPA) is taking direct final action to amend the National Emissions Standards for Hazardous Air Pollutants (NESHAP) for Aerospace Manufacturing and Rework Facilities. In this action, we are clarifying the compliance date for the handling and storage of waste.

DATES: This rule is effective on October 3, 2016 without further notice, unless the EPA receives significant and relevant adverse comment by September 2, 2016. If the EPA receives significant and relevant adverse comment, we will publish a timely withdrawal in the **Federal Register** informing the public that the rule will not take effect.

ADDRESSES: Submit your comments, identified by Docket ID No. EPA-HQ-OAR-2014-0830, at <http://www.regulations.gov>. Follow the online instructions for submitting comments. Once submitted, comments cannot be edited or removed from [Regulations.gov](http://www.regulations.gov). The EPA may publish any comment received to its public docket. Do not submit electronically any information you consider to be Confidential Business Information (CBI) or other information whose disclosure is restricted by statute. Multimedia submissions (audio, video, etc.) must be accompanied by a written comment. The written comment is considered the official comment and should include discussion of all points you wish to make. The EPA will generally not consider comments or comment contents located outside of the primary submission (*i.e.*, on the Web, cloud, or other file sharing system). For additional submission methods, the full EPA public comment policy, information about CBI or multimedia submissions, and general guidance on making effective comments, please visit <http://www2.epa.gov/dockets/commenting-epa-dockets>.

Docket. The EPA has established a docket for this rulemaking under Docket ID No. EPA-HQ-OAR-2014-0830. All documents in this docket are listed on the <http://www.regulations.gov> Web site. Although listed in the index, some information is not publicly available, *e.g.*, CBI or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are available either electronically through <http://www.regulations.gov>, or in hard copy at the EPA Docket Center, EPA WJC West Building, Room Number 3334, 1301 Constitution Ave. NW., Washington, DC. The Public Reading

Room hours of operation are 8:30 a.m. to 4:30 p.m. Eastern Standard Time, Monday through Friday. The telephone number for the Public Reading Room is (202) 566-1744, and the telephone number for the Air Docket is (202) 566-1742.

FOR FURTHER INFORMATION CONTACT: For questions about this direct final action, contact Ms. Kim Teal, Sector Policies and Programs Division (D243-04), Office of Air Quality Planning and Standards, U.S. Environmental Protection Agency, Research Triangle Park, North Carolina 27711; telephone number: (919) 541-5580; fax number: (919) 541-5450; and email address: teal.kim@epa.gov. For information about the applicability of the NESHAP to a particular entity, contact Mr. John Cox, Office of Enforcement and Compliance Assurance, (202) 564-1395, cox.john@epa.gov.

SUPPLEMENTARY INFORMATION:
Background information. On December 7, 2015 (80 FR 76152), the EPA finalized amendments to the Aerospace Manufacturing and Rework Facilities NESHAP based on our Risk and Technology Review. In this action, we are clarifying the intended compliance date for sources subject to the recently finalized handling and storage of waste requirements.

Organization of this document. The information in this preamble is organized as follows:

- I. General Information
 - A. Why is the EPA using a direct final rule?
 - B. Does this action apply to me?
 - C. What should I consider as I prepare my comments for the EPA?
- II. What are the amendments in this direct final rule?
- III. Statutory and Executive Order Reviews
 - A. Executive Order 12866: Regulatory Planning and Review and Executive Order 13563: Improving Regulation and Regulatory Review
 - B. Paperwork Reduction Act (PRA)
 - C. Regulatory Flexibility Act (RFA)
 - D. Unfunded Mandates Reform Act (UMRA)
 - E. Executive Order 13132: Federalism
 - F. Executive Order 13175: Consultation and Coordination With Indian Tribal Governments
 - G. Executive Order 13045: Protection of Children From Environmental Health Risks and Safety Risks
 - H. Executive Order 13211: Actions Concerning Regulations That Significantly Affect Energy Supply, Distribution or Use
 - I. National Technology Transfer and Advancement Act (NTTAA)
 - J. Executive Order 12898: Federal Actions To Address Environmental Justice in Minority Populations and Low-Income Populations
 - K. Congressional Review Act (CRA)

I. General Information

A. Why is the EPA using a direct final rule?

The EPA is publishing this rule without a prior proposed rule because we view this as a noncontroversial action and anticipate no significant and relevant adverse comment.

In the final rule published December 7, 2015, we inadvertently failed to identify the compliance date for sources subject to the requirements for handling and storage of waste. Therefore, in this document we are correcting that oversight. In the “Proposed Rules” section of this **Federal Register**, we are publishing a separate document that will serve as the proposed rule to amend the National Emission Standards for Aerospace Manufacturing and Rework Facilities (40 CFR part 63, subpart GG). If significant and relevant adverse comments are received on the proposal, we will withdraw this direct final rule. However, we will not institute a second comment period on this action. Any parties interested in commenting must do so at this time. For further information about commenting on this rule, see the **ADDRESSES** section of this document.

If the EPA receives significant and relevant adverse comment, we will publish a timely withdrawal in the **Federal Register** informing the public that some or all of the amendments in this direct final rule will not take effect. We would address all public comments in any subsequent final rule based on the proposed rule.

B. Does this action apply to me?

Regulated entities. Categories and entities potentially regulated by this action are shown in Table 1 of this preamble.

TABLE 1—INDUSTRIAL SOURCE CATEGORIES AFFECTED BY THIS ACTION

Source category	NESHAP	NAICS ¹ Code
Aerospace Manufacturing and Rework Facilities.	Aerospace Manufacturing and Rework Facilities.	336411
		336412
		336413
		336414
		336415
		336419
		481111
		481112
		481211
		481212
481219		

¹North American Industry Classification System.

Table 1 of this preamble is not intended to be exhaustive, but rather to provide a guide for readers regarding

entities likely to be affected by the final action for the source categories listed. To determine whether your facility is affected, you should examine the applicability criteria in the appropriate NESHAP. If you have any questions regarding the applicability of any aspect of this NESHAP, please contact the appropriate person listed in the preceding **FOR FURTHER INFORMATION CONTACT** section of this preamble.

C. What should I consider as I prepare my comments for the EPA?

Submitting CBI. Do not submit this information to the EPA through <http://www.regulations.gov> or email. Clearly mark the part or all of the information that you claim to be CBI. For CBI information in a disk or CD ROM that you mail to the EPA, mark the outside of the disk or CD ROM as CBI and then identify electronically within the disk or CD ROM the specific information that is claimed as CBI. In addition to one complete version of the comment that includes information claimed as CBI, a copy of the comment that does not contain the information claimed as CBI must be submitted for inclusion in the public docket. Information so marked will not be disclosed except in accordance with procedures set forth in 40 CFR part 2. Send or deliver information identified as CBI only to the following address: OAQPS Document Control Officer (C404-02), U.S. Environmental Protection Agency, Research Triangle Park, North Carolina 27711, and Attention Docket ID No. EPA-HQ-OAR-2014-0830.

II. What are the amendments in this direct final rule?

This direct final rule provides a compliance date of December 7, 2018, for sources subject to the requirements for handling and storage of waste in 40 CFR part 63, subpart GG. In the final rule dated December 7, 2015, we regulated specialty coating application operations for the first time. The compliance date for these new requirements was December 7, 2018. We also revised and clarified requirements for handling and storage of waste, and our intent was to specify the same December 7, 2018, compliance date for these revised requirements (80 FR 76172-74). However, we neglected to specify a compliance date for these revised waste handling and storage requirements in the regulatory text. Reading the regulatory text as now written would imply that the compliance date for these revised waste handling and storage requirements would be September 1, 1998. Therefore, we are correcting the rule text at 40 CFR

63.749(a)(3) to make it clear that the December 7, 2018, compliance date also applies to sources subject to the waste storage and handling requirements.

The EPA is accepting comments only on the specific issue raised in this direct final action and the accompanying proposed rule, the compliance date for handling and storage of waste. The EPA is not reopening or accepting comment on any other aspect of the NESHAP for Aerospace Manufacturing and Rework Facilities.

III. Statutory and Executive Order Reviews

Additional information about these statutes and Executive Orders can be found at <http://www2.epa.gov/laws-regulations/laws-and-executive-orders>.

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 and was, therefore, not submitted to the Office of Management and Budget (OMB) for review.

B. Paperwork Reduction Act (PRA)

This action does not impose any new information collection burden under the PRA. OMB has previously approved the information collection activities contained in the existing regulations and has assigned OMB Control Number 2060-0314. This action does not impose any new information collection burden because it serves only to provide a compliance date for the handling and storage of waste requirements.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. In making this determination, the impact of concern is any significant adverse economic impact on small entities. An agency may certify that a rule will not have a significant economic impact on a substantial number of small entities if the rule relieves regulatory burden, has no net burden, or otherwise has a positive economic effect on the small entities subject to the rule. This action will not impose any costs on small entities. No facilities meeting the Small Business Administration's definition of a small business will incur costs. We have, therefore, concluded that this action will have no net regulatory burden for all directly regulated small entities.

D. Unfunded Mandates Reform Act (UMRA)

This action does not contain any unfunded mandate as described in the UMRA, 2 U.S.C. 1531–1538, and does not significantly or uniquely affect small governments. The action imposes no enforceable duty on any state, local, or tribal governments or the private sector.

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. No tribal facilities are known to be engaged in the aerospace manufacturing or rework surface coating operations that would be affected by this action. Thus, Executive Order 13175 does not apply to this action.

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

The EPA interprets Executive Order 13045 as applying only to those regulatory actions that concern environmental health or safety risks that the 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 (NTTAA)

This rulemaking does not involve technical standards.

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

The EPA believes that this action does not have disproportionately high and adverse human health or environmental

effects on minority populations, low-income populations, and/or indigenous peoples, as specified in

Executive Order 12898 (59 FR 7629, February 16, 1994) because it does not establish an environmental health or safety standard. This action serves only to provide a compliance date for the previously promulgated handling and storage of waste requirements.

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each House of the Congress and to the Comptroller General of the United States. This action is not a “major rule” as defined by 5 U.S.C. 804(2).

List of Subjects in 40 CFR Part 63

Environmental protection, Air pollution control, Hazardous substances, Reporting and recordkeeping requirements.

Dated: July 26, 2016.

Gina McCarthy,
Administrator.

For the reasons stated in the preamble, part 63 of title 40, chapter I, of the Code of Federal Regulations is amended as follows:

PART 63—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR SOURCE CATEGORIES

- 1. The authority citation for part 63 continues to read as follows:

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

Subpart GG—National Emission Standards for Aerospace Manufacturing and Rework Facilities

- 2. Section 63.749 is amended by revising paragraph (a)(3) to read as follows:

§ 63.749 Compliance dates and determinations.

(a) * * *

(3) Each owner or operator of a specialty coating application operation or handling and storage of waste operation that begins construction or reconstruction after February 17, 2015, shall be in compliance with the requirements of this subpart on December 7, 2015, or upon startup, whichever is later. Each owner or operator of a specialty coating application operation or handling and storage of waste operation that is existing on February 17, 2015, shall be in compliance with the requirements of

this subpart on or before December 7, 2018.

* * * * *

[FR Doc. 2016–18395 Filed 8–2–16; 8:45 am]

BILLING CODE 6560–50–P

DEPARTMENT OF HEALTH AND HUMAN SERVICES**Centers for Medicare & Medicaid Services****42 CFR Parts 405, 424, and 455**

[CMS–6073–N]

Medicare, Medicaid, and Children’s Health Insurance Programs: Announcement of the Provider Enrollment Moratoria Access Waiver Demonstration of Part B Non-Emergency Ground Ambulance Suppliers and Home Health Agencies in Moratoria-Designated Geographic Locations

AGENCY: Centers for Medicare & Medicaid Services (CMS), HHS.

ACTION: Implementation of the waiver demonstration.

SUMMARY: This notice announces the Provider Enrollment Moratoria Access Waiver Demonstration of Part B Non-Emergency Ground Ambulance Suppliers and Home Health Agencies in 6 states. The demonstration is being implemented in accordance with section 402 of the Social Security Amendments of 1967 and gives CMS the authority to grant waivers to the statewide enrollment moratoria on a case-by-case basis in response to access to care issues, and to subject providers and suppliers enrolling via such waivers to heightened screening, oversight, and investigations.

DATES: Effective July 29, 2016.

FOR FURTHER INFORMATION CONTACT: Jung Kim, (410) 786–9370. News media representatives must contact CMS’ Public Affairs Office at (202) 690–6145 or email them at press@cms.hhs.gov.

SUPPLEMENTARY INFORMATION:**I. Background**

The Affordable Care Act provided CMS with new tools and resources to combat fraud, waste, and abuse in Medicare, Medicaid, and the Children’s Health Insurance Program (CHIP), including the authority to implement a temporary moratorium on provider enrollment in these programs. CMS uses quantitative and qualitative data to determine whether there is a need for a moratorium, such as reviewing provider and supplier saturation data for the area

EPA-APPROVED NORTH CAROLINA NON-REGULATORY PROVISIONS

Provision	State effective date	EPA Approval date	Federal Register citation	Explanation
110(a)(1) and (2) Infrastructure Requirements for 1997 Fine Particulate Matter NAAQS.	4/1/2008	9/14/2016	[Insert citation of publication in Federal Register].	Partially approve the PSD elements of sections 110(a)(2)(C), 110(a)(2)(D)(i)(II) (prong 3) and 110(a)(2)(J) and disapprove with respect to the PM _{2.5} increment requirements of 2010 PSD PM _{2.5} Rule.
110(a)(1) and (2) Infrastructure Requirements for 2006 Fine Particulate Matter NAAQS.	9/21/2009	9/14/2016	[Insert citation of publication in Federal Register].	Partially approve the PSD elements of sections 110(a)(2)(C), 110(a)(2)(D)(i)(II) (prong 3) and 110(a)(2)(J) and disapprove with respect to the PM _{2.5} increment requirements of 2010 PSD PM _{2.5} Rule.
110(a)(1) and (2) Infrastructure Requirements for the 2008 Lead NAAQS.	6/15/2012	9/14/2016	[Insert citation of publication in Federal Register].	Partially approve the PSD elements of sections 110(a)(2)(C), 110(a)(2)(D)(i)(II) (prong 3) and 110(a)(2)(J) and disapprove with respect to the PM _{2.5} increment requirements of 2010 PSD PM _{2.5} Rule.
110(a)(1) and (2) Infrastructure Requirements for the 2008 8-Hour Ozone NAAQS.	11/2/2012	9/14/2016	[Insert citation of publication in Federal Register].	Partially approve the PSD elements of sections 110(a)(2)(C), 110(a)(2)(D)(i)(II) (prong 3) and 110(a)(2)(J) and disapprove with respect to the PM _{2.5} increment requirements of 2010 PSD PM _{2.5} Rule.
110(a)(1) and (2) Infrastructure Requirements for the 2010 1-hour NO ₂ NAAQS.	8/23/2013	9/14/2016	[Insert citation of publication in Federal Register].	Partially approve the PSD elements of sections 110(a)(2)(C), 110(a)(2)(D)(i)(II) (prong 3) and 110(a)(2)(J) and disapprove with respect to the PM _{2.5} increment requirements of 2010 PSD PM _{2.5} Rule.
110(a)(1) and (2) Infrastructure Requirements for the 2010 1-hour SO ₂ NAAQS.	3/18/2014	9/14/2016	[Insert citation of publication in Federal Register].	Partially approve the PSD elements of sections 110(a)(2)(C), 110(a)(2)(D)(i)(II) (prong 3) and 110(a)(2)(J) and disapprove with respect to the PM _{2.5} increment requirements of 2010 PSD PM _{2.5} Rule.
110(a)(1) and (2) Infrastructure Requirements for the 2012 Annual PM _{2.5} NAAQS.	12/4/2015	9/14/2016	[Insert citation of publication in Federal Register].	Partially approve the PSD elements of sections 110(a)(2)(C), 110(a)(2)(D)(i)(II) (prong 3) and 110(a)(2)(J) and disapprove with respect to the PM _{2.5} increment requirements of 2010 PSD PM _{2.5} Rule.

§ 52.1773 [Removed and Reserved]

■ 3. Section 52.1773 is removed and reserved.

[FR Doc. 2016-21994 Filed 9-13-16; 8:45 am]

BILLING CODE 6560-50-P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 63

[EPA-HQ-OAR-2006-0790; FRL-9951-64-OAR]

RIN 2060-AS10

National Emission Standards for Hazardous Air Pollutants for Area Sources: Industrial, Commercial, and Institutional Boilers

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule; notice of final action on reconsideration.

SUMMARY: This action sets forth the Environmental Protection Agency’s (EPA’s) final decision on the issues for

which it announced reconsideration on January 21, 2015, that pertain to certain aspects of the February 1, 2013, final amendments to the “National Emission Standards for Hazardous Air Pollutants for Area Sources: Industrial, Commercial, and Institutional Boilers” (Area Source Boilers Rule). The EPA is retaining the subcategory and separate requirements for limited-use boilers, consistent with the February 2013 final rule. In addition, the EPA is amending three reconsidered provisions regarding: The alternative particulate matter (PM) standard for new oil-fired boilers; performance testing for PM for certain boilers based on their initial compliance test; and fuel sampling for mercury (Hg) for certain coal-fired boilers based on their initial compliance demonstration, consistent with the alternative provisions for which comment was solicited in the January 2015 proposal. The EPA is making minor changes to the proposed definitions of startup and shutdown based on comments received. This final action also addresses a limited number of technical corrections

and clarifications on the rule, including removal of the affirmative defense for malfunction in light of a court decision on the issue. These corrections will clarify and improve the implementation of the February 2013 final Area Source Boilers Rule. In this action, the EPA is also denying the requests for reconsideration with respect to the issues raised in the petitions for reconsideration of the final Area Source Boilers Rule for which reconsideration was not granted.

DATES: This final rule is effective on September 14, 2016.

ADDRESSES: The EPA has established a docket for this action under Docket ID No. EPA-HQ-OAR-2006-0790. All documents in the docket are listed on the <http://www.regulations.gov> Web site. Although listed in the index, some information is not publicly available, e.g., confidential business information or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy

form. Publicly available docket materials are available either electronically through <http://www.regulations.gov> or in hard copy at the EPA Docket Center, EPA/DC, EPA WJC West Building, Room 3334, 1301 Constitution Ave. NW., Washington, DC. The Public Reading Room is open from 8:30 a.m. to 4:30 p.m., Monday through Friday, excluding legal holidays. The telephone number for the Public Reading Room is (202) 566-1744, and the telephone number for the Docket Center is (202) 566-1742.

FOR FURTHER INFORMATION CONTACT: Ms. Mary Johnson, Energy Strategies Group, Sector Policies and Programs Division (D243-01), Environmental Protection Agency, Research Triangle Park, North Carolina 27711; telephone number: (919) 541-5025; fax number: (919) 541-5450; email address: johnson.mary@epa.gov.

SUPPLEMENTARY INFORMATION:

Acronyms and Abbreviations. A number of acronyms and abbreviations are used in this preamble. While this may not be an exhaustive list, to ease the reading of this preamble and for reference purposes, the following terms and acronyms are defined as follows:

- ACC American Chemistry Council
- AF&PA American Forest and Paper Association
- Btu British thermal unit
- CAA Clean Air Act
- CEMS Continuous emissions monitoring systems
- CFR Code of Federal Regulations
- CIBO Council of Industrial Boiler Owners
- CO Carbon monoxide
- CRA Congressional Review Act
- EGU Electric Utility Steam Generating Unit
- EPA U.S. Environmental Protection Agency
- GACT Generally available control technology
- HAP Hazardous air pollutant(s)

- Hg Mercury
- ICI Industrial, Commercial, and Institutional
- ICR Information collection request
- MACT Maximum achievable control technology
- MMBtu/hr Million British thermal units per hour
- NAICS North American Industrial Classification System
- NESHAP National Emission Standards for Hazardous Air Pollutants
- NRDC Natural Resources Defense Council
- NSPS New Source Performance Standards
- NTTAA National Technology Transfer and Advancement Act
- OMB Office of Management and Budget
- PM Particulate matter
- ppm Parts per million
- PRA Paperwork Reduction Act
- RFA Regulatory Flexibility Act
- The Court United States Court of Appeals for the District of Columbia Circuit
- TSM Total selected metals
- UMRA Unfunded Mandates Reform Act
- U.S.C. United States Code
- WWW World Wide Web

Organization of This Document. The following outline is provided to aid in locating information in this preamble.

- I. General Information
 - A. Does this action apply to me?
 - B. How do I obtain a copy of this document and other related information?
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I. General Information

A. Does this action apply to me?

Categories and entities potentially affected by this reconsideration action include those listed in Table 1 of this preamble.

TABLE 1—REGULATED ENTITIES

Category	North American Industrial Classification System (NAICS) code	Examples of potentially regulated entities
Any area source facility using a boiler as defined in the final rule.	321	Manufacturers of lumber and wood products.
	11	Agriculture, greenhouses.
	311	Food manufacturing.
	327	Nonmetallic mineral product manufacturing.
	424	Wholesale trade, nondurable goods.
	531	Real estate.
	611	Educational services.
	813	Religious, civic, professional, and similar organizations.
	92	Public administration.
	722	Food services and drinking places.
	62	Health care and social assistance.
	2211	Electric power generation.

This table is not intended to be exhaustive, but rather provides a guide for readers regarding entities likely to be affected by this final action. To determine whether your facility would be affected by this final action, you should examine the applicability criteria in 40 CFR 63.11193 of subpart JJJJJJ. If you have any questions regarding the applicability of this final action to a particular entity, consult either the air permitting authority for the entity or your EPA Regional representative as listed in 40 CFR 63.13 (General Provisions).

B. How do I obtain a copy of this document and other related information?

The docket number for this final action regarding the Area Source Boilers Rule (40 CFR part 63, subpart JJJJJJ) is Docket ID No. EPA-HQ-OAR-2006-0790.

In addition to being available in the docket, an electronic copy of this document will also be available on the World Wide Web (WWW). Following signature, a copy of this document will be posted at <https://www3.epa.gov/ttn/atw/boiler/boilerpg.html>.

C. Judicial Review

Under Clean Air Act (CAA) section 307(b)(1), judicial review of this final rule is available only by filing a petition for review in the U.S. Court of Appeals for the District of Columbia Circuit (the Court) by November 13, 2016. Under CAA section 307(d)(7)(B), only an objection to this final rule that was raised with reasonable specificity during the period for public comment can be raised during judicial review. Note, under CAA section 307(b)(2), the requirements established by this final rule may not be challenged separately in any civil or criminal proceedings brought by the EPA to enforce these requirements.

II. Background Information

On March 21, 2011, the EPA established final emission standards for control of hazardous air pollutants (HAP) from industrial, commercial, and institutional (ICI) boilers located at area sources of HAP—the Area Source Boilers Rule (76 FR 15554). On February 1, 2013, the EPA promulgated final amendments to the Area Source Boilers Rule (78 FR 7488). Following that action, the Administrator received three petitions for reconsideration that identified certain issues that petitioners claimed warranted further opportunity for public comment.

The EPA received a petition dated April 1, 2013, from the American Forest

and Paper Association (AF&PA), on their behalf and on behalf of the American Wood Council, National Association of Manufacturers, Biomass Power Association, Corn Refiners Association, National Oilseed Processors Association, Rubber Manufacturers Association, Southeastern Lumber Manufacturers Association and the U.S. Chamber of Commerce. The EPA received a petition dated April 2, 2013, from the Council of Industrial Boiler Owners (CIBO) and the American Chemistry Council (ACC). Finally, the EPA received a petition dated April 2, 2013, from Earthjustice, on behalf of the Sierra Club, Clean Air Council, Partnership for Policy Integrity, Louisiana Environmental Action Network and the Environmental Integrity Project.

In response to the petitions, the EPA reconsidered and requested comment on five provisions of the February 1, 2013, final amendments to the Area Source Boilers Rule. The EPA published the proposed notice of reconsideration in the **Federal Register** on January 21, 2015 (80 FR 2871).

In this rulemaking, the EPA is taking final action with respect to the five issues raised by petitioners in their petitions for reconsideration on the 2013 final amendments to the Area Source Boilers Rule and for which reconsideration was granted. Section III of this preamble presents the EPA's final decision on these issues and discusses our rationale for the decisions. Additionally, the EPA is finalizing the technical corrections and clarifications that were proposed to correct inadvertent errors in the final rule and to provide the intended accuracy, clarity, and consistency. Most of the corrections and clarifications remain the same as described in the proposed notice of reconsideration on January 21, 2015, and those changes are being finalized without further discussion. However, the EPA has refined its approach to some issues in this final rule after consideration of the public comments received on the proposed notice of reconsideration. The changes are to clarify applicability and implementation issues raised by the commenters and are discussed in section IV of this preamble. For a complete summary of the comments received and our responses thereto, please refer to the document "Response to 2015 Reconsideration Comments for Industrial, Commercial, and Institutional Boilers at Area Sources: National Emission Standards for Hazardous Air Pollutants" located in the docket.

III. Summary of Final Action on Issues Reconsidered

The five reconsideration issues for which amendments are being finalized in this rulemaking are: (1) Definitions of startup and shutdown; (2) alternative PM standard for new oil-fired boilers that combust low-sulfur oil; (3) establishment of a subcategory and separate requirements for limited-use boilers; (4) provision that eliminates further performance testing for PM for certain boilers based on their initial compliance test; and (5) provision that eliminates further fuel sampling for Hg for certain coal-fired boilers based on their initial compliance demonstration. Each of these issues is discussed in detail in the following sections of this preamble.

A. Definitions of Startup and Shutdown

In the February 1, 2013, final amendments to the Area Source Boilers Rule, the EPA finalized revisions to the definitions of startup and shutdown, which were based on the time during which fuel is fired in the affected unit for the purpose of supplying steam or heat for heating and/or producing electricity or for any other purpose. Petitioners asserted that the public lacked an opportunity to comment on the amended definitions and that the definitions were not sufficiently clear. In response to these petitions, in the January 21, 2015, proposed notice of reconsideration (80 FR 2871), we solicited comment on the definitions of startup and shutdown that were promulgated in the February 2013 final rule as well as additional revisions we proposed to make to those definitions. Specifically, we proposed to revise the February 2013 definition of startup to include an alternate definition of startup. The alternate definition clarified when startup begins for new boilers to address pre-startup testing activities that are done as part of installing a new boiler and when startup ends for first-ever startups as well as startups occurring after shutdown events. The alternate definition of startup as well as the definition of shutdown incorporated a new term "useful thermal energy" to replace the term "steam and heat" to address petitioners' concerns of an ambiguous end of the startup period.

In this action, the EPA is adopting two alternative definitions of "startup," consistent with the proposed rule. The first definition defines "startup" to mean the first-ever firing of fuel, or the firing of fuel after a shutdown event, in a boiler for the purpose of supplying useful thermal energy for heating and/

or producing electricity or for any other purpose. Under this definition, startup ends when any of the useful thermal energy from the boiler is supplied for heating, producing electricity, or any other purpose. The EPA is also adopting an alternative definition of “startup” which defines the period as beginning with the first-ever firing of fuel, or the firing of fuel after a shutdown event, in a boiler for the purpose of supplying useful thermal energy for heating, cooling, or process purposes or for producing electricity, and ending 4 hours after the boiler supplies useful thermal energy for those purposes.

In the February 1, 2013, final rule, the EPA defined “shutdown” to mean the cessation of operation of a boiler for any purpose, and said this period begins either when none of the steam or heat from the boiler is supplied for heating and/or producing electricity or for any other purpose, or when no fuel is being fired in the boiler, whichever is earlier. The EPA received petitions for reconsideration of this definition, asking that the agency clarify the term. The EPA proposed a definition of “shutdown” in January 2015 which clarified that shutdown begins when the boiler no longer makes useful thermal energy (rather than referring to steam or heat supplied by the boiler) for heating, cooling, or process purposes or generates electricity, or when no fuel is being fed to the boiler, whichever is earlier. In this action, the EPA is adopting a definition of “shutdown” that is consistent with the proposal, with some minor clarifying revisions. “Shutdown” is defined to begin when the boiler no longer supplies useful thermal energy (such as steam or hot water) for heating, cooling, or process purposes or generates electricity, or when no fuel is being fed to the boiler, whichever is earlier. Under this definition, shutdown ends when the boiler no longer supplies useful thermal energy (such as steam or hot water) for heating, cooling, or process purposes or generates electricity, and no fuel is being combusted in the boiler.

The EPA received several comments on the proposed definitions of “useful thermal energy,” “startup,” and “shutdown.”

1. Useful Thermal Energy

Several commenters supported the amended definitions of startup and shutdown that include the concept of useful thermal energy, which recognizes that small amounts of steam or heat may be produced when starting up a unit, but the amounts would be insufficient to operate processing equipment and

insufficient to safely initiate pollution controls.

One commenter requested that the EPA add the term “flow rate” to the definition of useful thermal energy, consistent with discussion in the preamble to the proposed notice of reconsideration (80 FR 2874). The EPA recognizes the importance of flow rate as a parameter for determining when useful thermal energy is being supplied by a boiler and has added this term to the definition of useful thermal energy in the final rule.

2. Startup

One commenter stated that work practice standards are allowed only if pollution is not emitted through a conveyance or the application of measurement methodology to a particular class of sources is not practicable, and the EPA has not stated either of these to be the case. The commenter also claimed that, because the EPA has changed and extended startup and shutdown periods, the EPA must determine that emissions measurement is impracticable during startup and shutdown as they are now defined, which the EPA has not done.

The EPA recognizes the unique characteristics of ICI boilers and has retained the alternate definition, which incorporates the term “useful thermal energy” in the final rule, with some slight adjustments, as discussed previously. Contrary to the commenter’s assertion, the EPA did make a determination under CAA section 112(h) that it is not feasible to prescribe or enforce a numeric emission standard during periods of startup and shutdown because the application of measurement methodology is impracticable due to technological and economic limitations. Specifically, the March 2011 final rule required a work practice standard for coal-fired boilers during periods of startup and shutdown. See 76 FR 15576–15577. Test methods are required to be conducted under isokinetic conditions (*i.e.*, steady-state conditions in terms of exhaust gas temperature, moisture, flow rate) which are difficult to achieve during these periods of startup and shutdown where conditions are constantly changing. Moreover, accurate HAP data from those periods are unlikely to be available from either emissions testing (which is designed for periods of steady state operation) or monitoring instrumentation such as continuous emissions monitoring systems (CEMS) (which are designed for measurements occurring during periods other than during startup or shutdown when emissions flow are stable and consistent). Upon review of this

information, the EPA determined that it is not feasible to require stack testing during periods of startup and shutdown due to physical limitations and the short duration of startup and shutdown periods. Based on these specific facts for coal-fired boilers in the boilers source category, the EPA established a separate work practice standard for startup and shutdown periods.¹ The Court of Appeals recently approved the EPA’s approach to developing a start-up work practice and to making a (non)feasibility determination in *United States Sugar Corp v. EPA* (No. 11–1108, D.C. Cir., July 29, 2016) (slip op. at 155). We continue to conclude that testing is impracticable during periods of startup and shutdown as those terms are defined in this final action. We set standards based on available information as contemplated by CAA section 112. Compliance with the numeric emission limits (*i.e.*, PM, Hg, and carbon monoxide (CO)) is demonstrated by conducting performance stack tests. The revised definitions of startup and shutdown better reflect when steady-state conditions are achieved, which are required to yield meaningful results from current testing protocols.

Several commenters agreed with the EPA that startup “should not end until such time that all control devices have reached stable conditions” (*see* 80 FR 2875, column 2), but questioned the EPA’s analysis of data from electric utility steam generating units (EGUs) to determine the alternate startup definition and disagreed with the EPA’s conclusion that 4 hours is an appropriate length of time for startup. The commenters stated that a work practice approach during startup and shutdown is appropriate and should be site-specific due to the many designs and applications of industrial boilers. One commenter provided information obtained from an informal survey of its members for 76 units on the time needed to reach stable conditions during startup (CIBO data).

As stated in the January 2015 proposal, the EPA had very limited information specifically for industrial boilers on the hours needed for controls to reach stable conditions after the start of supplying useful thermal energy.

¹ Coal-fired boilers are the only subcategory for which we set maximum achievable control technology (MACT)-based standards. The requisite findings under CAA section 112(h) for work practices are only necessary for the large coal-fired boiler subcategory. For large new oil-fired and biomass-fired boilers, the EPA set generally available control technology (GACT) management practice standards under CAA section 112(d)(5). The provisions of CAA section 112(h) do not apply to setting GACT standards.

However, the EPA did have information for EGUs on the hours to stable control operation after the start of electricity generation. Given that the startup provisions need to be based on “best performers,” we found that controls used on the best performing 12-percent EGUs reach stable operation within 4 hours after the start of electricity generation. Since the types of controls used on EGUs are similar to those used on industrial boilers and the start of electricity generation is similar to the start of supplying useful thermal energy, we continue to believe that the controls on the best performing industrial boilers would also reach stable operation within 4 hours after the start of supplying useful thermal energy and have included this timeframe in the final alternate definition. This conclusion was supported by the limited information (13 units) the EPA had on industrial boilers and by CIBO data (76 units).²

One commenter suggested that the first definition of startup be revised to incorporate the term “useful thermal energy” to clarify that startup has ended when the boiler is supplying steam or heat at the proper temperature, pressure, and flow to the energy use systems being served, not immediately after supplying any amount of heat for any incidental purpose.

The EPA has adjusted the first definition of startup to replace “steam or heat” with “useful thermal energy (such as steam or hot water)” consistent with the terminology in the alternate definition. Additionally, the term “useful thermal energy” was revised to incorporate a minimum flow rate to more appropriately reflect when the energy is provided for any primary purpose of the unit. Together, these changes alleviate the concerns of when the startup period functionally ends. Boilers should be considered to be operating normally at all times energy (*i.e.*, steam or hot water) of the proper pressure, temperature, and flow rate is being supplied to a common header system or energy user(s) for use as either process steam or for the cogeneration of electricity.

3. Shutdown

Multiple commenters supported the EPA’s proposed definition of shutdown. One commenter noted the revised definition’s accommodation of the fact that combustion does not end when the fuel feed is turned off in a grate system

because fuel remaining on a grate continues to combust although fuel has been cut off. To further clarify that the shutdown period begins when no useful steam or electricity is generated, or when fuel is no longer being combusted in the boiler, the EPA has adjusted the definition of shutdown to replace the phrase “makes useful thermal energy” to “supplies useful thermal energy.” The term “supplies” best serves the intended meaning of the definition of shutdown and, in addition, is consistent with the definition of startup.

B. Alternative PM Standard for New Oil-Fired Boilers That Combust Low-Sulfur Oil

In the February 1, 2013, final amendments to the Area Source Boilers Rule, the EPA added a new provision that specifies that certain new or reconstructed oil-fired boilers with heat input capacity of 10 million British thermal units per hour (MMBtu/hr) or greater that combust low-sulfur oil meet GACT for PM, providing the type of fuel combusted is monitored and recorded on a monthly basis. Specifically, the provision applies to boilers combusting only oil that contains no more than 0.50 weight percent sulfur or a mixture of 0.50 weight percent sulfur oil with other fuels not subject to a PM emission limit under this subpart and that do not use a post-combustion technology (except a wet scrubber) to reduce PM or sulfur dioxide emissions. The EPA received a petition asserting that the public lacked an opportunity to comment on the new provision for low-sulfur liquid burning boilers as well as the definition of low-sulfur liquid fuel. In response to the petition, in the January 21, 2015, proposal, we solicited comment on the February 2013 provision, as well as on (1) whether and, if so, to what extent, burning low-sulfur liquid fuels, as defined under the final rule, would control the urban metal HAP for which the category of sources was listed and for which PM serves as a surrogate (*i.e.*, Hg, arsenic, beryllium, cadmium, lead, chromium, manganese, nickel) and (2) whether the final rule’s definition of low-sulfur would allow emissions to exceed the final rule’s emission limit for PM (*i.e.*, 0.03 pound (lb)/MMBtu).

We also solicited comment on an alternative PM standard for new oil-fired boilers that combust “ultra-low-sulfur liquid fuel,” which would be defined as fuel containing no more than 15 parts per million (ppm) sulfur, citing the threshold in the National Emission Standards for Hazardous Air Pollutants for Reciprocating Internal Combustion Engines (RICE NESHAP) and the National Emission Standards for

Hazardous Air Pollutants for Major Sources: Industrial, Commercial, and Institutional Boilers and Process Heaters (Boiler MACT). Specifically, we requested comment on an alternative provision to the February 2013 final rule’s alternative PM standard for new oil-fired boilers that combust low-sulfur oil that would specify that new or reconstructed oil-fired boilers with heat input capacity of 10 MMBtu/hr or greater that combust only ultra-low-sulfur liquid fuel meet GACT for PM providing the type of fuel combusted is monitored and recorded on a monthly basis. We also requested comment on whether and, if so, to what extent burning ultra-low-sulfur liquid fuels (*i.e.*, distillate oil that has less than or equal to 15 ppm sulfur) would control the urban metal HAP for which the category of sources were listed.

In this action, the EPA is finalizing an alternative PM standard for new oil-fired boilers that combust ultra-low-sulfur liquid fuel, as described immediately above and in the January 2015 proposal, in place of the February 2013 final rule’s alternative PM standard for new oil-fired boilers that combust low-sulfur oil, as discussed later in this section of the preamble.

Several commenters agreed with the provision that specifies that boilers combusting low-sulfur oil meet GACT for PM, consistent with the exemption for low-sulfur oil burning boilers in 40 CFR part 60, subpart Dc. One commenter asserted that PM emissions from oil-fired boilers are a function of the sulfur content of the fuel and, because low-sulfur oil has lower PM than high sulfur oil, it necessarily has lower HAP as well. However, another commenter, reiterating many points made in its petition for reconsideration on this topic, asserted that the alternative PM standard for new oil-fired boilers that combust low-sulfur oil is unlawful and arbitrary because the EPA has not shown that the use of low-sulfur liquid fuels will provide meaningful reductions of the urban metal HAP for which area source boilers were listed under CAA section 112(c)(3), and, therefore, its use cannot be GACT.

Two commenters disagreed with the alternative PM standard for new oil-fired boilers that combust low-sulfur oil, as defined in the Area Source Boilers Rule (*i.e.*, oil that contains no more than 0.50 weight percent sulfur). The commenters suggested that fuel oils with a sulfur content of 0.50 weight percent correspond to residual oils, which are associated with higher HAP emissions. The commenters claimed that the rule’s definition of low sulfur is

² See EPA’s July 2016 memorandum, “Assessment of Startup Period for Industrial Boilers,” available in the rulemaking docket (Docket ID No. EPA-HQ-OAR-2006-0790).

too lenient and that boilers combusting fuel oils with 0.50 weight percent sulfur may have PM emissions that exceed the PM emission limit. One of the commenters provided data showing a range of PM emissions between 0.035 to 0.062 lb/MMBtu for four boilers burning oil containing 0.5 weight percent sulfur. On the contrary, one commenter provided graphs of PM emissions data for oil-fired boilers indicating that most of the PM emissions from the boilers burning #2 oil were below the PM emission limit of 0.03 lb/MMBtu.

Several commenters supported an alternative PM standard for new oil-fired boilers combusting ultra-low-sulfur fuels containing no more than 15 ppm sulfur. Another commenter argued that the EPA must show that the use of ultra-low-sulfur liquid fuels will substantially reduce emissions of the urban metal HAP for which area source boilers were listed. The commenter noted that the EPA's finding that use of ultra-low-sulfur fuel significantly reduces emissions of hazardous metals when used in engines, as referenced in the January 2015 proposal, does not support such a conclusion with regard to use of ultra-low-sulfur fuel in area source boilers.

Based on our review of data in the record, additional data obtained from public sources, and public comments, the EPA is finalizing an alternative PM standard that specifies that new or reconstructed oil-fired boilers with heat input capacity of 10 MMBtu/hr or greater that combust only ultra-low-sulfur liquid fuel meet GACT for PM providing the type of fuel combusted is monitored and recorded on a monthly basis. If the source intends to burn a fuel other than ultra-low-sulfur liquid fuel or gaseous fuels as defined in 40 CFR part 63, subpart JJJJJ, they are required to conduct a performance test within 60 days of burning the new fuel. New or reconstructed oil-fired boilers that commenced construction or reconstruction on or before publication of this final action and that are currently meeting the alternative PM standard for low-sulfur oil burning boilers are provided 3 years from publication of this action before becoming subject to the PM emission limit, providing them time to decide how to comply (*i.e.*, combust only ultra-low-sulfur liquid fuel or conduct a performance test demonstrating compliance).

We have determined that PM emissions from boilers firing liquid fuels containing 0.50 weight percent sulfur as allowed under the February 2013 alternative PM standard may exceed the Area Source Boilers Rule PM limit for oil-fired boilers of 0.03 lb/

MMBtu, but that PM emissions from boilers firing liquid fuels containing equal to or less than 15 ppm sulfur (*i.e.*, ultra-low-sulfur liquid fuel) will not exceed the PM limit. A review of information regarding liquid fuel sulfur content and PM emissions levels in the records for the boiler rules found that of the 10 liquid fuel area source boilers that reported PM emissions that exceeded the PM limit in their information collection request (ICR) responses, none fired liquid fuel with sulfur content less than 15 ppm. However, one boiler with emissions exceeding the PM limit (*i.e.*, 0.061 lb/MMBtu) reported that the level of sulfur in their fuel was 0.2 weight percent, a level that is above 15 ppm (0.0015 weight percent), but below the low-sulfur liquid fuel threshold of 0.50 weight percent in the 2013 final rule. Based on these data, along with comments indicating that boilers burning oil containing 0.50 percent sulfur can emit PM at levels above the PM limit, the EPA concludes that the rule's definition of low-sulfur (*i.e.*, 0.50 weight percent) would potentially allow emissions exceeding the PM emission limit, but that boilers burning oil containing no more than 15 ppm sulfur would not emit PM at levels above the PM limit.

In addition, we have determined that burning ultra-low-sulfur liquid fuel controls urban metal HAP. The ultra-low-sulfur liquid fuel threshold of 15 ppm sulfur we are adopting in the final Area Source Boilers Rule is consistent with the sulfur threshold in the Boiler MACT that allows for a reduced PM (or, alternatively, total selected metals (TSM)) testing frequency for light liquid boilers. Further, the PM emission limit for light liquid boilers at major sources is significantly lower than the limit for area source oil-fired boilers (0.0079 lb/MMBtu (existing units) and 0.0011 lb/MMBtu (new units) instead of 0.03 lb/MMBtu). A review of available information for major source boilers burning ultra-low-sulfur liquid fuel identified one major source facility that reported fuel analyses for TSM (*i.e.*, arsenic, beryllium, cadmium, chromium, lead, manganese, nickel, and selenium) and Hg, and those fuel analyses showed that each boiler had TSM and Hg emissions below detection limits and the applicable Boiler MACT TSM and Hg emission limits. The fact that boilers burning ultra-low-sulfur liquid fuel have the ability to meet the TSM and Hg limits based on the best-performing major source boilers provides sound support for our determination that the use of ultra-low-

sulfur liquid fuel in area source boilers will reduce emissions of urban metal HAP.

A detailed discussion of our findings is included in the "Response to 2015 Reconsideration Comments for Industrial, Commercial, and Institutional Boilers at Area Sources: National Emission Standards for Hazardous Air Pollutants" located in the docket.

C. Establishment of a Subcategory and Separate Requirements for Limited-Use Boilers

In the February 1, 2013, final amendments to the Area Source Boilers Rule, the EPA established a limited-use boiler subcategory that includes any boiler that burns any amount of solid or liquid fuels and has a federally enforceable average annual capacity factor of no more than 10 percent. Separate requirements for this subcategory of boilers that operate on a limited basis were also established. Specifically, limited-use boilers are required to complete a tune-up every 5 years. The EPA received a petition asserting that the public lacked an opportunity to comment on the new limited-use boiler subcategory, as well as the tune-up requirement established for the new subcategory. In response to the petition, in the January 21, 2015, proposal, we solicited comment regarding whether the separate requirements for a limited-use boiler subcategory are necessary or appropriate. The EPA is retaining the limited-use boiler subcategory and its separate requirements, as discussed later in this section of the preamble.

Multiple commenters agreed that separate requirements for limited-use boilers are appropriate. One commenter asserted that limited-use boilers qualify for subcategorization due to unique operating characteristics that merit class and type distinctions allowed under CAA section 112(d)(1). Two commenters explained that these units spend a larger percentage of time starting up and shutting down than regular-use boilers which causes their emissions profiles to be different, and many pollution control technologies are difficult to use or ineffective during startup and shutdown and would be cost-prohibitive to install and use. One commenter stated that the designation of a limited-use boiler subcategory is appropriately consistent with the similar subcategory for seasonal boilers. Several commenters stated that a limited-use boiler subcategory is appropriately consistent with the similar limited-use subcategory in the Boiler MACT.

Multiple commenters supported the 5-year tune-up requirement for limited-use boilers. Two commenters stated that it would be illogical to require such boilers to comply with the same tune-up schedule as other boilers, which is every 2 years, given their limited operational time and intermittent operating schedules. One commenter claimed that more frequent tune-ups would not provide any meaningful environmental benefits given the limited operating profiles of limited-use units, noting that despite the 5-year tune-up frequency, limited-use boilers will still conduct tune-ups after less operating time than boilers in other subcategories.

One commenter objected to the EPA's decision to create a separate subcategory for these boilers and for requiring nothing more than one tune-up every 5 years for these boilers. The commenter stated that the limited-use boilers subcategory is unlawful and arbitrary because the EPA is not distinguishing between different classes, types, or sizes of sources and has not explained why boilers operating for fewer total hours during the year is a distinction that requires differential treatment. The commenter further stated that infrequent tune-ups are neither a control technology nor a management practice that will reduce emissions and that nothing in the record demonstrates that the requirement to conduct a tune-up every 5 years will actually reduce emissions of HAP. The commenter asserted that in light of the determination that more frequent tune-ups are GACT for other area boilers, it is unlawful and arbitrary for the EPA to require tune-ups for limited-use boilers only every 5 years.

The EPA has retained the subcategory and separate requirements for limited-use boilers as finalized in the February 2013 final rule. We disagree with the comments objecting to the limited-use boiler subcategory and the requirement that limited-use boilers complete a tune-up every 5 years. The EPA has concluded that limited-use boilers are a unique class of unit based on the unique way in which they are used (*i.e.*, they operate for unpredictable periods of time, limited hours, and at less than full load in many cases) and has determined that regulating these units with periodic tune-up work practice and management practice requirements will limit HAP by ensuring that these units operate at peak efficiency during the limited hours that they do operate. In the preamble to the June 4, 2010, proposed standards for area source boilers, the EPA explained that a boiler tune-up provides potential savings from energy efficiency

improvements and pollution prevention, and that improvement in energy efficiency results in decreased fuel use which results in a corresponding decrease in emissions (both HAP and non-HAP) from the boiler (75 FR 31908). Specifically, for any boiler conducting a tune-up, a 1-percent gain in combustion efficiency was estimated, resulting in an estimated 1-percent emissions reduction of all pollutants.³

The EPA continues to conclude, as previously stated in the February 2013 final rule, that establishing a limited-use subcategory was reasonable. First, we pointed out that it is technically infeasible to test these limited-use boilers since these units serve as back-up energy sources and their operating schedules can be intermittent and unpredictable. Next, we pointed out that boilers that operate no more than 10 percent of the year (*i.e.*, a limited-use boiler) would operate for no more than 6 months in between tune-ups on a 5-year tune-up cycle. We then explained that the brief period of operations for these limited-use boilers is even less than the number of operating months that seasonal boilers and full-time boilers will operate between tune-ups. Finally, we noted that the irregular schedule of operations also makes it difficult to schedule more frequent tune-ups.

D. Establishment of a Provision That Eliminates Further Performance Testing for PM for Certain Boilers Based on Their Initial Compliance Test

In the February 1, 2013, final amendments to the Area Source Boilers Rule, the EPA added a new provision that specifies that further PM emissions testing does not need to be conducted if, when demonstrating initial compliance with the PM emission limit, the performance test results show that the PM emissions from the affected boiler are equal to or less than half of the applicable PM emission limit. The EPA received a petition asserting that the public lacked opportunity to comment on the new provision that eliminates further performance testing for PM for certain boilers based on their initial compliance test. In response to the petition, in the January 21, 2015, proposal, we solicited comment on the February 2013 provision, specifically requesting comment and supporting information on the magnitude and range of variability in PM and urban metal

HAP emissions from individual boilers. More specifically, we requested comment on whether the emissions variability at an individual boiler could result in an exceedance of the PM limit by such boiler whose PM emissions are demonstrated to be equal to or less than half of the PM emission limit (*i.e.*, a doubling or more of PM emissions). We also requested comment on whether a requirement to burn only the fuel types and mixtures used to demonstrate that a boiler's PM emissions are equal to or less than half of the PM limit would limit PM emissions variability.

The EPA also solicited comment on an alternative provision that would specify less frequent performance testing for PM based on the initial compliance test. Instead of eliminating further PM performance testing, the alternative provision would specify that when demonstrating initial compliance with the PM emission limit, if the performance test results show that the PM emissions from the affected boiler are equal to or less than half of the applicable PM emission limit, additional PM emissions testing would not need to be conducted for 5 years. We stated that, in such instances, the owner or operator would be required to continue to comply with all applicable operating limits and monitoring requirements. We requested comment on also including a requirement that the owner or operator only burn the fuel types and fuel mixtures used to demonstrate that the PM emissions from the affected boiler are equal to or less than half of the applicable PM emission limit.

In this action, the EPA is finalizing the alternative provision that requires further PM performance testing every 5 years for certain boilers based on their initial compliance test, as described immediately above and in the January 2015 proposal, in place of the February 2013 final rule's provision that eliminated further PM performance testing for such boilers, as discussed later in this section of the preamble. As also discussed in this section of the preamble, we are finalizing a requirement that a PM performance test must be conducted if the owner or operator decides to use a fuel type, other than ultra-low-sulfur liquid fuel or gaseous fuels, that was not used when demonstrating that the PM emissions from their boiler were equal to or less than half of the PM emission limit.

Several commenters agreed with the provision that eliminates further PM performance testing when initial compliance tests show that PM emissions are equal to or less than half of the limit and that requires the owner

³ "Revised Methodology for Estimating Impacts from Industrial, Commercial, Institutional Boilers at Area Sources of Hazardous Air Pollutant Emissions" (Docket entry: EPA-HQ-OAR-2006-0790-2314).

or operator to continue to comply with all applicable operating limits and monitoring requirements. One commenter agreed with the provision eliminating further PM performance testing as long as the owner or operator is required to burn only the fuel types and mixtures used during the initial testing. Two commenters noted that the provision promotes good PM performance from new boilers while acknowledging that some boilers are inherently low-emitting and should be spared the expense of ongoing performance testing where operations remain consistent. One commenter stated that by setting the threshold at equal to or less than half of the emission limit, there is sufficient buffer against the limit to account for any variability in emission levels, and added that because the unit must continue to comply with operating limits and monitoring requirements, there are safeguards to ensure there are no changes in operation of the boiler or air pollution control equipment that could increase emissions. Another commenter claimed that the provision is in line with other MACT standards and new source performance standards (NSPS) which require only one initial performance test unless there is a physical change to the control device, and added that HAP emissions change only when operating parameters change or when design changes occur.

Two commenters objected to the provision that eliminates further PM performance testing when initial compliance tests show that PM emissions are equal to or less than half of the limit. One commenter claimed that there are no requirements to prevent the facility from changing the fuel type and fuel mixture from those used in the initial compliance testing and a change in fuel type or mixture could result in an increase in PM emissions. Another commenter asserted that it is arbitrary to conclude that a source that measures low emissions in one test will have emissions below the limit thereafter. The commenter claimed that many boilers burn combinations of fuels of varying proportions (*e.g.*, biomass and coal), and because sources are allowed to change their fuel mix within a given fuel type and to change their fuel supplier without changing subcategories, PM emissions from an individual source are likely to be highly variable. The commenter further noted that the EPA has routinely acknowledged the variability inherent in industrial boiler emissions, and that EPA data demonstrate that PM

emissions from boilers are highly variable.

For the same reasons, these two commenters also objected to the alternative provision that would require less frequent (once every 5 years) PM performance testing when initial compliance tests show that PM emissions are equal to or less than half of the limit in lieu of totally eliminating further PM performance testing. One commenter, however, provided an alternative recommendation that eliminates further PM testing as long as sources whose initial compliance testing showed PM emissions equal to or less than half of the limit continue to combust the same fuel type and mixture used during the initial compliance testing. Under the commenter's alternative, if the source elects to change the fuel type or mixture being combusted, the source would be required to demonstrate compliance with the PM emission limit no more than 60 days after the change in fuel type or mixture.

Based on our review of the public comments and data available on PM and metallic HAP emissions for which PM serves as a surrogate, the EPA is finalizing the provision that specifies that further PM emissions testing does not need to be conducted for 5 years if, when demonstrating initial compliance with the PM emission limit, the performance test results show that the PM emissions from the affected boiler are equal to or less than half of the applicable PM emission limit. In such instances, the owner or operator would be required to continue to comply with all applicable operating limits and monitoring requirements. If the source burns a new type of fuel other than ultra-low-sulfur liquid fuel or gaseous fuels, then a new performance test is required within 60 days of burning the new fuel type. New or reconstructed boilers that commenced construction or reconstruction on or before publication of this final action and that previously demonstrated that their PM emissions were equal to or less than half of the PM emission limit are provided 5 years from publication of this action before they are required to conduct a performance test unless a new type of fuel, other than ultra-low-sulfur liquid fuel or gaseous fuels, is burned. In that situation, a new performance test is required within 60 days of burning the new fuel type. Boilers with test results that show that PM emissions are greater than half of the PM emission limit are required to conduct PM testing every 3 years.

We have concluded that a provision that reduces the frequency of testing, rather than eliminates further testing, is

more appropriate and environmentally protective for long-term compliance with the PM emission limit, but still provides compliance flexibility for low-emitting boilers. A review of PM emissions information in the records for the boiler rules identified several instances where PM emissions variability at an individual major source boiler was such that the minimum test average was below half of the Area Source Boilers Rule PM emission limit and the maximum test average was above the emission limit. Specifically, of 40 coal-fired major source boilers with multiple PM test events, four had such an instance. An investigation into urban metal HAP emission variability informed the EPA that metallic HAP emissions from individual boilers, for which PM serves as a surrogate, can vary and further supports our conclusion that periodic testing is necessary to provide compliance assurance that changes in operation of the boiler or air pollution control equipment have not increased PM emissions. Examination of the variability in non-Hg metallic HAP emissions at individual boilers showed average ratios of maximum emission rates to minimum emission rates for major source boilers with multiple test results for TSM to be 2.79 for biomass-fired boilers and 2.55 for coal-fired boilers, and showed emission ratios for cadmium and lead for several biomass-fired area source boilers with multiple test results that ranged from 1.00 to 7.28 for cadmium and 1.00 to 6.40 for lead. Because PM is a surrogate for Hg for biomass- and oil-fired area source boilers, Hg variability at individual boilers was also examined, showing emission ratios of 4.6 for an area source biomass-fired boiler with multiple Hg fuel analysis samples and 3.2 and 16.2 for area source biomass-fired boilers with multiple Hg performance tests.

The January 2015 proposal requested comment on whether a requirement to burn only the fuel types and mixtures used to demonstrate that a boiler's PM emissions are equal to or less than half of the PM limit would limit PM emissions variability and also requested comment on including such a requirement. For the same reasons the EPA concluded that periodic testing (*i.e.*, every 5 years) for these low-emitting boilers is necessary to provide long-term compliance assurance (*i.e.*, the intra-unit variability in PM and metal HAP emissions identified based on a review of the public comments and available data), we have concluded that introduction of a new fuel type, other than ultra-low-sulfur liquid fuel or

gaseous fuels, in between the 5-year tests requires a new performance test within 60 days of burning a new fuel type. 40 CFR 63.11212(c) requires that performance stack tests be conducted while burning the type of fuel or mixture of fuels that have the highest emissions potential for each regulated pollutant. The burning of a new fuel type, whether alone or in a mixture of fuels, could potentially increase emissions. Thus, we believe that this new requirement to test when a new fuel type is burned, along with the requirement in 40 CFR 63.11212(c) to test while burning the type of fuel or mixture of fuels that have the highest emissions potential, will limit PM emissions variability.

A detailed discussion of our findings is included in the "Response to 2015 Reconsideration Comments for Industrial, Commercial, and Institutional Boilers at Area Sources: National Emission Standards for Hazardous Air Pollutants" located in the docket.

E. Establishment of a Provision That Eliminates Further Fuel Sampling for Mercury for Certain Coal-Fired Boilers Based on Their Initial Compliance Demonstration

In the February 1, 2013, final amendments to the Area Source Boilers Rule, the EPA added a new provision that specifies that further fuel analysis sampling does not need to be conducted if, when demonstrating initial compliance with the Hg emission limit based on fuel analysis, the Hg constituents in the fuel or fuel mixture are measured to be equal to or less than half of the Hg emission limit. The EPA received a petition asserting that the public lacked an opportunity to comment on the new provision that eliminates further fuel sampling for Hg for certain coal-fired boilers based on their initial compliance demonstration. In response to the petition, in the January 21, 2015, proposal, we solicited comment on the February 2013 provision, specifically requesting comment and supporting information on the magnitude and range of variability in Hg content in coal that is likely to be combusted in an individual boiler. More specifically, we requested comment on whether the variability within a specific fuel type or fuel mixture could result in an exceedance of the Hg limit by a boiler in the coal subcategory whose Hg content in their fuel or fuel mixture are demonstrated to be equal to or less than half of the Hg emission limit (*i.e.*, a doubling or more of Hg emissions).

The EPA also solicited comment on an alternative provision that would specify less frequent fuel analysis sampling for Hg based on the initial compliance demonstration. Instead of eliminating further fuel analysis sampling for Hg, the alternative provision would specify that when demonstrating initial compliance with the Hg emission limit based on fuel analysis, if the Hg constituents in the fuel or fuel mixture are measured to be equal to or less than half of the Hg emission limit, additional fuel analysis sampling for Hg would not need to be conducted for 12 months. We stated that, in such instances, the owner or operator would be required to continue to comply with all applicable operating limits and monitoring requirements, which include only burning the fuel types and fuel mixtures used to demonstrate compliance and keeping monthly records of fuel use.

In this action, the EPA is finalizing the alternative provision that requires further fuel analysis sampling for Hg every 12 months for certain coal-fired boilers based on their initial compliance demonstration, as described immediately above and in the January 2015 proposal, in place of the February 2013 final rule's provision that eliminated further fuel analysis sampling for Hg for such boilers, as discussed later in this section of the preamble.

Three commenters agreed with the provision that eliminates further fuel sampling for Hg for coal-fired boilers when initial compliance demonstrations based on fuel analysis show that the Hg constituents in their fuel or fuel mixture are equal to or less than half of the Hg emission limit and that requires the owner or operator to continue to comply with all applicable operating limits and monitoring requirements. Two commenters stated that the coal Hg content data in the EPA's Boiler MACT survey database support the provision in that the majority of the data is lower than the Hg emission limit for area source coal-fired boilers. The commenters noted that the provision promotes use of low-mercury coal, one stating that the Hg content in petroleum coke has very little variability and referencing a particular facility where the Hg content is well below the Hg limit. One commenter further stated that the provision eliminates unnecessary reporting without compromising the environmental and health benefits of the Area Source Boilers Rule. Another commenter noted that for units complying with the Hg limit, subsequent fuel analysis would not provide additional useful information,

is unnecessary, and the costs are unwarranted.

One commenter supported the alternative provision that would require less frequent (once every 12 months) fuel analysis sampling for Hg when initial compliance demonstrations based on fuel analysis show that the Hg constituents in the fuel or fuel mixture are equal to or less than half of the limit in lieu of totally eliminating further fuel sampling for Hg.

One commenter objected to a provision that eliminates or reduces further fuel sampling for Hg when initial compliance demonstrations based on fuel analysis show that the Hg constituents in the fuel or fuel mixture are equal to or less than half of the limit. The commenter asserted that because the EPA has promulgated MACT standards for coal-fired boilers at area sources, it is arbitrary and unlawful to not require monitoring sufficient to assure compliance with the standards. The commenter further asserted that a single fuel analysis showing Hg content at or below half of the limit does not assure compliance with the standard in perpetuity, particularly in light of the high variability of the Hg content of the fuels burned. The commenter added that sources are allowed to burn highly non-homogenous fuels without changing subcategories, which enables a high degree of variability in emissions, and that many coal-fired boilers co-fire biomass of varying proportions. The commenter included their analysis of EPA fuel analysis data for major and area source boilers that shows that 22.5 percent of sources experienced sufficient variability in the Hg content of their coal to obtain a result in one fuel analysis low enough to exempt them from any future fuel sampling, while another analysis at the same facility exceeds the provision's Hg content limit. The commenter asserted that biomass fuels also have a large range of variability in Hg content.

Based on our review of the public comments and the data available for quantifying variability in coal Hg content, the EPA is finalizing the provision that specifies that further fuel analysis sampling for Hg does not need to be conducted for 12 months if, when demonstrating initial compliance with the Hg emission limit based on fuel analysis, the Hg constituents in the fuel or fuel mixture are measured to be equal to or less than half of the Hg emission limit. New or reconstructed boilers that commenced construction or reconstruction on or before publication of this final action and that previously demonstrated that the Hg constituents in their fuel or fuel mixture were equal

to or less than half of the Hg emission limit are provided 12 months from publication of this action before they are required to conduct fuel analysis sampling for Hg. The owner or operator is required to continue to comply with all applicable operating limits and monitoring requirements, which include only burning the fuel types and fuel mixtures used to demonstrate compliance and keeping monthly records of fuel use. As specified in 40 CFR 63.11220, a fuel analysis must be conducted before burning a new type of fuel or fuel mixture. Boilers with fuel analysis results that show that Hg constituents in the fuel or fuel mixture are greater than half of the Hg emission limit are required to conduct quarterly sampling.

A review of Hg fuel analysis data for area source coal-fired boilers informed the EPA that Hg content in coal combusted in individual boilers can vary by more than a factor of two. Specifically, of ten coal-fired boilers with multiple fuel analysis samples, four had ratios of maximum to minimum Hg emission rates that were greater than two (*i.e.*, 2.2, 3.0, 5.8, and 11.2). In addition, two of the boilers had fuel samples with Hg content that were less than half of the emission limit but other samples with Hg content that exceeded the emission limit. Based on this information, the EPA does not believe that finalizing a provision that eliminates further fuel analysis sampling for Hg based on a single demonstration is appropriate or environmentally protective for long-term compliance, but has concluded that it is appropriate to provide some compliance flexibility by reducing periodic fuel sampling for boilers combusting coal with low Hg content to every 12 months.

A detailed discussion of our findings is included in the “Response to 2015 Reconsideration Comments for Industrial, Commercial, and Institutional Boilers at Area Sources: National Emission Standards for Hazardous Air Pollutants” located in the docket.

IV. Technical Corrections and Clarifications

In the January 21, 2015, notice of reconsideration, the EPA also proposed to correct typographical errors and clarify provisions of the final rule that may have been unclear. This section of the preamble summarizes the refinements made to the proposed corrections and clarifications, as well as corrections and clarifications being finalized based on comment.

A. Affirmative Defense for Violation of Emission Standards During Malfunction

The EPA received numerous comments on its proposal to remove from the current rule the affirmative defense to civil penalties for violations caused by malfunctions. Several commenters supported the removal of the affirmative defense for malfunctions. Other commenters opposed the removal of the affirmative defense provision.

First, a commenter (AF&PA) urged the EPA to publish a new or supplemental statement of basis and purpose for the proposed rule that explains (and allows for public comment on) the appropriateness of applying the boiler emission standards to malfunction periods without an affirmative defense provision.

Second, a commenter (AF&PA) argued the affirmative defense was something that the EPA considered necessary when the current standards were promulgated; it was part of the statement of basis and purpose for the standards required to publish under CAA section 307(d)(6)(A).

Third, commenters (CIBO/ACC) argued that the EPA should not remove the affirmative defense until the issue is resolved by the Court. Furthermore commenters (CIBO/ACC and AF&PA) argued the Natural Resources Defense Council (NRDC) Court decision that the EPA cites as the reason for eliminating the affirmative defense provisions does not compel the EPA’s action to remove the affirmative defense in this rule.

Fourth, commenters (CIBO/ACC and AF&PA) argued that without affirmative defense or adjusted standards, the final rule provides sources no means of demonstrating compliance during malfunctions.

Fifth, commenters (CIBO/ACC, AF&PA, and Class of ‘85 Regulatory Response Group) urged the EPA to establish work practice standards that would apply during periods of malfunction instead of the emission rate limits, or a combination of work practices and alternative numerical emission limitations. Commenters noted that the EPA can address malfunctions using the authority Congress gave it in CAA sections 112(h) and 302(k) to substitute a design, equipment, work practice, or operational standard for a numerical emission limitation.

The Court recently vacated an affirmative defense in one of the EPA’s CAA section 112(d) regulations. *NRDC v. EPA*, No. 10–1371 (D.C. Cir. April 18, 2014) 2014 U.S. App. LEXIS 7281 (vacating affirmative defense provisions in the CAA section 112(d) rule establishing emission standards for

Portland cement kilns). The Court found that the EPA lacked authority to establish an affirmative defense for private civil suits and held that under the CAA, the authority to determine civil penalty amounts in such cases lies exclusively with the courts, not the EPA. Specifically, the Court found: “As the language of the statute makes clear, the courts determine, on a case-by-case basis, whether civil penalties are ‘appropriate.’” *see* NRDC, 2014 U.S. App. LEXIS 7281 at *21 (“[U]nder this statute, deciding whether penalties are ‘appropriate’ in a given private civil suit is a job for the courts, not EPA.”). As a result, the EPA is not including a regulatory affirmative defense provision in the final rule. The EPA notes that removal of the affirmative defense does not in any way alter a source’s compliance obligations under the rule, nor does it mean that such a defense is never available.

Second, the EPA notes that the issue of establishing a work practice standard for periods of malfunctions or developing standards consistent with performance of best performing sources under all conditions, including malfunctions, was raised previously; *see* the discussion in the March 21, 2011, preamble to the final rule (76 FR 15560). In the most recent notice of proposed reconsideration (80 FR 2871, January 21, 2015), the EPA proposed to remove the affirmative defense provision, in light of the NRDC decision. The EPA did not propose or solicit comment on any revisions to the requirement that emissions standards be met at all times, or on alternative standards during periods of malfunctions. Therefore, the question of whether the EPA can and should establish different standards during malfunction periods, including work practice standards, is outside the scope of this final reconsideration action.

Finally, in the event that a source fails to comply with an applicable CAA section 112(d) standard as a result of a malfunction event, the EPA’s (or other delegated or approved authority’s) ability to exercise its case-by-case enforcement discretion to determine an appropriate response provides sufficient flexibility in such circumstances as was explained in the preamble to the proposed rule. Further, as the Court recognized, in an EPA (or other delegated or approved authority) or citizen enforcement action, the Court has the discretion to consider any defense raised and determine whether penalties are appropriate. *Cf. NRDC*, 2014 U.S. App. LEXIS 7281 at *24 (arguments that violation were caused by unavoidable technology failure can

be made to the courts in future civil cases when the issue arises). The same is true for the presiding officer in EPA administrative enforcement actions. The EPA notes that the Court in *United States Sugar Corp v. EPA* (No. 11–1108, D.C. Cir., July 29, 2016) (slip op. at 34–36) rejected challenges to the EPA’s approach of applying limits during periods of malfunctions, not establishing a separate work practice, and relying on enforcement discretion in individual cases.

B. Definition of Coal

The last part of the definition of coal published in the March 21, 2011, final rule (76 FR 15554) reads as follows: “Coal derived gases are excluded from this definition [of coal].” In the January 2015 proposal (80 FR 2871), the EPA proposed to modify this definition to read as follows: “Coal derived gases and liquids are excluded from this definition [of coal].” The EPA characterized its proposed change to the definition as one of several “clarifying changes and corrections.” This proposed change was based on a question received on whether coal derived liquids were meant to be included in the coal definition.

The EPA received a comment disagreeing with the proposed change to

the definition of coal. The commenter (CIBO/ACC) asserted that the revised definition is not logically consistent with the other fuel definitions and irrationally recategorizes specific units as liquid fuel fired where a data analysis would rationally lead them to remaining in the solid fuel category. Specifically, the commenter contended that it is illogical to treat coal derived liquids differently than coal-water mixtures and coal-oil mixtures, both of which are included in the proposed revised definition of “coal.” The commenter explained that coal-water mixtures and coal-oil mixtures are both included in the definition and both are utilized as liquid oil or gas replacements fuels, similar to utilization of coal derived liquids.

The EPA also proposed the same modification to the definition of coal included in the Boiler MACT (80 FR 3090, January 21, 2015) and subsequently received several comments disagreeing with the proposed change in that action that we also believe are appropriate to consider in this action. Specifically, one commenter who operates a facility with coal derived liquids contended that the composition and emission profile of coal derived liquids more closely

resemble the coal from which they are derived than liquid fuels. The commenter also noted that coal derived liquid fuels are treated as coal/solid fossils in other related rules such as 40 CFR part 60, subpart Db.

Based on these comments, the EPA is not finalizing any changes to the definition of coal. The definition published on March 21, 2011 (76 FR 15554) remains unchanged. As noted by the commenters, treating coal liquids as coal is consistent with the ICI Boiler NSPS (40 CFR part 60, subpart Db), and the EPA agrees with the commenters that coal derived liquids are more similar to coal solid fuels than liquid fuels.

C. Other Corrections and Clarifications

In finalizing the rule, the EPA is addressing several other technical corrections and clarifications in the regulatory language based on public comments that were received in response to the January 2015 proposal and other feedback as a result of implementing the rule. In addition to the changes outlined in Table 1 of the January 21, 2015, proposal (80 FR 2879), the EPA is finalizing several other changes, as outlined in Table 2 as follows:

TABLE 2—SUMMARY OF TECHNICAL CORRECTIONS AND CLARIFICATIONS SINCE JANUARY 2015 PROPOSAL

Section of subpart JJJJJ	Description of correction
63.11195(c)	• Revised the paragraph to remove “unless such units do not combust hazardous waste and combust comparable fuels.” The comparable fuels exclusion codified in 40 CFR 261.38 was vacated by the Court.
63.11223(c)	• Revised the paragraph to clarify the oxygen level set point for a source not subject to emission limits. The following sentence was added at the end of the paragraph, “If an oxygen trim system is utilized on a unit without emission standards to reduce the tune-up frequency to once every 5 years, set the oxygen level no lower than the oxygen concentration measured during the most recent tune-up.” This clarification was made instead of the proposed clarification to 63.11224(a)(7).
63.11225(e)	• Revised the paragraph to include current electronic reporting procedures.
63.11237	• Revised the definition of “Liquid fuel” to remove the phrase “and comparable fuels as defined under 40 CFR 261.38.” The comparable fuels exclusion codified in 40 CFR 261.38 was vacated by the Court. • Revised the definition of “Voluntary consensus standards (VCS)” to correct typographical errors.

V. Other Actions We Are Taking

Section 307(d)(7)(B) of the CAA states that “[o]nly an objection to a rule or procedure which was raised with reasonable specificity during the period for public comment (including any public hearing) may be raised during judicial review. If the person raising an objection can demonstrate to the Administrator that it was impracticable to raise such objection within such time or if the grounds for such objection arose after the period for public comment (but within the time specified for judicial review) and if such objection is of central relevance to the outcome of the rule, the Administrator shall

convene a proceeding for reconsideration of the rule and provide the same procedural rights as would have been afforded had the information been available at the time the rule was proposed. If the Administrator refuses to convene such a proceeding, such person may seek review of such refusal in the United States court of appeals for the appropriate circuit (as provided in subsection (b)).”

As to the first procedural criterion for reconsideration, a petitioner must show why the issue could not have been presented during the comment period, either because it was impracticable to raise the issue during that time or because the grounds for the issue arose

after the period for public comment (but within 60 days of publication of the final action). The EPA is denying the petition for reconsideration on one issue (*i.e.*, Authority to Require an Energy Assessment) because this criterion has not been met. With respect to that issue, the petition reiterates comments made on the June 4, 2010, proposed rule during the public comment period for that rule. The EPA responded to those comments in the final rule and made appropriate revisions to the proposed rule after consideration of public comments received. It is well established that an agency may refine its proposed approach without providing an additional opportunity for public

comment. *See Community Nutrition Institute v. Block*, 749 F.2d at 58 and *International Fabricare Institute v. EPA*, 972 F.2d 384, 399 (D.C. Cir. 1992) (notice and comment is not intended to result in “interminable back-and-forth[.]” nor is agency required to provide additional opportunity to comment on its response to comments) and *Small Refiner Lead Phase-Down Task Force v. EPA*, 705 F.2d 506, 547 (D.C. Cir. 1983) (“notice requirement should not force an agency endlessly to repropose a rule because of minor changes”).

In the EPA’s view, an objection is of central relevance to the outcome of the rule only if it provides substantial support for the argument that the promulgated regulation should be revised. *See Union Oil v. EPA*, 821 F.2d 768, 683 (D.C. Cir. 1987) (the Court declined to remand the rule because petitioners failed to show substantial likelihood that the final rule would have been changed based on information in the petition). *See also* the EPA’s Denial of the Petitions to Reconsider the Endangerment and Cause or Contribute Findings for Greenhouse Gases under section 202 of the CAA, 75 FR at 49556, 49561 (August 13, 2010). *See also*, 75 FR at 49556, 49560–49563 (August 13, 2010), and 76 FR at 4780, 4786–4788 (January 26, 2011) for additional discussion of the standard for reconsideration under CAA section 307(d)(7)(B).

In this final decision, several changes that are corrections, editorial changes, and minor clarifications have been made. In one instance, one of those changes made a petitioner’s issue (*i.e.*, Averaging Period for CO) moot. Therefore, we are denying reconsideration of that issue.

A. Request for Reconsideration of the Energy Assessment Requirement

The petitioner (AF&PA) alleged that a beyond-the-floor requirement of an energy assessment is outside the EPA’s authority to set emissions standards under CAA section 112(d)(1) “for each category or subcategory of major sources and area sources.” The petition contends that the EPA has defined the source category for these rules to include only specified types of boilers and process heaters and, therefore, those are the only sources for which the EPA may set standards under these rules.

The petitioner also alleged that the energy assessment requirement is not an “emissions standard” as that term is defined in the CAA and, therefore, the EPA does not have authority to prescribe such requirements. The petition contends that, furthermore, as a

practical matter, even if energy efficiency projects are implemented, there is no guarantee that there will be a corresponding reduction in HAP emissions from affected boilers and process heaters.

While the petition refers to not only boilers, but also “process heaters,” the EPA has defined the source category for the Area Source Boilers Rule to include only specified types of boilers and, therefore, those are the only sources for which the EPA has set standards under this rule. The petitioner has not demonstrated that it was impracticable to comment on these issues during the public comment period on the proposed Area Source Boilers Rule. In fact, petitioners provided the same comments during that comment period, and subsequently challenged the EPA’s establishment of the energy assessment requirement. The Court in *United States Sugar Corp. v. EPA* (No. 11–1108, D.C. Cir., July 29, 2016)(slip op. at 52) rejected challenges to the energy assessment rule both as a beyond the floor MACT standard and as a GACT standard. Therefore, the EPA is denying the petition for reconsideration of this issue.

B. Request for Clarification of the Averaging Period for CO

One petitioner (AF&PA) requested clarification in Table 1 to subpart JJJJJ of part 63. Specifically, Items 1 and 2 in Table 1 specify that units can comply with the CO limit using a 3-run average or a 10-day rolling average (when using CO CEMS). The Item 6 entry for CO does not include the averaging period text. The petitioner requested that text be added to Table 1, Item 6 that clarifies the averaging period for the CO limit (*i.e.*, “3-run average or 10-day rolling average”).

Item 6 of Table 1 to subpart JJJJJ of part 63 has been amended to clarify that either a 3-run average or a 10-day rolling average is an appropriate averaging period for the CO emission limit. The petitioner’s comments are, therefore, now moot and we are denying reconsideration on this issue.

VI. Impacts Associated With This Final Rule

This action finalizes certain provisions and makes technical and clarifying corrections, but does not promulgate substantive changes to the February 2013 final Area Source Boilers Rule (78 FR 7488). The EPA is finalizing the definitions of startup and shutdown that were promulgated in the February 2013 final rule along with revisions we proposed to make to those definitions, including an alternate definition of

startup, and minor adjustments based on public comments. The revisions to the definitions of startup and shutdown clarify the beginning and end of startup and shutdown periods, but do not change the regulatory requirements that apply during those periods or the boilers that are subject to those requirements. We are retaining the subcategory and separate requirements for limited-use boilers, consistent with the February 2013 final rule. The EPA is amending the reconsidered provisions regarding the alternative PM standard for new oil-fired boilers that combust low-sulfur oil, the elimination of further performance testing for PM for certain boilers based on their initial compliance test, and the elimination of further fuel sampling for Hg for certain coal-fired boilers based on their initial compliance demonstration, consistent with the alternative provisions for which comment was solicited in the January 2015 proposal.

Promulgation of the amendments contained in this action does not change the coverage of the final rule nor does it affect the estimated emission reductions, control costs or the benefits of the rule in substance compared to the March 2011 final rule. The EPA explained in the preamble to the February 2013 final rule that promulgated amendments, including this action’s five reconsidered provisions, that those amendments did not impose any additional regulatory requirements beyond those imposed by the March 2011 final rule and, in fact, would result in a decrease in burden. We further explained that, as compared to the control costs estimated for the March 2011 final rule, the February 2013 final action would not result in any meaningful change in capital and annual cost. *See* 78 FR 7503. Similarly, although this action amends three of the reconsidered provisions, it does not impose any additional regulatory requirements beyond those imposed by the March 2011 final rule and would result in a decrease in that burden. As discussed in detail in sections III.B, D, and E of this preamble, the three amended provisions regard compliance flexibilities provided in the February 2013 final rule that we have now determined need to be adjusted to be more environmentally protective and ensure compliance with the CAA. Thus, when compared to the February 2013 provisions, the amended provisions could result in minimal additional impacts on boilers that choose to comply with the amended provisions. In that they are compliance flexibilities and a facility’s ability to use the

provisions will be on a site-specific basis, the EPA cannot anticipate who will be in a position to use the provisions. We, however, can generally describe what those potential impacts would be.

As discussed in section III.B of this preamble, the EPA is finalizing an alternative PM standard that specifies that new or reconstructed boilers that combust only ultra-low-sulfur liquid fuel (*i.e.*, a distillate oil that has less than or equal to 15 ppm sulfur) meet GACT for PM in place of the February 2013 final rule's alternative PM standard for new or reconstructed oil-fired boilers that combust low-sulfur oil (*i.e.*, oil that contains no more than 0.50 weight percent sulfur). The provision being finalized that specifies that certain boilers meet GACT for PM and, thus, are not subject to the PM emission limit, potentially applies to the subset of oil-fired boilers that are subject to PM emission limits (*i.e.*, new and reconstructed boilers with heat input capacity of 10 MMBtu/hr or greater), including boilers currently meeting the alternative PM standard for boilers that combust low-sulfur oil. The provision being finalized may result in a minimal increase in burden on that subset of sources, when compared to the February 2013 provision that specified that low-sulfur oil-burning boilers meet GACT for PM and are not subject to the PM emission limit. Boilers currently meeting the alternative PM standard for low-sulfur oil burning boilers are provided 3 years from publication of this action before becoming subject to the PM emission limit, providing them time to decide how to comply (*i.e.*, combust only ultra-low-sulfur liquid fuel or conduct a performance stack test demonstrating compliance with the PM emission limit). A number of such boilers, however, would not experience any increase in burden if they were meeting the February 2013 provision by burning ultra-low-sulfur liquid fuel. Specifically, this would be the situation in states such as New York, Connecticut, and New Jersey, which currently limit the sulfur content in oil used for heating purposes to less than 15 ppm. Oil-fired boilers in Maine, Massachusetts, and Vermont used for heating will become subject to 15 ppm sulfur requirements in 2018, which is within the 3-year compliance period provided to boilers currently meeting the alternative PM standard for low-sulfur oil burning boilers. The burden associated with the provision being finalized is still less than the burden that was imposed by the March 2011 final rule which required all oil-fired

boilers subject to a PM emission limit to conduct performance stack testing for PM every 3 years.

As discussed in section III.D of this preamble, the EPA is finalizing a provision that specifies that when demonstrating initial compliance with the PM emission limit, if performance test results show that PM emissions from an affected boiler are equal to or less than half of the applicable PM emission limit, additional PM emissions testing does not need to be conducted for 5 years in place of the February 2013 final rule's provision that eliminated further PM performance testing for such boilers. The provision being finalized that allows certain boilers to conduct PM emissions testing every 5 years potentially applies to the subset of boilers that are subject to PM emission limits (*i.e.*, new and reconstructed boilers with heat input capacity of 10 MMBtu/hr or greater), including boilers that previously demonstrated that their PM emissions were equal to or less than half of the PM emission limit. The provision being finalized will result in a minimal increase in burden on that subset of sources, when compared to the February 2013 provision that eliminated further PM emissions testing for such sources, in that they will be required to conduct a performance stack test for PM every 5 years. The burden associated with the provision being finalized is still less than the burden that was imposed by the March 2011 final rule which required all boilers subject to a PM emission limit to conduct performance stack testing for PM every 3 years.

As discussed in section III.E of this preamble, the EPA is finalizing a provision that specifies that when demonstrating initial compliance with the Hg emission limit based on fuel analysis, if the Hg constituents in the fuel or fuel mixture are measured to be equal to or less than half of the Hg emission limit, additional fuel analysis sampling for Hg would not need to be conducted for 12 months in place of the provision that eliminated further fuel sampling for such boilers. The provision being finalized that allows certain boilers to conduct fuel analysis sampling for Hg every 12 months potentially applies to the subset of boilers that are subject to Hg emission limits (*i.e.*, coal-fired boilers with heat input capacity of 10 MMBtu/hr or greater), including boilers that previously demonstrated that the Hg constituents in their fuel or fuel mixture were equal to or less than half of the Hg emission limit. The provision being finalized will result in a minimal increase in burden on that subset of

sources, when compared to the February 2013 provision that eliminated further fuel analysis sampling for Hg for such sources, in that they will be required to conduct fuel analysis sampling for Hg every 12 months. The burden associated with the provision being finalized is still less than the burden that was imposed by the March 2011 final rule which required all boilers that demonstrated compliance with the Hg emission limit based on fuel analysis to conduct fuel analysis sampling for Hg on a monthly basis.

VII. Statutory and Executive Order Reviews

Additional information about these statutes and Executive Orders can be found at <http://www2.epa.gov/laws-regulations/laws-and-executive-orders>.

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 and was, therefore, not submitted to the Office of Management and Budget (OMB) for review.

B. Paperwork Reduction Act (PRA)

This action which finalizes certain provisions and makes technical and clarifying corrections will result in no significant changes to the information collection requirements of the promulgated rule and will have no increased impact on the information collection estimate of projected cost and hour burden made and approved by OMB. The EPA explained in the preamble to the February 2013 final rule that promulgated amendments, including this action's five reconsidered provisions, that those amendments did not impose any additional regulatory requirements beyond those imposed by the March 2011 final rule and, in fact, would result in a decrease in burden. Accordingly, the ICR was not revised as a result of the February 2013 final rule. Similarly, although this action amends three of the reconsidered provisions, it does not impose any additional regulatory requirements beyond those imposed by the March 2011 final rule and would result in a decrease in that burden. The three amended provisions regard compliance flexibilities that allow reduced performance stack testing and/or fuel sampling for certain boilers. Therefore, the ICR has not been revised as a result of this action. The OMB has previously approved the information collection activities contained in the existing regulations and has assigned OMB control number 2060-0668.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. In making this determination, the impact of concern is any significant adverse economic impact on small entities. The small entities subject to the requirements of this action are owners and operators of coal-, biomass-, and oil-fired boilers located at area sources of HAP emissions. The EPA explained in the preamble to the February 2013 final rule that promulgated amendments to the March 2011 final rule that those amendments were closely related to the final Area Source Boilers Rule, which the EPA signed on February 21, 2011, and that took effect on May 20, 2011. We further explained that the EPA prepared a final regulatory flexibility analysis in connection with the final Area Source Boilers Rule and, therefore, pursuant to section 605(c), the EPA was not required to complete a final regulatory flexibility analysis for the February 2013 final rule. (78 FR 7503–7504, February 1, 2013.) This action finalizes certain provisions and makes technical and clarifying corrections, but does not promulgate substantive changes to the February 2013 final Area Source Boilers Rule. Further, as explained in section VI of this preamble, the February 2013 final rule that promulgated amendments, including this action's reconsidered provisions, did not impose any additional regulatory requirements beyond those imposed by the March 2011 final rule and, in fact, would result in a decrease in burden. Similarly, although this action amends three of the reconsidered provisions, it does not impose any additional regulatory requirements beyond those imposed by the March 2011 final rule and would result in a decrease in that burden.

D. Unfunded Mandates Reform Act (UMRA)

This final 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. This action finalizes certain provisions and makes technical and clarifying corrections, but does not promulgate substantive changes to the February 2013 final Area Source Boilers Rule.

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. It will not have substantial direct effects on tribal governments, 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, as specified in Executive Order 13175. This action finalizes certain provisions and makes technical and clarifying corrections, but does not promulgate substantive changes to the February 2013 final Area Source Boilers Rule. Thus, Executive Order 13175 does not apply to this action.

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

The EPA interprets Executive Order 13045 as applying only to those regulatory actions that concern environmental health or safety risks that the 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 (NTTAA)

This action does not involve any new technical standards from those contained in the March 21, 2011, final rule. Therefore, the EPA did not consider the use of any voluntary consensus standards. See 76 FR 15588 for the NTTAA discussion in the March 21, 2011, final rule.

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

The EPA believes that this action does not have disproportionately high and adverse human health or environmental

effects on minority populations, low-income populations and/or indigenous peoples, as specified in Executive Order 12898 (59 FR 7629, February 16, 1994). The environmental justice finding in the February 2013 final Area Source Boilers Rule (78 FR 7504, February 1, 2013) remains relevant in this action which finalizes certain provisions and makes technical and clarifying corrections, but does not promulgate substantive changes to the February 2013 final Area Source Boilers Rule.

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each House of the Congress and to the Comptroller General of the United States. This action is not a “major rule” as defined by 5 U.S.C. 804(2).

List of Subjects in 40 CFR Part 63

Environmental protection, Administrative practice and procedure, Air pollution control, Hazardous substances.

Dated: August 23, 2016.

Gina McCarthy,
Administrator.

For the reasons stated in the preamble, title 40, chapter I, part 63 of the Code of Federal Regulations is amended as follows:

PART 63—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR SOURCE CATEGORIES

■ 1. The authority citation for part 63 continues to read as follows:

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

Subpart JJJJJJ—[AMENDED]

■ 2. Section 63.11195 is amended by revising paragraphs (c) and (k) to read as follows:

§ 63.11195 Are any boilers not subject to this subpart?

* * * * *

(c) A boiler required to have a permit under section 3005 of the Solid Waste Disposal Act or covered by subpart EEE of this part (*e.g.*, hazardous waste boilers).

* * * * *

(k) An electric utility steam generating unit (EGU) as defined in this subpart.

■ 3. Section 63.11210 is amended by:
 ■ a. Revising paragraphs (b) and (e);
 ■ b. Redesignating paragraphs (f) through (j) as paragraphs (g) through (k);
 ■ c. Adding a new paragraph (f); and
 ■ d. Revising the newly designated paragraphs (j) introductory text, (k) introductory text, and (k)(1) and (2).

The revisions and addition read as follows:

§ 63.11210 What are my initial compliance requirements and by what date must I conduct them?

* * * * *

(b) For existing affected boilers that have applicable emission limits, you must demonstrate initial compliance with the applicable emission limits no later than 180 days after the compliance date that is specified in § 63.11196 and according to the applicable provisions in § 63.7(a)(2), except as provided in paragraph (k) of this section.

* * * * *

(e) For new or reconstructed oil-fired boilers that commenced construction or reconstruction on or before September 14, 2016, that combust only oil that contains no more than 0.50 weight percent sulfur or a mixture of 0.50 weight percent sulfur oil with other fuels not subject to a particulate matter (PM) emission limit under this subpart and that do not use a post-combustion technology (except a wet scrubber) to reduce PM or sulfur dioxide emissions, you are not subject to the PM emission limit in Table 1 of this subpart until September 14, 2019, providing you monitor and record on a monthly basis the type of fuel combusted. If you intend to burn a new type of fuel or fuel mixture that does not meet the requirements of this paragraph, you must conduct a performance test within 60 days of burning the new fuel. On and after September 14, 2019, you are subject to the PM emission limit in Table 1 of this subpart and you must demonstrate compliance with the PM emission limit in Table 1 no later than March 12, 2020.

(f) For new or reconstructed boilers that combust only ultra-low-sulfur liquid fuel as defined in § 63.11237, you are not subject to the PM emission limit in Table 1 of this subpart providing you monitor and record on a monthly basis the type of fuel combusted. If you intend to burn a fuel other than ultra-low-sulfur liquid fuel or gaseous fuels as defined in § 63.11237, you must conduct a performance test within 60 days of burning the new fuel.

* * * * *

(j) For boilers located at existing major sources of HAP that limit their potential to emit (e.g., make a physical change or take a permit limit) such that the existing major source becomes an area source, you must comply with the applicable provisions as specified in paragraphs (j)(1) through (3) of this section.

* * * * *

(k) For existing affected boilers that have not operated on solid fossil fuel, biomass, or liquid fuel between the effective date of the rule and the compliance date that is specified for your source in § 63.11196, you must comply with the applicable provisions as specified in paragraphs (k)(1) through (3) of this section.

(1) You must complete the initial compliance demonstration, if subject to the emission limits in Table 1 to this subpart, as specified in paragraphs (a) and (b) of this section, no later than 180 days after the re-start of the affected boiler on solid fossil fuel, biomass, or liquid fuel and according to the applicable provisions in § 63.7(a)(2).

(2) You must complete the initial performance tune-up, if subject to the tune-up requirements in § 63.11223, by following the procedures described in § 63.11223(b) no later than 30 days after the re-start of the affected boiler on solid fossil fuel, biomass, or liquid fuel.

* * * * *

■ 4. Section 63.11214 is amended by revising paragraphs (a) through (c) to read as follows:

§ 63.11214 How do I demonstrate initial compliance with the work practice standard, emission reduction measures, and management practice?

(a) If you own or operate an existing or new coal-fired boiler with a heat input capacity of less than 10 million Btu per hour, you must conduct a performance tune-up according to § 63.11210(c) or (g), as applicable, and § 63.11223(b). If you own or operate an existing coal-fired boiler with a heat input capacity of less than 10 million Btu per hour, you must submit a signed statement in the Notification of Compliance Status report that indicates that you conducted an initial tune-up of the boiler.

(b) If you own or operate an existing or new biomass-fired boiler or an existing or new oil-fired boiler, you must conduct a performance tune-up according to § 63.11210(c) or (g), as applicable, and § 63.11223(b). If you own or operate an existing biomass-fired boiler or existing oil-fired boiler, you must submit a signed statement in the Notification of Compliance Status report that indicates that you conducted an initial tune-up of the boiler.

(c) If you own or operate an existing affected boiler with a heat input capacity of 10 million Btu per hour or greater, you must submit a signed certification in the Notification of Compliance Status report that an energy assessment of the boiler and its energy use systems was completed according to Table 2 to this subpart and that the

assessment is an accurate depiction of your facility at the time of the assessment or that the maximum number of on-site technical hours specified in the definition of energy assessment applicable to the facility has been expended.

* * * * *

■ 5. Section 63.11220 is revised read as follows:

§ 63.11220 When must I conduct subsequent performance tests or fuel analyses?

(a) If your boiler has a heat input capacity of 10 million Btu per hour or greater, you must conduct all applicable performance (stack) tests according to § 63.11212 on a triennial basis, except as specified in paragraphs (b) through (e) of this section. Triennial performance tests must be completed no more than 37 months after the previous performance test.

(b) For new or reconstructed boilers that commenced construction or reconstruction on or before September 14, 2016, when demonstrating initial compliance with the PM emission limit, if your boiler's performance test results show that your PM emissions are equal to or less than half of the PM emission limit, you do not need to conduct further performance tests for PM until September 14, 2021, but must continue to comply with all applicable operating limits and monitoring requirements and must comply with the provisions as specified in paragraphs (b)(1) through (4) of this section.

(1) A performance test for PM must be conducted by September 14, 2021.

(2) If your performance test results show that your PM emissions are equal to or less than half of the PM emission limit, you may choose to conduct performance tests for PM every fifth year. Each such performance test must be conducted no more than 61 months after the previous performance test.

(3) If you intend to burn a new type of fuel other than ultra-low-sulfur liquid fuel or gaseous fuels as defined in § 63.11237, you must conduct a performance test within 60 days of burning the new fuel type.

(4) If your performance test results show that your PM emissions are greater than half of the PM emission limit, you must conduct subsequent performance tests on a triennial basis as specified in paragraph (a) of this section.

(c) For new or reconstructed boilers that commenced construction or reconstruction after September 14, 2016, when demonstrating initial compliance with the PM emission limit, if your boiler's performance test results show that your PM emissions are equal to or

less than half of the PM emission limit, you may choose to conduct performance tests for PM every fifth year, but must continue to comply with all applicable operating limits and monitoring requirements and must comply with the provisions as specified in paragraphs (c)(1) through (3) of this section.

(1) Each such performance test must be conducted no more than 61 months after the previous performance test.

(2) If you intend to burn a new type of fuel other than ultra-low-sulfur liquid fuel or gaseous fuels as defined in § 63.11237, you must conduct a performance test within 60 days of burning the new fuel type.

(3) If your performance test results show that your PM emissions are greater than half of the PM emission limit, you must conduct subsequent performance tests on a triennial basis as specified in paragraph (a) of this section.

(d) If you demonstrate compliance with the mercury emission limit based on fuel analysis, you must conduct a fuel analysis according to § 63.11213 for each type of fuel burned as specified in paragraphs (d)(1) through (3) of this section. If you plan to burn a new type of fuel or fuel mixture, you must conduct a fuel analysis before burning the new type of fuel or mixture in your boiler. You must recalculate the mercury emission rate using Equation 1 of § 63.11211. The recalculated mercury emission rate must be less than the applicable emission limit.

(1) For existing boilers and new or reconstructed boilers that commenced construction or reconstruction on or before September 14, 2016, when demonstrating initial compliance with the mercury emission limit, if the mercury constituents in the fuel or fuel mixture are measured to be equal to or less than half of the mercury emission limit, you do not need to conduct further fuel analysis sampling until September 14, 2017, but must continue to comply with all applicable operating limits and monitoring requirements and must comply with the provisions as specified in paragraphs (d)(1)(i) and (ii) of this section.

(i) Fuel analysis sampling for mercury must be conducted by September 14, 2017.

(ii) If your fuel analysis results show that the mercury constituents in the fuel or fuel mixture are equal to or less than half of the mercury emission limit, you may choose to conduct fuel analysis sampling for mercury every 12 months.

(2) For new or reconstructed boilers that commenced construction or reconstruction after September 14, 2016, when demonstrating initial compliance with the mercury emission limit, if the

mercury constituents in the fuel or fuel mixture are measured to be equal to or less than half of the mercury emission limit, you may choose to conduct fuel analysis sampling for mercury every 12 months, but must continue to comply with all applicable operating limits and monitoring requirements.

(3) When demonstrating compliance with the mercury emission limit, if the mercury constituents in the fuel or fuel mixture are greater than half of the mercury emission limit, you must conduct quarterly sampling.

(e) For existing affected boilers that have not operated on solid fossil fuel, biomass, or liquid fuel since the previous compliance demonstration and more than 3 years have passed since the previous compliance demonstration, you must complete your subsequent compliance demonstration no later than 180 days after the re-start of the affected boiler on solid fossil fuel, biomass, or liquid fuel.

■ 6. Section 63.11221 is amended by revising paragraph (c) to read as follows:

§ 63.11221 Is there a minimum amount of monitoring data I must obtain?

* * * * *

(c) You may not use data collected during periods of startup and shutdown, monitoring system malfunctions or out-of-control periods, repairs associated with monitoring system malfunctions or out-of-control periods, or required monitoring system quality assurance or quality control activities in calculations used to report emissions or operating levels. Any such periods must be reported according to the requirements in § 63.11225. You must use all the data collected during all other periods in assessing the operation of the control device and associated control system.

* * * * *

■ 7. Section 63.11222 is amended by revising paragraph (a)(2) to read as follows:

§ 63.11222 How do I demonstrate continuous compliance with the emission limits?

(a) * * *

(2) If you have an applicable mercury or PM emission limit, you must keep records of the type and amount of all fuels burned in each boiler during the reporting period. If you have an applicable mercury emission limit, you must demonstrate that all fuel types and mixtures of fuels burned would result in lower emissions of mercury than the applicable emission limit (if you demonstrate compliance through fuel analysis), or result in lower fuel input of mercury than the maximum values calculated during the last performance

stack test (if you demonstrate compliance through performance stack testing).

* * * * *

■ 8. Section 63.11223 is amended by revising paragraph (c) to read as follows:

§ 63.11223 How do I demonstrate continuous compliance with the work practice and management practice standards?

* * * * *

(c) Boilers with an oxygen trim system that maintains an optimum air-to-fuel ratio that would otherwise be subject to a biennial tune-up must conduct a tune-up of the boiler every 5 years as specified in paragraphs (b)(1) through (7) of this section. Each 5-year tune-up must be conducted no more than 61 months after the previous tune-up. For a new or reconstructed boiler with an oxygen trim system, the first 5-year tune-up must be no later than 61 months after the initial startup. You may delay the burner inspection specified in paragraph (b)(1) of this section and inspection of the system controlling the air-to-fuel ratio specified in paragraph (b)(3) of this section until the next scheduled unit shutdown, but you must inspect each burner and system controlling the air-to-fuel ratio at least once every 72 months. If an oxygen trim system is utilized on a unit without emission standards to reduce the tune-up frequency to once every 5 years, set the oxygen level no lower than the oxygen concentration measured during the most recent tune-up.

* * * * *

■ 9. Section 63.11225 is amended by revising paragraphs (a)(4) introductory text, (b) introductory text, (c)(2)(iv), (e), and (g) introductory text to read as follows:

§ 63.11225 What are my notification, reporting, and recordkeeping requirements?

(a) * * *

(4) You must submit the Notification of Compliance Status no later than 120 days after the applicable compliance date specified in § 63.11196 unless you own or operate a new boiler subject only to a requirement to conduct a biennial or 5-year tune-up or you must conduct a performance stack test. If you own or operate a new boiler subject to a requirement to conduct a tune-up, you are not required to prepare and submit a Notification of Compliance Status for the tune-up. If you must conduct a performance stack test, you must submit the Notification of Compliance Status within 60 days of completing the performance stack test. You must submit the Notification of Compliance

Status in accordance with paragraphs (a)(4)(i) and (vi) of this section. The Notification of Compliance Status must include the information and certification(s) of compliance in paragraphs (a)(4)(i) through (v) of this section, as applicable, and signed by a responsible official.

* * * * *

(b) You must prepare, by March 1 of each year, and submit to the delegated authority upon request, an annual compliance certification report for the previous calendar year containing the information specified in paragraphs (b)(1) through (4) of this section. You must submit the report by March 15 if you had any instance described by paragraph (b)(3) of this section. For boilers that are subject only to the energy assessment requirement and/or a requirement to conduct a biennial or 5-year tune-up according to § 63.11223(a) and not subject to emission limits or operating limits, you may prepare only a biennial or 5-year compliance report as specified in paragraphs (b)(1) and (2) of this section.

* * * * *

(c) * * *
(2) * * *

(iv) For each boiler subject to an emission limit in Table 1 to this subpart, you must keep records of monthly fuel use by each boiler, including the type(s) of fuel and amount(s) used. For each new oil-fired boiler that meets the requirements of § 63.11210(e) or (f), you must keep records, on a monthly basis, of the type of fuel combusted.

* * * * *

(e)(1) Within 60 days after the date of completing each performance test (as defined in § 63.2) required by this subpart, you must submit the results of the performance tests, including any associated fuel analyses, following the procedure specified in either paragraph (e)(1)(i) or (ii) of this section.

(i) For data collected using test methods supported by the EPA's Electronic Reporting Tool (ERT) as listed on the EPA's ERT Web site (https://www3.epa.gov/ttn/chief/ert/ert_info.html) at the time of the test, you must submit the results of the performance test to the EPA via the Compliance and Emissions Data Reporting Interface (CEDRI). (CEDRI can be accessed through the EPA's Central Data Exchange (CDX) (<https://cdx.epa.gov/>)). Performance test data must be submitted in a file format generated through the use of the EPA's ERT or an alternate electronic file format consistent with the extensible markup language (XML) schema listed on the EPA's ERT Web site. If you claim

that some of the performance test information being submitted is confidential business information (CBI), you must submit a complete file generated through the use of the EPA's ERT or an alternate electronic file consistent with the XML schema listed on the EPA's ERT Web site, including information claimed to be CBI, on a compact disc, flash drive, or other commonly used electronic storage media to the EPA. The electronic media must be clearly marked as CBI and mailed to U.S. EPA/OAQPS/CORE CBI Office, Attention: Group Leader, Measurement Policy Group, MD C404-02, 4930 Old Page Rd., Durham, NC 27703. The same ERT or alternate file with the CBI omitted must be submitted to the EPA via the EPA's CDX as described earlier in this paragraph.

(ii) For data collected using test methods that are not supported by the EPA's ERT as listed on the EPA's ERT Web site at the time of the test, you must submit the results of the performance test to the Administrator at the appropriate address listed in § 63.13.

(2) Within 60 days after the date of completing each CEMS performance evaluation (as defined in § 63.2), you must submit the results of the performance evaluation following the procedure specified in either paragraph (e)(2)(i) or (ii) of this section.

(i) For performance evaluations of continuous monitoring systems measuring relative accuracy test audit (RATA) pollutants that are supported by the EPA's ERT as listed on the EPA's ERT Web site at the time of the evaluation, you must submit the results of the performance evaluation to the EPA via the CEDRI. (CEDRI can be accessed through the EPA's CDX.) Performance evaluation data must be submitted in a file format generated through the use of the EPA's ERT or an alternate file format consistent with the XML schema listed on the EPA's ERT Web site. If you claim that some of the performance evaluation information being submitted is CBI, you must submit a complete file generated through the use of the EPA's ERT or an alternate electronic file consistent with the XML schema listed on the EPA's ERT Web site, including information claimed to be CBI, on a compact disc, flash drive, or other commonly used electronic storage media to the EPA. The electronic storage media must be clearly marked as CBI and mailed to U.S. EPA/OAQPS/CORE CBI Office, Attention: Group Leader, Measurement Policy Group, MD C404-02, 4930 Old Page Rd., Durham, NC 27703. The same ERT or alternate file with the CBI omitted must be

submitted to the EPA via the EPA's CDX as described earlier in this paragraph.

(ii) For any performance evaluations of continuous monitoring systems measuring RATA pollutants that are not supported by the EPA's ERT as listed on the EPA's ERT Web site at the time of the evaluation, you must submit the results of the performance evaluation to the Administrator at the appropriate address listed in § 63.13.

* * * * *

(g) If you have switched fuels or made a physical change to the boiler and the fuel switch or change resulted in the applicability of a different subcategory within this subpart, in the boiler becoming subject to this subpart, or in the boiler switching out of this subpart due to a fuel change that results in the boiler meeting the definition of gas-fired boiler, as defined in § 63.11237, or you have taken a permit limit that resulted in you becoming subject to this subpart or no longer being subject to this subpart, you must provide notice of the date upon which you switched fuels, made the physical change, or took a permit limit within 30 days of the change. The notification must identify:

* * * * *

§ 63.11226 [Removed and Reserved]

- 10. Section 63.11226 is removed and reserved.
- 11. Section 63.11237 is amended by:
 - a. Removing the definition of "Affirmative defense";
 - b. Adding in alphabetical order a definition for "Annual capacity factor";
 - c. Revising the definition of "Dry scrubber";
 - d. Adding in alphabetical order a definition for "Fossil fuel";
 - e. Revising the definitions of "Gas-fired boiler", "Limited-use boiler", "Liquid fuel", "Load fraction", "Oxygen trim system", "Shutdown", and "Startup";
 - f. Adding in alphabetical order definitions for "Ultra-low-sulfur liquid fuel" and "Useful thermal energy"; and
 - g. Revising the definition of "Voluntary Consensus Standards (VCS)".

The revisions and additions read as follows:

§ 63.11237 What definitions apply to this subpart?

* * * * *

Annual capacity factor means the ratio between the actual heat input to a boiler from the fuels burned during a calendar year and the potential heat input to the boiler had it been operated for 8,760 hours during a year at the

maximum steady state design heat input capacity.

* * * * *

Dry scrubber means an add-on air pollution control system that injects dry alkaline sorbent (dry injection) or sprays an alkaline sorbent (spray dryer) to react with and neutralize acid gas in the exhaust stream forming a dry powder material. Sorbent injection systems used as control devices in fluidized bed boilers are included in this definition. A dry scrubber is a dry control system.

* * * * *

Fossil fuel means natural gas, oil, coal, and any form of solid, liquid, or gaseous fuel derived from such material.

* * * * *

Gas-fired boiler includes any boiler that burns gaseous fuels not combined with any solid fuels and burns liquid fuel only during periods of gas curtailment, gas supply interruption, startups, or for periodic testing, maintenance, or operator training on liquid fuel. Periodic testing, maintenance, or operator training on liquid fuel shall not exceed a combined total of 48 hours during any calendar year.

* * * * *

Limited-use boiler means any boiler that burns any amount of solid or liquid fuels and has a federally enforceable annual capacity factor of no more than 10 percent.

Liquid fuel includes, but is not limited to, distillate oil, residual oil, any form of liquid fuel derived from petroleum, used oil meeting the specification in 40 CFR 279.11, liquid biofuels, biodiesel, and vegetable oil.

Load fraction means the actual heat input of a boiler divided by heat input during the performance test that established the minimum sorbent injection rate or minimum activated carbon injection rate, expressed as a fraction (e.g., for 50 percent load the load fraction is 0.5). For boilers that co-fire natural gas with a solid or liquid fuel, the load fraction is determined by the actual heat input of the solid or liquid fuel divided by heat input of the solid or liquid fuel fired during the performance test (e.g., if the performance test was conducted at 100 percent solid fuel firing, for 100 percent load firing 50 percent solid fuel and 50 percent natural gas, the load fraction is 0.5).

* * * * *

Oxygen trim system means a system of monitors that is used to maintain excess air at the desired level in a combustion

device over its operating load range. A typical system consists of a flue gas oxygen and/or carbon monoxide monitor that automatically provides a feedback signal to the combustion air controller or draft controller.

* * * * *

Shutdown means the period in which cessation of operation of a boiler is initiated for any purpose. Shutdown begins when the boiler no longer supplies useful thermal energy (such as steam or hot water) for heating, cooling, or process purposes or generates electricity, or when no fuel is being fed to the boiler, whichever is earlier. Shutdown ends when the boiler no longer supplies useful thermal energy (such as steam or hot water) for heating, cooling, or process purposes or generates electricity, and no fuel is being combusted in the boiler.

* * * * *

Startup means:

(1) Either the first-ever firing of fuel in a boiler for the purpose of supplying useful thermal energy (such as steam or hot water) for heating and/or producing electricity, or for any other purpose, or the firing of fuel in a boiler after a shutdown event for any purpose. Startup ends when any of the useful thermal energy (such as steam or hot water) from the boiler is supplied for heating and/or producing electricity, or for any other purpose, or

(2) The period in which operation of a boiler is initiated for any purpose. Startup begins with either the first-ever firing of fuel in a boiler for the purpose of supplying useful thermal energy (such as steam or hot water) for heating, cooling or process purposes or producing electricity, or the firing of fuel in a boiler for any purpose after a shutdown event. Startup ends 4 hours after when the boiler supplies useful thermal energy (such as steam or hot water) for heating, cooling, or process purposes or generates electricity, whichever is earlier.

* * * * *

Ultra-low-sulfur liquid fuel means a distillate oil that has less than or equal to 15 parts per million (ppm) sulfur.

Useful thermal energy means energy (i.e., steam or hot water) that meets the minimum operating temperature, flow, and/or pressure required by any energy use system that uses energy provided by the affected boiler.

* * * * *

Voluntary Consensus Standards (VCS) mean technical standards (e.g., materials specifications, test methods,

sampling procedures, business practices) developed or adopted by one or more voluntary consensus bodies. EPA/Office of Air Quality Planning and Standards, by precedent, has only used VCS that are written in English. Examples of VCS bodies are: American Society of Testing and Materials (ASTM, 100 Barr Harbor Drive, P.O. Box CB700, West Conshohocken, Pennsylvania 19428-B2959, (800) 262-1373, <http://www.astm.org>), American Society of Mechanical Engineers (ASME, Three Park Avenue, New York, NY 10016-5990, (800) 843-2763, <http://www.asme.org>), International Standards Organization (ISO 1, ch. de la Voie-Creuse, Case postale 56, CH-1211 Geneva 20, Switzerland, +41 22 749 01 11, <http://www.iso.org/iso/home.htm>), Standards Australia (AS Level 10, The Exchange Centre, 20 Bridge Street, Sydney, GPO Box 476, Sydney NSW 2001, +61 2 9237 6171 <http://www.standards.org.au>), British Standards Institution (BSI, 389 Chiswick High Road, London, W4 4AL, United Kingdom, +44 (0)20 8996 9001, <http://www.bsigroup.com>), Canadian Standards Association (CSA, 5060 Spectrum Way, Suite 100, Mississauga, Ontario L4W 5N6, Canada, 800-463-6727, <http://www.csa.ca>), European Committee for Standardization (CEN CENELEC Management Centre Avenue Marnix 17 B-1000 Brussels, Belgium +32 2 550 08 11, <http://www.cen.eu/cen>), and German Engineering Standards (VDI Guidelines Department, P.O. Box 10 11 39 40002, Duesseldorf, Germany, +49 211 6214-230, <http://www.vdi.eu>). The types of standards that are not considered VCS are standards developed by: the United States, e.g., California Air Resources Board (CARB) and Texas Commission on Environmental Quality (TCEQ); industry groups, such as American Petroleum Institute (API), Gas Processors Association (GPA), and Gas Research Institute (GRI); and other branches of the U.S. Government, e.g., Department of Defense (DOD) and Department of Transportation (DOT). This does not preclude EPA from using standards developed by groups that are not VCS bodies within their rule. When this occurs, EPA has done searches and reviews for VCS equivalent to these non-EPA methods.

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■ 12. Table 1 to Subpart JJJJJJ of Part 63 is amended by revising the entry 6 to read as follows:

* * * * *

TABLE 1 TO SUBPART JJJJJJ OF PART 63—EMISSION LIMITS

If your boiler is in this subcategory . . .	For the following pollutants . . .	You must achieve less than or equal to the following emission limits, except during periods of startup and shutdown . . .
*	*	*
*	*	*
6. Existing coal-fired boilers with heat input capacity of 10 MMBtu/hr or greater that do not meet the definition of limited-use boiler.	a. Mercury b. CO	2.2E-05 lb per MMBtu of heat input. 420 ppm by volume on a dry basis corrected to 3 percent oxygen (3-run average or 10-day rolling average).

■ 13. Table 2 to Subpart JJJJJJ of Part 63 is amended by revising the entry 16 to read as follows:

TABLE 2 TO SUBPART JJJJJJ OF PART 63—WORK PRACTICE STANDARDS, EMISSION REDUCTION MEASURES, AND MANAGEMENT PRACTICES

If your boiler is in this subcategory . . .	You must meet the following . . .
*	*
*	*
*	*
*	*
*	*
*	*
16. Existing coal-fired, biomass-fired, or oil-fired boilers (units with heat input capacity of 10 MMBtu/hr and greater), not including limited-use boilers.	Must have a one-time energy assessment performed by a qualified energy assessor. An energy assessment completed on or after January 1, 2008, that meets or is amended to meet the energy assessment requirements in this table satisfies the energy assessment requirement. Energy assessor approval and qualification requirements are waived in instances where past or amended energy assessments are used to meet the energy assessment requirements. A facility that operated under an energy management program developed according to the ENERGY STAR guidelines for energy management or compatible with ISO 50001 for at least 1 year between January 1, 2008, and the compliance date specified in § 63.11196 that includes the affected units also satisfies the energy assessment requirement. The energy assessment must include the following with extent of the evaluation for items (1) to (4) appropriate for the on-site technical hours listed in § 63.11237: (1) A visual inspection of the boiler system, (2) An evaluation of operating characteristics of the affected boiler systems, specifications of energy use systems, operating and maintenance procedures, and unusual operating constraints, (3) An inventory of major energy use systems consuming energy from affected boiler(s) and which are under control of the boiler owner or operator, (4) A review of available architectural and engineering plans, facility operation and maintenance procedures and logs, and fuel usage, (5) A list of major energy conservation measures that are within the facility's control, (6) A list of the energy savings potential of the energy conservation measures identified, and (7) A comprehensive report detailing the ways to improve efficiency, the cost of specific improvements, benefits, and the time frame for recouping those investments.

■ 14. Table 6 to Subpart JJJJJJ of Part 63 is amended by revising the entry 2 to read as follows:

* * * * *

TABLE 6 TO SUBPART JJJJJJ OF PART 63—ESTABLISHING OPERATING LIMITS

If you have an applicable emission limit for . . .	And your operating limits are based on . . .	You must . . .	Using . . .	According to the following requirements
*	*	*	*	*
*	*	*	*	*
2. Mercury	Dry sorbent or activated carbon injection rate operating parameters.	Establish a site-specific minimum sorbent or activated carbon injection rate operating limit according to § 63.11211(b).	Data from the sorbent or activated carbon injection rate monitors and the mercury performance stack tests.	(a) You must collect sorbent or activated carbon injection rate data every 15 minutes during the entire period of the performance stack tests;

TABLE 6 TO SUBPART JJJJJ OF PART 63—ESTABLISHING OPERATING LIMITS—Continued

If you have an applicable emission limit for . . .	And your operating limits are based on . . .	You must . . .	Using . . .	According to the following requirements
*	*	*	*	*

- (b) Determine the average sorbent or activated carbon injection rate for each individual test run in the three-run performance stack test by computing the average of all the 15-minute readings taken during each test run.
- (c) When your unit operates at lower loads, multiply your sorbent or activated carbon injection rate by the load fraction, as defined in § 63.11237, to determine the required injection rate.

[FR Doc. 2016–21334 Filed 9–13–16; 8:45 am]
 BILLING CODE 6560–50–P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 180

[EPA–HQ–OPP–2016–0283; FRL–9949–81]

Acrylic Polymers; Tolerance Exemption

AGENCY: Environmental Protection Agency (EPA).
ACTION: Final rule.

SUMMARY: This regulation amends an exemption from the requirement of a tolerance for residues of acrylic polymers when used as an inert ingredient in a pesticide chemical formulation under 40 CFR 180.960 to include the monomers lauryl acrylate and acrylamidopropyl methyl sulfonic acid. OMC Ag Consulting on behalf of Vive Crop Protection Inc submitted a petition to EPA under the Federal Food, Drug, and Cosmetic Act (FFDCA), requesting an exemption from the requirement of a tolerance. This regulation eliminates the need to establish a maximum permissible level for residues of acrylic polymers on food or feed commodities.

DATES: This regulation is effective September 14, 2016. Objections and requests for hearings must be received on or before November 14, 2016, and must be filed in accordance with the instructions provided in 40 CFR part 178 (see also Unit I.C. of the **SUPPLEMENTARY INFORMATION**).

ADDRESSES: The docket for this action, identified by docket identification (ID) number EPA–HQ–OPP–2016–0283, is available at <http://www.regulations.gov> or at the Office of Pesticide Programs Regulatory Public Docket (OPP Docket) in the Environmental Protection Agency Docket Center (EPA/DC), West William Jefferson Clinton Bldg., Rm. 3334, 1301 Constitution Ave. NW., Washington, DC 20460–0001. The Public Reading Room is open from 8:30 a.m. to 4:30 p.m., Monday through Friday, excluding legal holidays. The telephone number for the Public Reading Room is (202) 566–1744, and the telephone number for the OPP Docket is (703) 305–5805. Please review the visitor instructions and additional information about the docket available at <http://www.epa.gov/dockets>.

FOR FURTHER INFORMATION CONTACT: Michael Goodis, Registration Division (7505P), Office of Pesticide Programs, Environmental Protection Agency, 1200 Pennsylvania Ave. NW., Washington, DC 20460–0001; main telephone number: (703) 305–7090; email address: RDFFRNotices@epa.gov.

SUPPLEMENTARY INFORMATION:

I. General Information

A. Does this action apply to me?

You may be potentially affected by this action if you are an agricultural producer, food manufacturer, or pesticide manufacturer. The following list of North American Industrial Classification System (NAICS) codes is not intended to be exhaustive, but rather provides a guide to help readers determine whether this document applies to them. Potentially affected entities may include:

- Crop production (NAICS code 111).
- Animal production (NAICS code 112).
- Food manufacturing (NAICS code 311).
- Pesticide manufacturing (NAICS code 32532).

B. How can I get electronic access to other related information?

You may access a frequently updated electronic version of 40 CFR part 180 through the Government Printing Office’s e-CFR site at http://www.ecfr.gov/cgi-bin/text-idx?&c=ecfr&tpl=/ecfrbrowse/Title40/40tab_02.tpl.

C. Can I file an objection or hearing request?

Under FFDCA section 408(g), 21 U.S.C. 346a, any person may file an objection to any aspect of this regulation and may also request a hearing on those objections. You must file your objection or request a hearing on this regulation in accordance with the instructions provided in 40 CFR part 178. To ensure proper receipt by EPA, you must identify docket ID number EPA–HQ–OPP–2016–0283 in the subject line on the first page of your submission. All objections and requests for a hearing must be in writing, and must be received by the Hearing Clerk on or before November 14, 2016. Addresses for mail and hand delivery of objections and hearing requests are provided in 40 CFR 178.25(b).

In addition to filing an objection or hearing request with the Hearing Clerk as described in 40 CFR part 178, please submit a copy of the filing (excluding any Confidential Business Information

§§ 842.120 and 842.121 [Removed]

- 101. Remove newly redesignated §§ 842.120 and 842.121.

§§ 842.122 through 842.124 [Redesignated as §§ 842.120 through 842.122]

- 102. Newly redesignated §§ 842.122 through 842.124 are further redesignated as §§ 842.120 through 842.122, respectively.

Subpart Q—[Redesignated as Subpart O]

- 103. Redesignate subpart Q, consisting of §§ 842.144 through 842.150, as subpart O, consisting of §§ 842.123 through 842.129.

- 104. Revise newly redesignated § 842.123 to read as follows:

§ 842.123 Scope of this subpart.

This subpart tells how to make an advance payment before a claim is filed or finalized under the Military Claims, Foreign Claims and National Guard Claims Acts.

- 105. In newly redesignated § 842.124, revise paragraph (c)(4) to read as follows:

§ 842.124 Delegation of authority.

* * * * *

(c) * * *

(4) SJAs of the Air Force component commander of the U.S. geographic combatant commands for claims arising within their respective combatant command areas of responsibility.

* * * * *

- 106. In newly redesignated § 842.126, revise paragraph (b) to read as follows:

§ 842.126 When authorized.

* * * * *

(b) The potential claimant has an immediate need amounting to a hardship for food, shelter, medical or burial expenses, or other necessities. In the case of a commercial enterprise, severe financial loss or bankruptcy will result if the Air Force does not make an advance payment.

* * * * *

Henry Williams,

Acting Air Force Federal Liaison Officer.

[FR Doc. 2016-25554 Filed 11-21-16; 8:45 am]

BILLING CODE 5001-10-P

ENVIRONMENTAL PROTECTION AGENCY**40 CFR Part 63**

[EPA-HQ-OAR-2014-0492; FRL-9955-50-OAR]

RIN 2060-AR97

Clarification of Requirements for Method 303 Certification Training

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: The Environmental Protection Agency (EPA) is finalizing revisions to better define the requirements associated with conducting Method 303 training courses. Method 303 is an air pollution test method used to determine the presence of visible emissions (VE) from coke ovens. This action adds language that clarifies the criteria used by the EPA to determine the competency of Method 303 training providers, but does not change the requirements for conducting the test method. These revisions will help entities interested in conducting the required training courses by clearly defining the requirements necessary to do so.

DATES: The final rule is effective on December 22, 2016.

ADDRESSES: The EPA has established a docket for this action under Docket ID No. EPA-HQ-OAR-2014-0492. All documents in the docket are listed on the <http://www.regulations.gov> Web site. Although listed in the index, some information is not publicly available, e.g., Confidential Business Information (CBI) or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are available electronically through <http://www.regulations.gov>.

FOR FURTHER INFORMATION CONTACT: Ms. Kim Garnett, U.S. EPA, Office of Air Quality Planning and Standards, Air Quality Assessment Division, Measurement Technology Group (Mail Code: E143-02), Research Triangle Park, NC 27711; telephone number: (919) 541-1158; fax number: (919) 541-0516; email address: garnett.kim@epa.gov.

SUPPLEMENTARY INFORMATION:**I. General Information**

- A. Does this action apply to me?
- B. What action is the agency taking?
- C. Judicial Review

II. Background

III. Changes Included in the Final Method 303 Clarification

IV. Summary of Major Comments and Responses

- A. Technology Improvement
- B. Training Requirements
- V. Statutory and Executive Order Reviews
 - A. Executive Order 12866: Regulatory Planning and Review and Executive Order 13563: Improving Regulation and Regulatory Review
 - B. Paperwork Reduction Act (PRA)
 - C. Regulatory Flexibility Act (RFA)
 - D. Unfunded Mandates Reform Act (UMRA)
 - E. Executive Order 13132: Federalism
 - F. Executive Order 13175: Consultation and Coordination With Indian Tribal Governments
 - G. Executive Order 13045: Protection of Children From Environmental Health Risks and Safety Risks
 - H. Executive Order 13211: Actions Concerning Regulations That Significantly Affect Energy Supply, Distribution, or Use
 - I. National Technology Transfer and Advancement Act (NTTAA)
 - J. Executive Order 12898: Federal Actions To Address Environmental Justice in Minority Populations and Low-Income Populations
 - K. Congressional Review Act (CRA)

I. General Information**A. Does this action apply to me?**

This action applies to you if you are a potential provider of Method 303 training services, someone seeking training to conduct Method 303, or a facility subject to Method 303.

B. What action is the agency taking?

This final action adds language that further clarifies the criteria used by the EPA to determine the competency of Method 303 training providers, but does not change the requirements for conducting the test method.

C. Judicial Review

Under section 307(b)(1) of the Clean Air Act (CAA), judicial review of this final rule is available by filing a petition for review in the United States Court of Appeals for the District of Columbia Circuit by January 23, 2017. Under section 307(d)(7)(B) of the CAA, only an objection to this final rule that was raised with reasonable specificity during the period for public comment can be raised during judicial review. Moreover, under section 307(b)(2) of the CAA, the requirements that are the subject of this final rule may not be challenged later in civil or criminal proceedings brought by the EPA to enforce these requirements.

II. Background

On October 27, 1993, we published Method 303 for determining VE from

coke ovens (58 FR 57898). Method 303 is applicable for the determination of VE from the following by-product coke oven battery sources: Charging systems during charging; doors, topside port lids and offtake systems on operating coke ovens; and collecting mains. Method 303 is also applicable to qualifying observers for visually determining the presence of VE from by-product coke ovens. The EPA received inquiries from state/local agencies seeking the specifics of the procedures used to qualify observers. The EPA proposed these clarifications on February 25, 2016 (81 FR 9407). We received public comments from two individuals.

III. Changes Included in the Final Method 303 Clarification

Method 303 section 10.1 (40 CFR part 63, appendix B) presently states that “*The Method 303 course shall be conducted by or under the sanction of the EPA and shall consist of classroom instruction, field observation, and a proficiency test. . .*” We are amending this language by removing the statement indicating that these courses be conducted by or under the sanction of the EPA. Instead, Administrator-approved training providers will be allowed to conduct Method 303 training and certification. We are, therefore, revising Method 303 to define the administrative and recordkeeping requirements that must be followed by Method 303 training providers. This action: (1) Defines Administrator approval of Method 303 training providers, clarifies the minimum training course requirements, and details the recordkeeping requirements that the training provider must follow in order to attain Administrator approval (section 10.1); (2) adds language to clarify that VE readers must demonstrate a perfect score on the recertification exam (section 10.1.2); (3) updates and expands the criteria used to determine who is qualified to participate on the proficiency test panel (section 10.1.3); (4) adds criteria for training certificates, submittal of this information, and recordkeeping (sections 10.1.4–10.1.6); and (5) defines conditions for suspension of the training provider’s approval by the Administrator (section 10.1.7). There are no changes to the requirements for conducting the test method.

IV. Comments and Responses

A. Technology Improvement

The first commenter suggested that the EPA should require the inspector to utilize digital imagery to document the visible emission observation. This

comment is beyond the scope of the present action. This action does not involve the merits of Method 303, but rather training requirements in order for observers to be qualified to conduct Method 303 testing. No change to the rule was made in response to this comment.

B. Training Requirements

The first commenter, also, stated that the quality of third-party Method 9 lectures is simply not good enough to ensure that any level of training is achieved, and seems to suggest that the Method 9 lecture is the only training involved. While attending the lecture portion of Method 9 is a prerequisite to receiving Method 303 certification, this requirement is to ensure individuals have a basic understanding of opacity measurement. It is not the sole training requirement. For example, the trainee must successfully complete the Method 303 training course, satisfy the field observation requirement, and demonstrate adequate performance and sufficient knowledge of Method 303 (see section 10.1). A trainee must also verify completion of at least 12 hours of field observation prior to attending the Method 303 certification course (see section 10.1.1). There are numerous other requirements as well. Therefore, the EPA believes an approved Method 303 training course will be comprehensive enough to assure that individuals who receive certification to determine VE from coke oven battery sources are proficient regardless of any perceived inadequacy of Method 9 lectures. No change to the rule was made in response to this comment.

The second commenter expressed concerns over the possible use of ad hoc panel members, stating these panel members may have inconsistent interpretations of Method 303 and different inspection practices at the plants. The EPA agrees with the comment regarding the make-up of the certification panel, and is amending the Method 303 rule language in section 10.1.3 to specify that the composition of the panel will be approved by the Administrator as part of the training course approval process. During this approval process, the experience of each panel member will be reviewed in order to ensure consistency.

V. 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 and was, therefore, not submitted to the Office of Management and Budget (OMB) for review.

B. Paperwork Reduction Act (PRA)

This action does not impose an information collection burden under the PRA. This action better defines the requirements associated with conducting Method 303 training courses and does not impose additional regulatory requirements on sources.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. This action will not impose any requirements on small entities. This action better defines the requirements associated with conducting Method 303 training courses and does not impose additional regulatory requirements on sources.

D. Unfunded Mandates Reform Act (UMRA)

This action does not contain an unfunded mandate of \$100 million or more for as described in UMRA, 2 U.S.C. 1531–1538, and does not significantly or uniquely affect small governments. This action imposes no enforceable duty on any state, local or tribal governments or the private sector.

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. This action clarifies the criteria used by the EPA to determine the competency of training providers, but does not change the requirements for conducting the test method. Thus, Executive Order 13175 does not apply to this action.

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

The EPA interprets Executive Order 13045 as applying only to those regulatory actions that concern environmental health or safety risks that the 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 (NTTAA)

This rulemaking does not involve technical standards.

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

The EPA believes that this action is not subject to Executive Order 12898 (59 FR 7629, February 16, 1994) because it does not establish an environmental health or safety standard. This action would make corrections and updates to an existing protocol for assessing the precision and accuracy of alternative test methods to ensure they are comparable to the methods otherwise required; thus, it does not modify or affect the impacts to human health or the environment of any standards for which it may be used.

K. Congressional Review Act

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. This action is not a “major rule” as defined by 5 U.S.C. 804(2). This rule will be effective January 23, 2017.

Clarification of Requirements for Method 303 Certification Training

List of Subjects in 40 CFR Part 63

Environmental protection, Air pollution control, Test methods.

Dated: November 8, 2016.

Gina McCarthy,
Administrator.

For the reasons stated in the preamble, the EPA is amending title 40, chapter I of the Code of Federal Regulations as follows:

PART 63—[AMENDED]

■ 1. The authority citation for part 63 continues to read as follows:

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

■ 2. In Appendix A, amend Method 303:

■ a. In section 5.0 by revising paragraph 5.2; and

■ b. In section 10.0 by:

■ i. Revising paragraphs 10.1, 10.1.1, 10.1.2, and 10.1.3;

■ ii. Adding paragraphs 10.1.4, 10.1.5, 10.1.6, and 10.1.7; and

■ iii. Revising paragraph 10.2.

The revisions and additions read as follows.

Appendix A to Part 63—Test Methods

* * * * *

Method 303—Determination of Visible Emissions From By-Product Coke Oven Batteries

* * * * *

5.0 Safety

* * * * *

5.2 Safety Training. Because coke oven batteries have hazardous environments, the training materials and the field training (section 10.0) shall cover the precautions required to address health and safety hazards.

* * * * *

10.0 Calibration and Standardization

* * * * *

10.1 Certification Procedures. This method requires only the determination of whether VE occur and does not require the determination of opacity levels; therefore, observer certification according to Method 9 in appendix A to part 60 of this chapter is not required to obtain certification under this method. However, in order to receive Method 303 observer certification, the first-time observer (trainee) shall have attended the lecture portion of the Method 9 certification course. In addition, the trainee shall successfully complete the Method 303 training course, satisfy the field observation requirement, and demonstrate adequate performance and sufficient knowledge of Method 303. The Method 303 training provider and course shall be approved by the Administrator and shall consist of classroom instruction, field training, and a proficiency test. In order to apply for approval as a

Method 303 training provider, an applicant must submit their credentials and the details of their Method 303 training course to Group Leader, Measurement Technology Group (E143–02), Office of Air Quality Planning and Standards, U.S. Environmental Protection Agency, Research Triangle Park, NC 27711. Those details should include, at a minimum:

(a) A detailed list of the provider’s credentials.

(b) An outline of the classroom and the field portions of the class.

(c) Copies of the written training and lecture materials, to include:

(1) The classroom audio-visual presentation(s).

(2) A classroom course manual with instructional text, practice questions and problems for each of the elements of the Method 303 inspection (*i.e.*, charging, doors, lids and offtakes, and collecting mains). A copy of Method 303 and any related guidance documents should be included as appendices.

(3) A copy of the Method 303 demonstration video, if not using the one available at: <http://www3.epa.gov/ttn/emc/methods/method303trainingvideo.mp4>.

(4) Multiple-choice certification tests, with questions sufficient to demonstrate knowledge of the method, as follows: One (1) initial certification test and three (3) third-year recertification tests (the questions on any one recertification test must be at least 25 percent different from those on the other recertification tests).

(5) A field certification checklist and inspection forms for each of the elements of the Method 303 inspection (*i.e.*, charging, doors, lids and offtakes, and collecting mains).

(6) The criteria used to determine proficiency.

(7) The panel members to be utilized (see Section 10.1.3) along with their qualifications.

(8) An example certificate of successful course completion.

10.1.1 A trainee must verify completion of at least 12 hours of field observation prior to attending the Method 303 certification course. Trainees shall observe the operation of a coke oven battery as it pertains to Method 303, including topside operations, and shall also practice conducting Method 303 or similar methods. During the field observations, trainees unfamiliar with coke battery operations shall receive instruction from an experienced coke oven observer who is familiar with Method 303 or similar methods and with the operation of coke batteries.

10.1.2 The classroom instruction shall familiarize the trainees with Method 303 through lecture, written training materials, and a Method 303 demonstration video. Successful completion of the classroom portion of the Method 303 training course shall be demonstrated by a perfect score on the initial certification test. Those attending the course for third-year recertification must complete one of the recertification tests selected at random.

10.1.3 All trainees must demonstrate proficiency in the application of Method 303 to a panel of three certified Method 303

observers, including an ability to differentiate coke oven emissions from condensing water vapor and smoldering coal. The composition of the panel must be approved by the Administrator as part of the training course approval process. The panel members will be EPA, state or local agency personnel, or industry contractors listed in 59 FR 11960 (March 15, 1994) or qualified as part of the training provider approval process of section 10.1 of this method.

Each panel member shall have at least 120 days experience in reading visible emissions from coke ovens. The visible emissions inspections that will satisfy the experience requirement must be inspections of coke oven battery fugitive emissions from the emission points subject to emission standards under subpart L of this part (*i.e.*, coke oven doors, topside port lids, offtake system(s), and charging operations), using either Method 303 or predecessor state or local test methods. A “day’s experience” for a particular inspection is a day on which one complete inspection was performed for that emission point under Method 303 or a predecessor state or local method. A “day’s experience” does not mean 8 or 10 hours performing inspections, or any particular time expressed in minutes or hours that may have been spent performing them. Thus, it would be possible for an individual to qualify as a Method 303 panel member for some emission points, but not others (*e.g.*, an individual might satisfy the experience requirement for coke oven doors, but not topside port lids). Until November 15, 1994, the EPA may waive the certification requirement (but not the experience requirement) for panel members. The composition of the panel shall be approved by the EPA.

The panel shall observe the trainee in a series of training runs and a series of certification runs. There shall be a minimum of 1 training run for doors, topside port lids, and offtake systems, and a minimum of 5 training runs (*i.e.*, 5 charges) for charging. During training runs, the panel can advise the trainee on proper procedures. There shall be a minimum of 3 certification runs for doors, topside port lids, and offtake systems, and a minimum of 15 certification runs for charging (*i.e.*, 15 charges). The certification runs shall be unassisted. Following the certification test runs, the panel shall approve or disapprove certification based on the trainee’s performance during the certification runs. To obtain certification, the trainee shall demonstrate, to the satisfaction of the panel, a high degree of proficiency in performing Method 303. To aid in evaluating the trainee’s performance, a checklist, approved by the EPA, will be used by the panel members.

10.1.4 Those successfully completing the initial certification or third-year recertification requirements shall receive a certificate showing certification as a Method 303 observer and the beginning and ending dates of the certification period.

10.1.5 The training provider will submit to the EPA or its designee the following information for each trainee successfully completing initial certification or third-year recertification training: Name, employer,

address, telephone, cell and/or fax numbers, email address, beginning and ending dates of certification, and whether training was for 3-year certification or 1-year recertification. This information must be submitted within 30 days of the course completion.

10.1.6 The training provider will maintain the following records, to be made available to EPA or its designee on request (within 30 days of a request):

(a) A file for each Method 303 observer containing the signed certification checklists, certification forms and test results for their initial certification, and any subsequent third-year recertifications. Initial certification records must also include documentation showing successful completion of the training prerequisites. Testing results from any interim recertifications must also be included, along with any relevant communications.

(b) A searchable master electronic database of all persons for whom initial certification, third-year recertification or interim recertification. Information contained therein must include: The observer’s name, employer, address, telephone, cell and fax numbers and email address, along with the beginning and ending dates for each successfully completed initial, third-year and interim recertification.

10.1.7 Failure by the training provider to submit example training course materials and/or requested training records to the Administrator may result in suspension of the approval of the provider and course.

10.2 Observer Certification/Recertification. The coke oven observer certification is valid for 1 year. The observer shall recertify annually by reviewing the training material, viewing the training video and answering all of the questions on the recertification test correctly. Every 3 years, an observer shall be required to pass the proficiency test in section 10.1.3 in order to be certified. The years between proficiency tests are referred to as interim years.

* * * * *

[FR Doc. 2016–28097 Filed 11–21–16; 8:45 am]

BILLING CODE 6560–50–P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 180

[EPA–HQ–OPP–2015–0488; FRL–9953–40]

Spodoptera frugiperda Multiple Nucleopolyhedrovirus Strain 3AP2; Exemption From the Requirement of a Tolerance

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: This regulation establishes an exemption from the requirement of a tolerance for residues of *Spodoptera frugiperda* multiple nucleopolyhedrovirus strain 3AP2 in or on all food commodities when used in accordance with label directions and

good agricultural practices. MacIntosh and Associates, Inc. (on behalf of AgBiTech Pty Ltd.) submitted a petition to EPA under the Federal Food, Drug, and Cosmetic Act (FFDCA), requesting an exemption from the requirement of a tolerance. This regulation eliminates the need to establish a maximum permissible level for residues of *Spodoptera frugiperda* multiple nucleopolyhedrovirus strain 3AP2 under FFDCA.

DATES: This regulation is effective November 22, 2016. Objections and requests for hearings must be received on or before January 23, 2017, and must be filed in accordance with the instructions provided in 40 CFR part 178 (see also Unit I.C. of the **SUPPLEMENTARY INFORMATION**).

ADDRESSES: The docket for this action, identified by docket identification (ID) number EPA–HQ–OPP–2015–0488, is available at <http://www.regulations.gov> or at the Office of Pesticide Programs Regulatory Public Docket (OPP Docket) in the Environmental Protection Agency Docket Center (EPA/DC), West William Jefferson Clinton Bldg., Rm. 3334, 1301 Constitution Ave. NW., Washington, DC 20460–0001. The Public Reading Room is open from 8:30 a.m. to 4:30 p.m., Monday through Friday, excluding legal holidays. The telephone number for the Public Reading Room is (202) 566–1744, and the telephone number for the OPP Docket is (703) 305–5805. Please review the visitor instructions and additional information about the docket available at <http://www.epa.gov/dockets>.

FOR FURTHER INFORMATION CONTACT: Robert McNally, Biopesticides and Pollution Prevention Division (7511P), Office of Pesticide Programs, Environmental Protection Agency, 1200 Pennsylvania Ave. NW., Washington, DC 20460–0001; main telephone number: (703) 305–7090; email address: BPPDFRNotices@epa.gov.

SUPPLEMENTARY INFORMATION:

I. General Information

A. Does this action apply to me?

You may be potentially affected by this action if you are an agricultural producer, food manufacturer, or pesticide manufacturer. The following list of North American Industrial Classification System (NAICS) codes is not intended to be exhaustive, but rather provides a guide to help readers determine whether this document applies to them. Potentially affected entities may include:

- Crop production (NAICS code 111).
- Animal production (NAICS code 112).

the modifications described in section 304(c)(3)(B)) less than five percent (by vote and value) of the stock of (or a partnership interest in) each member of the expanded affiliated group.

* * * * *

(i) *Applicability date.* Except as otherwise provided in this paragraph (i), this section applies to domestic entity acquisitions completed on or after September 22, 2014. Paragraph (d)(2) of this section applies to domestic entity acquisitions completed on or after January 13, 2017, and paragraph (d)(1) of this section applies to domestic entity acquisitions completed on or after November 19, 2015. Paragraph (g) of this section applies to domestic entity acquisitions completed on or after April 4, 2016. However, for domestic entity acquisitions completed on or after

September 22, 2014, and before November 19, 2015, taxpayers may elect to apply paragraph (d)(1) of this section. For domestic entity acquisitions completed on or after September 22, 2014, and before January 13, 2017, taxpayers may elect to apply paragraph (d)(2) of this section or § 1.7874-10T(d)(2) as contained in the Internal Revenue Bulletin (IRB) 2016-20 (see https://www.irs.gov/irb/2016-20_IRB/ar05.html). In addition, for domestic entity acquisitions completed on or after September 22, 2014, and before April 4, 2016, taxpayers may elect to determine NOCDs consistently on the basis of taxable years, in lieu of 12-month periods, in a manner consistent with the principles of this section. See paragraph (h)(5) of this section.

* * * * *

■ **Par. 8.** Section 1.7874-12T is amended by revising the introductory text of paragraph (a) to read as follows:

§ 1.7874-12T Definitions (temporary).

(a) *Definitions.* Except as otherwise provided, the following definitions apply for purposes of this section and §§ 1.367(b)-4T, 1.956-2T, 1.7701(l)-4T, 1.7874-2, 1.7874-2T, 1.7874-4, 1.7874-5, and 1.7874-6T through 1.7874-11T.

* * * * *

§§ 1.7874-1, 1.7874-6T, 1.7874-7T, 1.7874-9T, and 1.7874-10T [Amended]

■ **Par. 9.** For each provision listed in the table below, removing the language in the “Remove” column and adding in its place the language in the “Add” column:

Provision	Remove	Add
§ 1.7874-1(c)(1), second sentence	§ 1.7874-4T	§ 1.7874-4
§ 1.7874-1(c)(1), second sentence	§ 1.7874-4T(h)	§ 1.7874-4(h)
§ 1.7874-6T(g), Example 4(iii), first sentence	§ 1.7874-4T(i)(7)	§ 1.7874-4(i)(2)
§ 1.7874-7T(b)(1), first sentence	§ 1.7874-4T(b)	§ 1.7874-4(b)
§ 1.7874-7T(c)(1)	§ 1.7874-4T(b)	§ 1.7874-4(b)
§ 1.7874-7T(f)(1)(i)	§ 1.7874-4T(i)(7)	§ 1.7874-4(i)(2)
§ 1.7874-7T(f)(2), introductory text	§ 1.7874-4T(b)	§ 1.7874-4(b)
§ 1.7874-7T(f)(3)(i)	§ 1.7874-4T(b)	§ 1.7874-4(b)
§ 1.7874-7T(f)(3)(ii)	§ 1.7874-4T(b)	§ 1.7874-4(b)
§ 1.7874-7T(g), Example 1(i), penultimate sentence	§ 1.7874-4T(i)(7)	§ 1.7874-4(i)(2)
§ 1.7874-7T(g), Example 1(ii), first sentence	§ 1.7874-4T(c)	§ 1.7874-4(c)
§ 1.7874-7T(g), Example 1(ii), first sentence	§ 1.7874-4T(b)	§ 1.7874-4(b)
§ 1.7874-7T(g), Example 2(i), last sentence	§ 1.7874-4T(i)(7)	§ 1.7874-4(i)(2)
§ 1.7874-7T(g), Example 2(ii), first sentence	§§ 1.7874-4T(b) and	§§ 1.7874-4(b) and
§ 1.7874-7T(g), Example 3(i), penultimate sentence	§ 1.7874-4T(i)(7)	§ 1.7874-4(i)(2)
§ 1.7874-9T(e)(3), introductory text	§ 1.7874-4T	§ 1.7874-4
§ 1.7874-10T(d)(1), introductory text	§§ 1.7874-4T(b) and	§§ 1.7874-4(b) and
§ 1.7874-10T(f)(3)(iii)(B)	§ 1.7874-4T and	§ 1.7874-4 and

John Dalrymple,
Deputy Commissioner for Services and Enforcement.

Approved: December 6, 2016.

Mark J. Mazur
Assistant Secretary of the Treasury (Tax Policy).

[FR Doc. 2017-00643 Filed 1-13-17; 4:15 pm]

BILLING CODE 4830-01-P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 63

[EPA-HQ-OAR-2010-0895; 9958-01-OAR]

RIN 2060-AS90

National Emission Standards for Hazardous Air Pollutants: Ferroalloys Production

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule; notice of final action on reconsideration.

SUMMARY: This action sets forth the Environmental Protection Agency’s (EPA’s) final decision on the issues for which it announced reconsideration on July 12, 2016, that pertain to certain aspects of the June 30, 2015, final amendments for the Ferroalloys Production source category regulated under national emission standards for hazardous air pollutants (NESHAP). The EPA is amending the rule to allow existing facilities with positive pressure baghouses to perform visible emissions monitoring twice daily as an alternative to installing and operating bag leak detection systems (BLDS) to ensure the baghouses are operating properly. In addition, this final action explains that EPA is maintaining the requirement that facilities must use a digital camera opacity technique (DCOT) method to demonstrate compliance with opacity limits. However, this final action revises

the rule such that it references the recently updated version of the DCOT method. In this action, the EPA also explains that no changes are being made regarding the rule provision that requires quarterly polycyclic aromatic hydrocarbons (PAH) emission testing for furnaces producing ferromanganese (FeMn) with an opportunity for facilities to request decreased compliance test frequency from their permitting authority after the first year. Furthermore, in this action, the EPA is denying the request for reconsideration of the PAH emission limits for both FeMn and silicomanganese (SiMn) production furnaces.

DATES: This final action is effective on January 18, 2017. The incorporation by reference of certain publications listed in the rule is approved by the Director of the Federal Register as of January 18, 2017.

ADDRESSES: The EPA has established a docket for this action under Docket ID

No. EPA-HQ-OAR-2010-0895. All documents are listed on the <http://www.regulations.gov> Web site. Although listed in the index, some information is not publicly available, e.g., confidential business information or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are available either electronically through <http://www.regulations.gov> or in hard copy at the EPA Docket Center (EPA/DC), Room 3334, EPA WJC West Building, 1301 Constitution Ave. NW., Washington, DC 20004. The Public Reading Room is open from 8:30 a.m. to 4:30 p.m., Monday through Friday, excluding legal holidays. The telephone number for the Public Reading Room is (202) 566-1744, and the telephone number for the Docket Center is (202) 566-1742.

FOR FURTHER INFORMATION CONTACT: Phil Mulrine, Sector Policies and Programs Division (D243-02), Office of Air Quality Planning and Standards, Environmental Protection Agency, Research Triangle Park, North Carolina 27711; telephone number: (919) 541-5289; fax number: (919) 541-3207; email address: mulrine.phil@epa.gov.

SUPPLEMENTARY INFORMATION:

Organization of this Document. The following outline is provided to aid in locating information in this preamble.

- I. General Information
 - A. Does this action apply to me?
 - B. How do I obtain a copy of this document and other related information?
 - C. Judicial Review and Administrative Reconsideration
- II. Background Information
- III. Summary of Final Action on Issues Reconsidered
 - A. Alternative Monitoring for Existing Positive Pressure Baghouses
 - B. DCOT Compliance Demonstration and Revised DCOT Test Method
 - C. Quarterly PAH Testing for Furnaces Producing FeMn
- IV. Denial of Petition for Reconsideration of FeMn and SiMn PAH Emission Limits
- V. Impacts Associated With This Final Rule
 - A. What are the air impacts?
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- VI. Statutory and Executive Order Reviews
 - A. Executive Order 12866: Regulatory Planning and Review and Executive Order 13563: Improving Regulation and Regulatory Review
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- E. Executive Order 13132: Federalism
- F. Executive Order 13175: Consultation and Coordination With Indian Tribal Governments
- G. Executive Order 13045: Protection of Children From Environmental Health Risks and Safety Risks
- H. Executive Order 13211: Actions Concerning Regulations That Significantly Affect Energy Supply, Distribution, or Use
- I. National Technology Transfer and Advancement Act (NTTAA) and 1 CFR Part 51
- J. Executive Order 12898: Federal Actions To Address Environmental Justice in Minority Populations and Low-Income Populations
- K. Congressional Review Act (CRA)

I. General Information

A. Does this action apply to me?

Regulated Entities. Categories and entities potentially regulated by this action are shown in Table 1 of this preamble.

TABLE 1—NESHAP AND INDUSTRIAL SOURCE CATEGORIES AFFECTED BY THIS FINAL ACTION

NESHAP and source category	NAICS ^a code
Ferroalloys Production	331112

^aNorth American Industry Classification System.

Table 1 of this preamble is not intended to be exhaustive, but rather to provide a guide for readers regarding entities likely to be affected by the final action for the source category listed. To determine whether your facility is affected, you should examine the applicability criteria in 40 CFR part 63, subpart XXX (National Emission Standards for Hazardous Air Pollutants: Ferroalloys Production). If you have any questions regarding the applicability of this final action to a particular entity, consult either the air permitting authority for the entity or your EPA Regional representative as listed in 40 CFR 63.13 (General Provisions).

B. How do I obtain a copy of this document and other related information?

The docket number for this final action regarding the Ferroalloys Production NESHAP (40 CFR part 63, subpart XXX) is Docket ID No. EPA-HQ-OAR-2010-0895.

In addition to being available in the docket, an electronic copy of this document will also be available on the World Wide Web (WWW). Following signature, a copy of this document will

be posted at <https://www.epa.gov/stationary-sources-air-pollution/ferromanganese-and-silicomanganese-production-national-emission>.

C. Judicial Review and Administrative Reconsideration

Under Clean Air Act (CAA) section 307(b)(1), judicial review of this final action is available only by filing a petition for review in the United States Court of Appeals for the District of Columbia Circuit by March 20, 2017. Under CAA section 307(b)(2), the requirements established by this final rule may not be challenged separately in any civil or criminal proceedings brought by the EPA to enforce the requirements.

Section 307(d)(7)(B) of the CAA further provides that “[o]nly an objection to a rule or procedure which was raised with reasonable specificity during the period for public comment (including any public hearing) may be raised during judicial review.” This section also provides a mechanism for the EPA to reconsider the rule “[i]f the person raising an objection can demonstrate to the Administrator that it was impracticable to raise such objection within [the period for public comment] or if the grounds for such objection arose after the period for public comment (but within the time specified for judicial review) and if such objection is of central relevance to the outcome of the rule.” Any person seeking to make such a demonstration should submit a Petition for Reconsideration to the Office of the Administrator, U.S. EPA, Room 3000, EPA WJC Building, 1200 Pennsylvania Ave. NW., Washington, DC 20460, with a copy to both the person(s) listed in the preceding **FOR FURTHER INFORMATION CONTACT** section, and the Associate General Counsel for the Air and Radiation Law Office, Office of General Counsel (Mail Code 2344A), U.S. EPA, 1200 Pennsylvania Ave. NW., Washington, DC 20460.

II. Background Information

The EPA published a final residual risk and technology review (RTR) rule for the Ferroalloys Production source category in the **Federal Register** on June 30, 2015 (80 FR 37366), which included, among other things, the following:

- Revisions to the emission limits for particulate matter (PM) from stacks for the electric arc furnaces, metal oxygen refining (MOR) processes, and crushing and screening operations to minimize PM emissions from these units;
- Emission limits for four previously unregulated hazardous air pollutants

(HAP): Formaldehyde, hydrogen chloride, mercury, and PAH;

- Requirements to capture process fugitive emissions using effective, enhanced local capture, and duct the captured emissions to control devices;
 - An average opacity limit of 8 percent during a full furnace cycle and a maximum opacity limit of 20 percent for any two consecutive 6-minute periods to ensure effective capture and control of process fugitive emissions;
 - A requirement to conduct opacity observations using the DCOT at least once per week for a full furnace cycle for each operating furnace and each MOR operation for at least 26 weeks. After 26 weeks, if all tests are compliant, facilities can decrease to monthly opacity observations;
 - A requirement to use BLDS to monitor PM emissions from all furnace baghouses; and
 - A requirement to conduct periodic performance testing to demonstrate compliance with the stack emission limits for the various HAP, including a requirement to conduct PAH performance testing every 3 months for furnaces producing FeMn with the opportunity to reduce to annual testing after the first year.

Following promulgation of the final rule, the EPA received two petitions for reconsideration of several provisions of the NESHAP pursuant to CAA section 307(d)(7)(B). The EPA received a petition dated August 25, 2015, from Eramet Marietta Inc. (Eramet) and a petition dated August 28, 2015, from Felman Production LLC (Felman). In the petition submitted by Eramet, the company requested the EPA reconsider the following issues: (1) The requirement to conduct PAH performance testing every 3 months for furnaces producing FeMn; (2) the requirement to demonstrate compliance weekly with shop building opacity limits using the American Society for Testing and Materials (ASTM) DCOT test method; and (3) the PAH emission limits for existing furnaces producing FeMn and SiMn. In addition, Eramet requested a stay of 90 days from the effective date of the final amendments pending completion of the reconsideration proceeding. In the petition submitted by Felman, the company stated that it supported and adopted the petition submitted by Eramet and requested reconsideration of the requirement to use BLDS to monitor emissions from positive pressure baghouses. Copies of the petitions are provided in the docket (see EPA Docket ID No. EPA-HQ-OAR-2010-0895).

On November 5, 2015, the EPA sent letters to the petitioners granting

reconsideration of two issues: The PAH testing compliance frequency issue raised by Eramet and the use of BLDS on positive pressure baghouses raised by Felman. In those letters, the EPA said it was still reviewing the other issues and intended to take final action on those when it took final action on BLDS and PAH testing frequency. The agency also stated in the letters that a proposed **Federal Register** notice would be issued initiating the reconsideration process for the issues that the EPA is granting reconsideration. The EPA published the proposed notice of reconsideration in the **Federal Register** on July 12, 2016 (81 FR 45089).

In addition to the two requirements mentioned above (*i.e.*, PAH testing frequency for furnaces producing FeMn and the use of BLDS to monitor PM emissions from positive pressure baghouses), the EPA also granted reconsideration of a third issue in the reconsideration proposal notice (81 FR 45089): the requirement to use DCOT in accordance with ASTM D7520–13 to demonstrate compliance with shop building opacity standards. However, for each of these three requirements, after further analyses, evaluation, and consideration, we explained in the reconsideration proposal notice that we continued to believe these requirements were appropriate. Therefore, we did not propose any changes to these requirements. Instead, we provided further discussion and explanation as to why we believed it was appropriate to maintain these requirements in the rule, provided additional technical information to the record, and requested comment on the three requirements for which the EPA granted reconsideration.

III. Summary of Final Action on Issues Reconsidered

After reviewing and considering all the public comments received in response to the reconsideration proposal, the EPA has decided to amend the baghouse monitoring requirements to allow existing facilities with positive pressure baghouses to perform visible emissions monitoring twice daily using Method 22 as an alternative to using BLDS. In addition, although EPA is maintaining the requirement to use DCOT to demonstrate compliance with the opacity standards, this final action amends the references to the ASTM DCOT test method in the opacity monitoring requirements to the recently updated version of the method (ASTM D7520–16). The EPA is also maintaining the quarterly PAH emission testing requirement for furnaces producing FeMn with an opportunity for facilities to request decreased compliance test

frequency from their permitting authority after the first year. Each of these issues is discussed in more detail in this section of the preamble.

A. Alternative Monitoring for Existing Positive Pressure Baghouses

In their petition for reconsideration, one petitioner (Felman) objected to the EPA's requirement to use BLDS for positive pressure baghouses. The petitioner pointed out that the EPA's own guidance¹ indicates that BLDS are not appropriate for use on a positive pressure baghouse, given the different configurations of these types of units. The petitioner commented that although the EPA stated that it had knowledge of BLDS in operation on positive pressure baghouses, the EPA did not provide any specific examples. In addition, the petitioner claimed the EPA had not evaluated the costs associated with the application of BLDS on positive pressure baghouses but instead simply estimated the cost to be comparable with BLDS for negative pressure baghouses.

In their comments on the reconsideration proposal (81 FR 45089), the petitioner stated that the EPA's supporting documents did not provide any examples of BLDS in operation on positive pressure baghouses comparable to those used at the petitioner's facility, which are low airflow and use natural-draft openings instead of stacks. The petitioner provided cost quotes from vendors of \$1.1 million to install the BLDS and make the necessary structural improvements (including a catwalk system) to support the operation of the BLDS.

In light of the petitioner's assertions, we re-evaluated the BLDS requirement for positive pressure baghouses. While we maintain that BLDS can be installed and operated on positive pressure baghouses, we agree that, due to their particular circumstances, it would be difficult to retrofit this facility based on the specific design of their positive pressure baghouses. Furthermore, we agree that installing BLDS and the associated infrastructure would not be cost effective. In our analysis for the proposal, we estimated the capital cost of installing BLDS on the three positive pressure baghouses to be \$269,100, with annualized costs of \$219,000. However, we did not include any additional costs for structural improvements to support BLDS on these baghouses. The petitioner provided a cost estimate of

¹ EPA Office of Air Quality Planning and Standards (OAQPS), Fabric Filter Bag Leak Detection Guidance, EPA-454/R-98-015, September 1997.

\$870,000 for structural improvements to install BLDS on their three baghouses. Given this additional information, we now estimate the capital costs would be about \$1.1 million, and annualized costs would be \$330,000. Because of the structural modifications needed to install BLDS, the higher annualized costs and the potential technical issues on this particular control configuration at Felman, it would be unreasonable to require BLDS as the sole method for monitoring positive pressure baghouses in this rule. Nevertheless, we believe the baghouses need to be monitored on a regular basis to ensure they are operating as intended and that there are no tears or holes in the bags. Therefore, we have revised the rule to allow for an alternative monitoring method to the BLDS requirement for positive pressure baghouses used to control emissions from an electric arc furnace. We are allowing twice daily visual monitoring of the outlet of each furnace baghouse using Method 22 for evidence of any visible emissions indicating abnormal operations as an alternative to BLDS. We believe this revision will reduce the cost burden associated with monitoring the positive pressure baghouses used to control emissions from the furnaces and avoid possible technical issues, but still provide assurance that the baghouses are functioning correctly and controlling metal HAP emissions from the furnaces. More details are available in the *Summary of Public Comments and Responses on Reconsideration of the Ferroalloys Production NESHAP Final Rule* in the docket for this rulemaking.

B. DCOT Compliance Demonstration and Revised DCOT Test Method

In the June 30, 2015, final rule (80 FR 37366), we finalized opacity standards for process fugitive emissions from the furnace buildings and required the use of DCOT and the ASTM D7520–13 test method to demonstrate compliance with the opacity standards. In their petitions for reconsideration, Eramet and Felman objected to the use of DCOT in lieu of EPA Method 9 and stated that the EPA did not propose DCOT as the only method for demonstrating compliance with the opacity standards. The petitioners argued that DCOT was an unproven substitute for EPA Method 9 to measure opacity from emission sources and that variability in plume location and orientation at the ferroalloy production buildings would make DCOT infeasible at their facilities. The petitioners also noted that the ASTM test method only applies to stack openings of 7 feet in diameter or less and that DCOT is only provided by one vendor.

In their comments on the reconsideration proposal (81 FR 45089), several commenters objected to the use of DCOT as the sole method for opacity compliance and stated that the EPA should allow the option of using EPA Method 9. The commenters argue that DCOT is limited to stationary point sources and not fugitive emissions, and they pointed out that the supporting data for DCOT are all from studies performed on stationary point sources and not long, open vent sources such as those at the Eramet facility. A few commenters had concerns with the timeliness of the opacity determinations and the accuracy of the results. The commenters were also concerned that there is currently only one vendor of DCOT and that the EPA should not choose vendors for an entire industry.

On the other hand, a few commenters were supportive of the use of the DCOT. In the opinion of one commenter, DCOT is comparable to Method 9 observations, on all shapes, sizes, types of sources, and that DCOT is configurable with all types of cameras to tailor the implementation at the shop/building level to support cost-effective and efficient observations.

Another commenter explained that strong monitoring, testing and compliance measures are an essential part of the emission standards, and that the use of these measures also increases the incentive for sources to comply with the standards. The commenter states that EPA's requirement for DCOT is consistent with an important way to implement EPA's "next generation compliance." The commenter notes that the EPA's next generation compliance policy includes, among other things, the following: (1) Use and promotion of advanced emissions/pollutant detection technology so that regulated entities, the government, and the public can more easily see pollutant discharges, environmental conditions, and noncompliance; (2) expanded transparency by making information more accessible to the public; and (3) development and use of innovative enforcement approaches (e.g., data analytics and targeting) to achieve more widespread compliance.

Other comments and responses on DCOT can be found in the *Summary of Public Comments and Responses on Reconsideration of the Ferroalloys Production NESHAP Final Rule* in the docket for this rulemaking.

Based on the information provided by the petitioners and the commenters, we re-evaluated the DCOT opacity monitoring requirement and determined that DCOT is still an appropriate method for determining opacity from

the shop buildings for this source category.

As explained in the initial proposal (76 FR 72508), supplemental proposal (79 FR 60238), and in the 2015 final rule (80 FR 37366), process fugitive emissions from the shop buildings are a significant source of risk from the production of ferroalloys. In each of these three actions, we concluded risks were unacceptable, largely driven by process fugitive emissions of air toxics metals.

To reduce risks to acceptable levels and protect the public with an ample margin of safety, in the initial proposal, we proposed facilities would need to install and operate full building enclosures to capture and control fugitive emissions. In response to the initial proposal, industry commented that full building enclosure requirement would be very costly and difficult to implement, and suggested an alternative approach using localized capture equipment to reduce fugitive emissions from the shop buildings. Modeling of the localized capture approach indicated that similar reductions in risk could be achieved, making this option more feasible and at significantly lower cost than full building enclosure. Based on these modeling results and consideration of costs and feasibility, we proposed the localized capture approach to significantly reduce fugitive emissions from the shop buildings in the supplemental proposal (79 FR 60238), and finalized this approach in the 2015 final rule (80 FR 37366). Specifically, the final rule requires facilities to install, maintain and operate a system designed to effectively capture and control process fugitive emissions. Furthermore, for this rule, opacity standards are the main compliance approach to ensure the process fugitive emissions are effectively captured and controlled on a continuous basis, and that the public is protected with ample margin of safety. Since process fugitive emissions were the main contributor to the unacceptable risks at baseline, and since opacity is the main tool to ensure these process fugitive emissions are effectively captured and controlled and that the public is protected with an ample margin of safety, we finalized requirements for the use of DCOT to demonstrate compliance with the opacity standard in the June 30, 2015, final rule (80 FR 37366).

The DCOT provides a photographic record of each of the opacity readings. In addition, the photographs are evaluated by a third party and the opacity is determined by the degree the plume reduces the transmitted light and obscures the background. While we

believe, based on validation studies, that EPA Method 9 and DCOT provide comparable opacity results, the DCOT provides better documentation, including a permanent re-analyzable photographic record of the opacity determinations, which we believe will be beneficial to both the industry and the public. There is an advantage of having better documentation in this specific case where fugitive emissions are driving the risk from the Ferroalloys Production source category. In addition, we disagree with the commenters' assertion that this methodology will not work with this source category. Fugitive emissions from this source category are emitted through roof vents at the top of the furnace buildings. Currently, the facilities in this source category use EPA Method 9 to measure opacity from the roof vents. The EPA Method 9 opacity method has procedures and requirements for determining opacity from roof vents and rectangular outlets, which are the same procedures and requirements used in the DCOT test method (ASTM D7520-16). Because the same procedures and requirements are used to measure opacity from roof vents from both these methods, we believe that opacity can be measured from this source category using the DCOT test method. Therefore, we are maintaining the requirement in the final rule that facilities in this source category must use the ASTM DCOT methodology to demonstrate compliance with the opacity standards and we are denying the petitioners' request to allow EPA Method 9 as an alternative method for determining compliance. However, we are revising the final rule language to replace the ASTM D7520-13 Standard Test Method for Determining the Opacity of a Plume in the Outdoor Ambient Atmosphere with the latest revision of the method, ASTM D7520-16. The ASTM D7520-13 method was revised by removing the stack diameter scope limitation along with editorial corrections in April 2016. We believe that this change will address the commenter's concerns specifically with the 7 foot stack diameter scope limitation in the ASTM D7520-13 method because the updated ASTM D7520-16 method has removed that limitation. However, fugitive emissions from this source category are not emitted from stacks with a diameter greater than 7 feet, but from roof vents. Therefore, we do not believe that the 7-foot diameter limitation prevented us from requiring the use of the ASTM method for measuring opacity using DCOT. As stated earlier in this section, the ASTM D7520-16 method provides

the same approach for determining opacity from nontraditional point sources such as roof vents as would EPA Method 9.

C. Quarterly PAH Testing for Furnaces Producing FeMn

In the reconsideration proposal (81 FR 45089), the EPA also reconsidered the requirement for furnaces producing FeMn to conduct PAH performance testing every 3 months with an option following the first year, to do annual performance testing. The petitioner stated that the PAH testing frequency for furnaces producing FeMn in the supplemental proposal (79 FR 60238) was every 5 years and that the quarterly testing requirement was added in the final rule. The petitioner also noted that the change in PAH testing frequency represents an increase in compliance costs of \$75,000 in the first year of implementation and an increase of \$475,000 in compliance costs over the first 5 years (assuming the facility is not granted reduced frequency of testing after the first year), in comparison to the supplemental proposal PAH testing requirement. The petitioner also argued that if the EPA believes that the PAH emissions dataset is inadequate to establish a representative and reliable MACT floor, the proper solution is to collect additional data pursuant to CAA section 114(a), rather than collecting data through compliance tests. We granted reconsideration on this issue to provide an opportunity for public comment on the PAH testing frequency for furnaces producing FeMn. A summary of the comments received on this issue and the responses are provided in the *Summary of Public Comments and Responses on Reconsideration of the Ferroalloys Production NESHAP Final Rule* available in the docket for this rulemaking.

As we stated in the reconsideration proposal (81 FR 45089), we received additional PAH test data just 3 weeks prior to the signature of the supplemental proposal (which we were not able to include in our analyses in time for signature of the supplemental proposal) and yet more data during the comment period for the supplemental proposal. This new data showed PAH emissions from furnaces producing FeMn were over 12 times higher in concentration than previous test reports submitted by the petitioner. As we explained in the reconsideration proposal, this data thus demonstrates that PAH emissions from furnaces producing FeMn are highly variable. Moreover, PAH emissions are a major source of cancer risks from these

furnaces. In the risk assessment performed for the supplemental proposal (79 FR 60238), we estimated the maximum lifetime individual cancer risk posed by actual emissions from the ferroalloys production facilities was 20-in-1 million, with PAH contributing 49 percent of the cancer risk.

Testing frequency is part of verification that the limit is met. Stack testing is an important tool used to determine a facility's compliance with both initial and on-going compliance with the CAA requirements. A highly variable set of measurements on which the limit is based leads to us to want more certainty about the source's compliance with the limit, and such certainty can be provided by more frequent testing. Because of the variability of the PAH emissions during FeMn production, we believe that the quarterly testing is appropriate for ensuring compliance with the emission limit and protecting human health.

Furthermore, as we explained in the final rule and the reconsideration proposal, we believe the quarterly testing, along with the collection of process information that a facility may choose to collect voluntarily, could provide data that would help facilities learn what factors or conditions are contributing to the quantity and variation of PAH emissions. For example, we believe the collection and analyses of information about the amounts and types of input materials, types of electrodes used, electrode consumption rates, furnace temperature, and other furnace, process, or product information may help facilities understand what factors are associated with the higher PAH emissions and could provide insight regarding how to limit these emissions. Furthermore, as we described in the preamble of the final rule (80 FR 37383), if a facility decides to apply for a decreased frequency of performance testing from their permit authority, the type of information described above could be helpful input for such an application. For these reasons, the quarterly performance testing with an opportunity after the first year for facilities to request from their permitting authority a decreased frequency to annual performance testing is appropriate for ensuring compliance with the PAH emission limit and protecting human health. The option for decreased performance testing also provides an incentive for the facilities to achieve compliance with the PAH standards. Therefore, we are not making any changes to the PAH testing frequency for furnaces producing FeMn.

IV. Denial of Petition for Reconsideration of FeMn and SiMn PAH Emission Limits

In the final rule, the EPA set PAH limits of 0.130 milligrams per dry standard cubic meter (mg/dscm) for furnaces producing SiMn and 12 mg/dscm for furnaces producing FeMn. Both petitioners requested reconsideration of these emission limits and asserted that they did not have an opportunity to comment on the limits. The petitioners were concerned that achieving these PAH emission limits may require additional controls. The petitioners also argued with how the PAH emission limits were calculated. The petitioners claimed that the EPA used a normal data distribution to determine the upper prediction limit (UPL), but the data sets have lognormal distributions. The petitioners further claim that had the EPA used a lognormal distribution, it would have resulted in higher emission limits. In addition, one petitioner argued that EPA should not have excluded a 3-hour single test run.

As stated in the preamble for the final rule (80 FR 37366), the PAH emission limits were re-evaluated in the final rule to include PAH test data that were received just prior to publication of the supplemental proposal and during the comment period for the supplemental proposal. The expanded PAH test data set was analyzed using the same statistical procedures from the EPA's UPL memorandum used to calculate the PAH emissions limits in the supplemental proposal. Using the statistical procedures from this memorandum (which describes the EPA's established procedures for calculating MACT floor limits), the PAH data sets were determined to have a normal distribution. Therefore, the UPL equation for calculating the 99-percent UPL was used to determine the PAH emission limit. The EPA had already provided adequate notice of the analyses and application of the UPL in the memorandum in the supplemental proposal (79 FR 60238). With regard to the 3-hour single test run the petitioner referred to in their reconsideration petition, we determined there were quality assurance and control issues with the laboratory analysis, and therefore did not include these data in the UPL analysis. The results of every valid 3-run test provided by the industry were below the final PAH limits for both FeMn and SiMn production. Therefore, we believe both facilities should be able to comply with these limits without the need for additional add-on controls.

Furthermore, EPA calculated the limits using well established EPA policy and procedures. At the time the EPA published the supplemental proposal (79 FR 60238, October 6, 2014), the EPA made the existing PAH emissions data and the methodologies used to calculate the limits available for public comment. The limits in the final rule were a logical outgrowth of the limits in the supplemental proposal as EPA made no changes to the methodology used to calculate the limits and simply recalculated the limits after the addition of the newly available data with the previously received data. Therefore, we have decided to deny reconsideration of the PAH emission limits for both FeMn and SiMn production furnaces. More details are available in the *Summary of Public Comments and Responses on Reconsideration of the Ferroalloys Production NESHAP Final Rule* in the docket for this rulemaking.

V. Impacts Associated With This Final Rule

We project that this rule will result in no significant changes in costs, emission reductions or benefits. Even though there are changes to the costs, these changes are small relative to the overall costs and benefits of the 2015 final rule. However, the costs for monitoring baghouses will be lower than the costs in the final rule due to the additional option provided in this action to use visible emissions monitoring to monitor positive pressure baghouses as an alternative to installing and operating a BLDS.

A. What are the air impacts?

Even though we have allowed for an alternative monitoring method to the BLDS requirement for positive pressure baghouses, we believe that this change will result in no additional emissions from the baghouses used to control emissions from the furnace. Accordingly, we believe that the final rule will not result in significant changes in emissions of any of the regulated pollutants.

B. What are the energy impacts?

The changes to the final rule are anticipated to have minimal effect on the supply, distribution or use of energy. As previously stated, we are allowing for an alternative monitoring method to the BLDS requirement for positive pressure baghouses controlling emissions from the furnace. By allowing this alternative, we anticipate slightly lower energy usage by the one facility that uses this type of baghouse.

C. What are the compliance costs?

We believe there will be no significant change in compliance costs as a result of the changes to the final rule. However, as mentioned above, we anticipate that one facility will have moderately lower compliance costs due to allowing an alternative monitoring method for positive pressure baghouses. We anticipate that the alternative monitoring method will have an annual cost of \$38,000, whereas the annual operating cost for a BLDS was estimated to be \$219,000. Overall, we anticipate the Ferroalloys Production source category will not incur significant compliance costs or savings as a result of the changes to the final rule.

D. What are the economic and employment impacts?

We believe that there will be a slight economic benefit to one of the facilities due to allowing an alternative monitoring method for positive pressure baghouses. In the reconsideration proposal, we estimated the capital cost for the installation of BLDS for each facility would be \$269,100 and annualized costs would be \$219,000. For this final action, based on information received from the company, we now estimate capital costs for the BLDS for Felman would be \$1.1 million with annualized costs of \$330,000. We believe allowing an alternative monitoring method for positive pressure baghouses in this final action will reduce the cost of complying with the final rule for this facility. However, we believe this final action will not have any impacts on the price of electricity, employment or labor markets or the U.S. economy.

E. What are the benefits of the final standards?

We do not anticipate any emission changes, and therefore there are no direct monetized benefits or disbenefits associated with the changes to this final rule.

VI. Statutory and Executive Order Reviews

Additional information about these statutes and Executive Orders can be found at <http://www2.epa.gov/laws-regulations/laws-and-executive-orders>.

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 and was, therefore, not submitted to the Office of Management and Budget (OMB) for review.

B. Paperwork Reduction Act (PRA)

This action does not impose any new information collection burden under the PRA. OMB has previously approved the information collection activities contained in the existing regulations and has assigned OMB control number 2060–0676. This action adds an alternative monitoring requirement and a revised test method, but does not make revisions to the reporting requirements in the final rule. Therefore, this action does not change the information collection requirements previously finalized and, as a result, does not impose any additional burden on industry.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. This final action will not impose any requirements on small entities. The agency has determined that neither of the companies affected by this action is considered to be a small entity.

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. The action imposes no enforceable duty on any state, local, or tribal governments or the private sector.

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. There are no ferroalloys production facilities that are owned or operated by tribal governments. Thus, Executive Order 13175 does not apply to this action.

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

This action is not subject to Executive Order 13045 because it is not economically significant as defined in Executive Order 12866, and because the EPA does not believe the environmental health or safety risks addressed by this

action present a disproportionate risk to children. The health risk assessments completed for the final rule are presented in the *Residual Risk Assessment for the Ferroalloys Source Category in Support of the 2015 Final Rule* document, which is available in the docket for this action (EPA–HQ–OAR–2010–0895–0281), and are discussed in Section V.G of the preamble for the final rule (80 FR 37366).

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 (NTTAA) and 1 CFR Part 51

This action involves technical standards. The EPA decided to use ASTM D7520–16, “Standard Test Method for Determining the Opacity of a Plume in the Outdoor Ambient Atmosphere,” for measuring opacity from the shop buildings. The ASTM D7520–16 is a method to assess opacity whereby a Digital Still Camera is used to capture a set of digital images of a plume against a contrasting background. Each image is analyzed with software that determines plume opacity by comparing a user defined portion of the plume image where opacity is being measured in comparison to the background providing the contrasting values. The Analysis Software is used to average the opacities from the series of digital images taken of the plume over a fixed period of time. The software is also used to archive the image set utilized for each opacity determination including the portion of each image selected by the operator. Each DCOT vendor shall provide training for operators of their DCOT system. The training shall include the content of the “Principles of Visual Emissions Measurements and Procedures to Evaluate those Emissions Using the Digital Camera Optical Technique (DCOT)” and a description of how to operate that specific DCOT system that passed smoke school. This standard is an acceptable alternative to EPA Method 9 and is available from the American Society for Testing and Materials, 100 Barr Harbor Drive, Post Office Box C700, West Conshohocken, PA 19428–2959. See <http://www.astm.org/>.

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

The EPA believes that this action does not have disproportionately high and adverse human health or environmental effects on minority populations, low-income populations and/or indigenous peoples, as specified in Executive Order 12898 (59 FR 7629, February 16, 1994). This action does not affect the level of protection provided to human health or the environment because it only provides an alternative monitoring provision and revised test method that will not affect the emission standards that were finalized on June 30, 2015.

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each House of the Congress and to the Comptroller General of the United States. This action is not a “major rule” as defined by 5 U.S.C. 804(2).

List of Subjects in 40 CFR Part 63

Environmental protection, Administrative practice and procedures, Air pollution control, Hazardous substances, Incorporation by reference, Intergovernmental relations, Reporting and recordkeeping requirements.

Dated: December 28, 2016.

Gina McCarthy,
Administrator.

For the reasons stated in the preamble, the Environmental Protection Agency is amending title 40, chapter I, part 63 of the Code of Federal Regulations (CFR) as follows:

PART 63—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR SOURCE CATEGORIES

■ 1. The authority citation for part 63 continues to read as follows:

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

Subpart A—General Provisions

■ 2. Section 63.14 is amended by:
■ a. Redesignating paragraphs (h)(96) through (h)(104) as (h)(97) through (h)(105), respectively; and
■ b. Adding new paragraph (h)(96).

§ 63.14 Incorporations by reference.

* * * * *

(h) * * *
(96) ASTM D7520–16, Standard Test Method for Determining the Opacity of a Plume in the Outdoor Ambient Atmosphere, approved April 1, 2016, IBR approved for §§ 63.1625(b).

* * * * *

Subpart XXX—National Emission Standards for Hazardous Air Pollutants for Ferroalloys Production: Ferromanganese and Silicomanganese

- 3. Section 63.1625 is amended by:
- a. Revising paragraphs (b)(9) introductory text, (b)(9)(i), (b)(9)(ii), and (b)(9)(v); and
- b. Revising paragraphs (d)(1)(ii) through (iv).

The revisions read as follows:

§ 63.1625 What are the performance test and compliance requirements for new, reconstructed, and existing facilities?

* * * * *

(b) * * *

(9) ASTM D7520–16 to determine opacity (incorporated by reference, see § 63.14) with the following conditions:

(i) During the digital camera opacity technique (DCOT) certification procedure outlined in Section 9.2 of ASTM D7520–16, you or the DCOT vendor must present the plumes in front of various backgrounds of color and contrast representing conditions anticipated during field use such as blue sky, trees and mixed backgrounds (clouds and/or a sparse tree stand).

(ii) You must have standard operating procedures in place including daily or other frequency quality checks to ensure the equipment is within manufacturing specifications as outlined in Section 8.1 of ASTM D7520–16.

* * * * *

(v) Use of this method does not provide or imply a certification or validation of any vendor’s hardware or software. The onus to maintain and verify the certification and/or training of the DCOT camera, software and operator in accordance with ASTM D7520–16 and these requirements is on the facility, DCOT operator and DCOT vendor.

* * * * *

(d) * * *

(1) * * *

(ii) You must conduct the opacity observations according to ASTM D7520–16 (incorporated by reference, see § 63.14), for a period that includes at least one complete furnace process cycle for each furnace.

(iii) For a shop building that contains more than one furnace, you must conduct the opacity observations according to ASTM D7520–16 for a period that includes one tapping period from each furnace located in the shop building.

(iv) You must conduct the opacity observations according to ASTM D7520–16 for a 1-hour period that

includes at least one pouring for each MOR located in the shop building.

* * * * *

■ 4. Section 63.1626 is amended by:

- a. Revising paragraphs (c) introductory text and (c)(1);
- b. Redesignating paragraphs (d) through (o) as paragraphs (e) through (p), respectively;
- c. Adding new paragraph (d);
- d. Republishing the heading of redesignated paragraph (e), and revising paragraphs (e)(1), (e)(3) introductory text, (e)(4) introductory text, and (e)(4)(ii);
- e. Revising redesignated paragraph (h) introductory text;
- f. Revising redesignated paragraph (j) introductory text;
- g. Revising redesignated paragraph (k) introductory text; and
- h. Revising redesignated paragraph (p) introductory text.

The revisions and additions read as follows:

§ 63.1626 What monitoring requirements must I meet?

* * * * *

(c) For an existing positive pressure baghouse used to control emissions from an electric arc furnace that is not equipped with a bag leak detection system, you must specify in the standard operating procedures manual for inspections and routine maintenance, at a minimum, the requirements of paragraphs (c)(1) and (2) of this section.

(1) You must visually inspect the outlet of each baghouse using Method 22 on a twice daily basis (at least 4 hours apart) for evidence of any visible emissions indicating abnormal operations and must initiate corrective actions within 1 hour of any visible emissions that indicates abnormal operation. Corrective actions shall include, at a minimum, isolating, shutting down and conducting an internal inspection of the baghouse compartment that is the source of the visible emissions that indicate abnormal operations.

* * * * *

(d) For all other non-furnace baghouses that are not equipped with bag leak detection or CEMS, the procedures that you specify in the standard operating procedures manual for inspections and routine maintenance must, at a minimum, include the requirements of paragraphs (d)(1) and (2) of this section.

(1) You must observe the baghouse outlet on a daily basis for the presence of any visible emissions.

(2) In addition to the daily visible emissions observation, you must conduct the following activities:

- (i) Weekly confirmation that dust is being removed from hoppers through visual inspection, or equivalent means of ensuring the proper functioning of removal mechanisms.
- (ii) Daily check of compressed air supply for pulse-jet baghouses.
- (iii) An appropriate methodology for monitoring cleaning cycles to ensure proper operation.
- (iv) Monthly check of bag cleaning mechanisms for proper functioning through visual inspection or equivalent means.
- (v) Quarterly visual check of bag tension on reverse air and shaker-type baghouses to ensure that the bags are not kinked (knead or bent) or lying on their sides. Such checks are not required for shaker-type baghouses using self-tensioning (spring loaded) devices.
- (vi) Quarterly confirmation of the physical integrity of the baghouse structure through visual inspection of the baghouse interior for air leaks.
- (vii) Semiannual inspection of fans for wear, material buildup and corrosion through visual inspection, vibration detectors, or equivalent means.

* * * * *

(e) *Bag leak detection system.* (1) For each baghouse used to control emissions from an electric arc furnace, you must install, operate, and maintain a bag leak detection system according to paragraphs (e)(2) through (4) of this section, unless a system meeting the requirements of paragraph (p) of this section, for a CEMS and continuous emissions rate monitoring system, is installed for monitoring the concentration of particulate matter, or an existing positive pressure baghouse used to control emissions from an electric arc furnaces that is subject to paragraph (c) of this section. You may choose to install, operate, and maintain a bag leak detection system for any other baghouse in operation at the facility according to paragraphs (e)(2) through (4) of this section.

* * * * *

(3) Each bag leak detection system must meet the specifications and requirements in paragraphs (e)(3)(i) through (viii) of this section.

* * * * *

(4) You must include in the standard operating procedures manual required by paragraph (a) of this section a corrective action plan that specifies the procedures to be followed in the case of a bag leak detection system alarm. The corrective action plan must include, at a minimum, the procedures that you

will use to determine and record the time and cause of the alarm as well as the corrective actions taken to minimize emissions as specified in paragraphs (e)(4)(i) and (ii) of this section.

* * * * *

(ii) The cause of the alarm must be alleviated by taking the necessary corrective action(s) that may include, but not be limited to, those listed in paragraphs (e)(4)(ii)(A) through (F) of this section.

* * * * *

(h) *Shop building opacity.* In order to demonstrate continuous compliance with the opacity standards in § 63.1623, you must comply with the requirements § 63.1625(d)(1) and one of the monitoring options in paragraphs (h)(1) or (2) of this section. The selected option must be consistent with that selected during the initial performance test described in § 63.1625(d)(2). Alternatively, you may use the provisions of § 63.8(f) to request approval to use an alternative monitoring method.

* * * * *

(j) *Requirements for sources using CEMS.* If you demonstrate compliance with any applicable emissions limit through use of a continuous monitoring system (CMS), where a CMS includes a continuous parameter monitoring system (CPMS) as well as a continuous emissions monitoring system (CEMS), you must develop a site-specific monitoring plan and submit this site-specific monitoring plan, if requested, at least 60 days before your initial performance evaluation (where applicable) of your CMS. Your site-specific monitoring plan must address the monitoring system design, data collection and the quality assurance and quality control elements outlined in this paragraph and in § 63.8(d). You must install, operate and maintain each CMS according to the procedures in your approved site-specific monitoring plan. Using the process described in § 63.8(f)(4), you may request approval of monitoring system quality assurance and quality control procedures alternative to those specified in paragraphs (j)(1) through (6) of this section in your site-specific monitoring plan.

* * * * *

(k) If you have an operating limit that requires the use of a CPMS, you must install, operate and maintain each continuous parameter monitoring system according to the procedures in paragraphs (k)(1) through (7) of this section.

* * * * *

(p) *Particulate Matter CEMS.* If you are using a CEMS to measure particulate matter emissions to meet requirements of this subpart, you must install, certify, operate and maintain the particulate matter CEMS as specified in paragraphs (p)(1) through (4) of this section.

* * * * *

■ 5. Section 63.1656 is amended by revising paragraphs (b)(7) introductory text, (b)(7)(i) and (ii), and (b)(7)(v) to read as follows:

§ 63.1656 Performance testing, test methods, and compliance demonstrations.

* * * * *

(b) * * *

(7) Method 9 of appendix A–4 of 40 CFR part 60 to determine opacity. ASTM D7520–16, “Standard Test Method for Determining the Opacity of a Plume in the Outdoor Ambient Atmosphere” may be used (incorporated by reference, see § 63.14) with the following conditions:

(i) During the digital camera opacity technique (DCOT) certification procedure outlined in Section 9.2 of ASTM D7520–16, the owner or operator or the DCOT vendor must present the plumes in front of various backgrounds of color and contrast representing conditions anticipated during field use such as blue sky, trees and mixed backgrounds (clouds and/or a sparse tree stand).

(ii) The owner or operator must also have standard operating procedures in place including daily or other frequency quality checks to ensure the equipment is within manufacturing specifications as outlined in Section 8.1 of ASTM D7520–16.

* * * * *

(v) Use of this approved alternative does not provide or imply a certification or validation of any vendor’s hardware or software. The onus to maintain and verify the certification and/or training of the DCOT camera, software and operator in accordance with ASTM D7520–16 and these requirements is on the facility, DCOT operator and DCOT vendor.

* * * * *

[FR Doc. 2017–00156 Filed 1–17–17; 8:45 am]

BILLING CODE 6560–50–P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 180

[EPA–HQ–OPP–2015–0829; FRL–9956–85]

Acequinocyl; Pesticide Tolerances

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: This regulation establishes tolerances for residues of acequinocyl in or on multiple commodities which are identified and discussed later in this document. Interregional Project Number 4 (IR–4) requested these tolerances under the Federal Food, Drug, and Cosmetic Act (FFDCA).

DATES: This regulation is effective January 18, 2017. Objections and requests for hearings must be received on or before March 20, 2017, and must be filed in accordance with the instructions provided in 40 CFR part 178 (see also Unit I.C. of the **SUPPLEMENTARY INFORMATION**).

ADDRESSES: The docket for this action, identified by docket identification (ID) number EPA–HQ–OPP–2015–0829, is available at <http://www.regulations.gov> or at the Office of Pesticide Programs Regulatory Public Docket (OPP Docket) in the Environmental Protection Agency Docket Center (EPA/DC), West William Jefferson Clinton Bldg., Rm. 3334, 1301 Constitution Ave. NW., Washington, DC 20460–0001. The Public Reading Room is open from 8:30 a.m. to 4:30 p.m., Monday through Friday, excluding legal holidays. The telephone number for the Public Reading Room is (202) 566–1744, and the telephone number for the OPP Docket is (703) 305–5805. Please review the visitor instructions and additional information about the docket available at <http://www.epa.gov/dockets>.

FOR FURTHER INFORMATION CONTACT: Michael Goodis, Registration Division (7505P), Office of Pesticide Programs, Environmental Protection Agency, 1200 Pennsylvania Ave. NW., Washington, DC 20460–0001; main telephone number: (703) 305–7090; email address: RDfrNotices@epa.gov.

SUPPLEMENTARY INFORMATION:

I. General Information

A. Does this action apply to me?

You may be potentially affected by this action if you are an agricultural producer, food manufacturer, or pesticide manufacturer. The following list of North American Industrial Classification System (NAICS) codes is not intended to be exhaustive, but rather provides a guide to help readers determine whether this document applies to them. Potentially affected entities may include:

- Crop production (NAICS code 111).
- Animal production (NAICS code 112).
- Food manufacturing (NAICS code 311).
- Pesticide manufacturing (NAICS code 32532).

Lawrence, New York is a double-leaf bascule bridge offering mariners a vertical clearance of 25 feet at mean high water and 30 feet at mean low water in the closed position. Installation of a work platform underneath the bascule spans will reduce available vertical clearance in the closed position to 21.5 feet at mean high water. The existing drawbridge operating regulations are listed at 33 CFR 117.799(e).

The bridge generally opens four times per week allowing for routine passage of towing vessels with tank barges or dry cargo barges. The bulk of other vessel traffic is predominately recreational not requiring an opening in order to proceed through the draw.

The temporary deviation will allow the Atlantic Beach Bridge to open only one of the two bascule spans for bridge openings from 12:01 a.m. on April 17, 2017 to 11:59 p.m. on October 13, 2017.

Between April 17, 2017 and May 14, 2017 dual lift span operations will be permitted for commercial vessels and tug/barge units provided a 48 hour advance notice and 24 hour advance confirmation has been provided from 7 a.m. Monday through 6 p.m. Friday. Between April 17, 2017 and May 14, 2017, from 6 p.m. Friday through 7 a.m. Monday, dual bascule lift span operations will be offered for vessels requiring an opening every hour on the hour.

Between May 15, 2017 and October 13, 2017 single leaf bascule openings will be offered upon signal except that the draw need only be opened on the hour and half-hour between 4 p.m. and 7 p.m. Monday through Friday. Dual lift span operations will be permitted for commercial vessels and tug/barge units provided a 48 hour advance notice and 24 hour advance confirmation has been provided. Dual lift span operation will occur every hour on the hour and half-hour as needed on weekends from May 15, 2017 through October 13, 2017 from 7 p.m. Friday to 7 a.m. Monday in addition to Memorial Day, Independence Day (4th of July), and Labor Day.

Vessels that can pass under the bridge without an opening may do so at all times. The bridge will be able to open for emergencies and there is an alternate route for vessels unable to pass through the bridge when in the closed position.

The Coast Guard will also inform the users of the waterways through our Local and Broadcast Notices to Mariners of the change in operating schedule for the bridge so that vessel operators can arrange their transits to minimize any impact caused by this temporary deviation.

In accordance with 33 CFR 117.35(e), the drawbridge must return to its regular operating schedule immediately at the end of the effective period of this temporary deviation. This deviation from the operating regulations is authorized under 33 CFR 117.35.

Dated: March 31, 2017.

C.J. Bisignano,

*Supervisory Bridge Management Specialist,
First Coast Guard District.*

[FR Doc. 2017-06817 Filed 4-5-17; 8:45 am]

BILLING CODE 9110-04-P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 63

[EPA-HQ-OAR-2009-0234; FRL-9958-30-OAR]

RIN 2060-AS75

Mercury and Air Toxics Standards (MATS) Electronic Reporting Requirements

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: The Environmental Protection Agency (EPA) is amending the electronic reporting requirements for the National Emission Standards for Hazardous Air Pollutants: Coal- and Oil-Fired Electric Utility Steam Generating Units (also known as the Mercury and Air Toxics Standards (MATS)) to allow for the temporary submission, through June 30, 2018, of certain reports using the portable document file (PDF) format and to correct inadvertent errors. With this action owners or operators of Electric Utility Steam Generating Units (EGUs) will be able to continue to use temporarily a single electronic reporting system for MATS data submissions, to rely on correct language for mercury (Hg) relative accuracy test audit (RATA) requirements, and to rely on the correct acceptance criterion for ongoing quality assurance test requirements for Hg RATAs. This extension will allow the EPA the necessary time to develop, implement, and test the code necessary so that all MATS reports required to be submitted electronically can be submitted using the Emissions Collection and Monitoring Plan System (ECMPS) Client Tool.

DATES: This final rule is effective on April 6, 2017.

ADDRESSES: The EPA has established a docket for this action under Docket ID No. EPA-HQ-OAR-2009-0234. All documents in the docket are listed on

the <http://www.regulations.gov> Web site. Although listed in the index, some information is not publicly available, e.g., confidential business information or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are available electronically through <http://www.regulations.gov>.

FOR FURTHER INFORMATION CONTACT: Mr. Barrett Parker, Sector Policies and Programs Division, Office of Air Quality Planning and Standards (D243-05), Environmental Protection Agency, Research Triangle Park, NC 27711; telephone number: (919) 541-5635; email address: parker.barrett@epa.gov.

SUPPLEMENTARY INFORMATION: Organization of the document.

The information in this preamble is organized as follows:

- I. Why is the EPA issuing this final rule?
- II. General Information
 - A. Does this final rule apply to me?
 - B. What is the scope of these amendments?
 - C. What is the purpose of these amendments?
 - D. What action is the agency taking?
 - E. What are the incremental costs and benefits of this action?
 - F. Judicial Review and Administrative Reconsideration
 - G. What is the effective date of this rule?
- III. Statutory and Executive Orders Reviews
 - A. Executive Order 12866: Regulatory Planning and Review and Executive Order 13563: Improving Regulation and Regulatory Review
 - B. Paperwork Reduction Act (PRA)
 - C. Regulatory Flexibility Act (RFA)
 - D. Unfunded Mandates Reform Act (UMRA)
 - E. Executive Order 13132: Federalism
 - F. Executive Order 13175: Consultation and Coordination with Indian Tribal Governments
 - G. Executive Order 13045: Protection of Children from Environmental Health Risks and Safety Risks
 - H. Executive Order 13211: Actions Concerning Regulations That Significantly Affect Energy Supply, Distribution, or Use
 - I. National Technology Transfer and Advancement Act
 - J. Executive Order 12898: Federal Actions To Address Environmental Justice in Minority Populations and Low-Income Populations
 - K. Congressional Review Act (CRA)

I. Why is the EPA issuing this final rule?

As explained in the MATS Completion of Electronic Reporting Requirements proposal (see 81 FR 67062, September 29, 2016), the EPA proposed to amend the MATS electronic

reporting requirements by revising and streamlining the electronic data reporting requirements for owners and operators of EGUs that use performance stack testing or continuous monitoring to demonstrate compliance. Such an approach, based on the ECMPS Client Tool only, was requested by industry stakeholders and would increase data transparency by providing the public and regulatory authorities with enhanced access to MATS data. In addition to proposing a single electronic reporting submission system, the proposal identified associated regulatory text changes, proposed to correct inadvertent errors in appendix A of 40 CFR part 63, subpart UUUUU carried over from the final Technical Corrections rule (see 81 FR 20712, April 6, 2016), proposed to revise appendix B to facilitate use of hydrogen chloride continuous emission monitoring systems (CEMS) operating in accordance with newly-promulgated Performance Specification 18, proposed to add appendices C and D to identify reporting requirements for users of particulate matter (PM) CEMS and PM continuous parameter monitoring systems (CPMS), identified in appendix E the electronic data elements already required to be reported, and proposed to require quarterly—rather than semiannual—compliance reports. Based

on requests for additional time to prepare comments, the proposal's comment period was extended for an additional 15 days (see 81 FR 75365, October 31, 2016).

Commenters generally supported the proposal. They also provided many ideas regarding merging the electronic submission systems. Many commenters suggested extending the interim regulatory deadline (April 16, 2017) that allows submission of non-ECMPS ready reports in PDF format. We originally established this deadline to allow temporary submission in PDF format while we make and implement the changes to the ECMPS Client Tool necessary for a single electronic reporting system. After considering the comments received and factoring in the time necessary to provide complete responses to all significant comments, we have decided to take final action on just a portion of the proposal. Specifically, we have decided to extend the interim submission regulatory deadline and make two corrections to appendix A. We may take final action on the other proposed changes in a separate rulemaking, which would be conducted later.

No comments were received in opposition to extending the interim submission regulatory deadline from April 16, 2017, to December 31, 2017.

However, a few commenters suggested replacing a date certain deadline with a fixed time period after promulgation, in order to provide a smooth transition to the single electronic reporting system. We may choose to adapt such an approach at a future date, but for now, we believe a deadline of June 30, 2018, will provide certainty to industry stakeholders, third party programmers, regulatory authorities, the public, and the EPA. We believe that date will give us adequate time to complete our review, respond to comments, and promulgate a separate final rule addressing the remaining issues in the September 29, 2016 proposal. In addition, we believe other important items, such as guidance and programming, will be well on their way to completion by that date. Moreover, that date coincides with the end of a reporting period.

No comments were received in opposition to making the two corrections to appendix A. As many owners and operators of EGUs currently rely on Hg CEMS for compliance purposes, we believe it important to make these corrections at this time.

II. General Information

A. Does this final rule apply to me?

Categories and entities potentially affected by this action include:

Category	NAICS code ¹	Examples of potentially regulated entities
Industry	221112	Fossil fuel-fired electric utility steam generating units.
Federal government	² 221122	Fossil fuel-fired electric utility steam generating units owned by the Federal government.
State/local/Tribal government	² 221122	Fossil fuel-fired electric utility steam generating units owned by municipalities.
	921150	Fossil fuel-fired electric utility steam generating units in Indian country.

¹ North American Industry Classification System.

² Federal, State, or local government-owned and operated establishments are classified according to the activity in which they are engaged.

This table is not intended to be exhaustive, but rather provides a guide for readers regarding entities likely to be regulated by this action. This table lists the types of entities that the EPA is now aware could potentially be regulated by this action. Other types of entities not listed in the table could also be regulated. To determine whether an entity is regulated by this action, please examine the applicability criteria found in 40 CFR 63.9981 of the rule. For questions regarding the applicability of this action to a particular entity, consult either the air permitting authority for the entity or your EPA Regional representative as listed in 40 CFR 63.13.

B. What is the scope of these amendments?

This rule extends the interim PDF reporting process described in 40 CFR

63.10031(f) from April 16, 2017, to June 30, 2018. In addition, this rule amends the text in 40 CFR 63.10021(e)(9) and in 40 CFR 63.10031(f) related to this extension. Finally, this action clarifies instructions in section 4.1.1.5.2 of appendix A with regard to calculating Hg RATA results and conditions described in Table A–2 of appendix A for demonstrating compliance with ongoing Hg measurement instrument quality assurance requirements.

C. What is the purpose of these amendments?

As mentioned earlier, the purpose of these amendments is to extend through June 30, 2018, the temporary submission of certain reports using the PDF format and to correct inadvertent errors in appendix A. Without this action, owners or operators of EGUs

would have to use separate electronic reporting systems for MATS submissions, rely on incorrect language for Hg RATA requirements, or rely on an unclear acceptance criterion for ongoing quality assurance test requirements for Hg RATAs. This extension is intended to allow us the necessary time to develop, implement, and test the code necessary so that all MATS electronic reports can be submitted using the ECMPS Client Tool. The corrections to appendix A are intended to ensure that owners and operators of EGUs have clear and correct instructions with regard to calculating Hg RATA results and demonstrating compliance with ongoing Hg measurement instrument quality assurance requirements.

D. What action is the agency taking?

This action amends parts of 40 CFR part 63, subpart UUUUU. The amendments are discussed in the paragraphs below.

1. Revisions to Tune-Up Reporting Requirements in 40 CFR 63.10021

The tune-up reporting section of MATS, *i.e.*, 40 CFR 63.10021(e)(9), is amended to extend through June 30, 2018, the temporary submission of certain tune-up reports using the PDF format. Starting on and after July 1, 2018, the tune-up reports must be submitted as described in 40 CFR 63.10031(f).

2. Revisions to Reporting Requirements in 40 CFR 63.10031

The deadline for temporary submission of certain reports in PDF format using the ECMPs Client Tool, as described in 40 CFR 63.10031(f)(6), is amended to extend through June 30, 2018. On and after July 1, 2018, the performance test reports, CEMS performance evaluation test reports, quarterly reports for PM or hazardous air pollutant metals CEMS or PM CPMS, compliance reports, and notification of compliance status reports, as described in 40 CFR 63.10031(f), (f)(1), (f)(2), and (f)(4), must be submitted to the EPA's Compliance and Emissions Data Reporting Interface that is accessed through EPA's Central Data Exchange (www.epa.gov/cdx).

3. Revisions to Appendix A

This rule makes two corrections to the Hg monitoring provisions of appendix A.

First, in the MATS Technical Corrections rule package, which was published on April 6, 2016 (see 81 FR 20172, April 6, 2016), there is language in section 4.1.1.5.2 of appendix A describing an alternate way to calculate and interpret RATA results when Hg emissions are less than 50 percent of the standard. This language was inadvertently carried over from the MATS Technical Corrections proposed rule and conflicts with the alternate relative accuracy (RA) specification in Table A-1 of the final rule. That language is deleted.

Second, the MATS Technical Corrections final rule contains an inconsistency of the Hg RATA acceptance criteria in Table A-2 versus that in Table A-1. This final rule amends Table A-2 to make it consistent with Table A-1 so that the 20-percent RA specification in Table A-1 may be applied at any reference method concentration level and the alternate specification applies only when the

average reference method value (RM_{avg}) is < 2.5 micrograms per standard cubic meter ($\mu\text{g}/\text{scm}$).

E. What are the incremental costs and benefits of this action?

This action extends the deadline for temporary submission of certain reports using the PDF format and corrects inadvertent errors in appendix A. It does not promulgate substantive changes to the February 2012 final MATS rule (77 FR 9304). Therefore, there are no incremental costs and benefits associated with this final action. The costs and benefits associated with MATS are discussed in detail in the February 16, 2012, final MATS rule.

F. Judicial Review and Administrative Reconsideration

Under CAA section 307(b)(1), judicial review of this final action is available only by filing a petition for review in the United States Court of Appeals for the District of Columbia Circuit by June 5, 2017. Under CAA section 307(b)(2), the requirements established by these final rules may not be challenged separately in any civil or criminal proceedings brought by the EPA to enforce the requirements.

Section 307(d)(7)(B) of the CAA further provides that “[o]nly an objection to a rule or procedure which was raised with reasonable specificity during the period for public comment (including any public hearing) may be raised during judicial review.” This section also provides a mechanism for the EPA to reconsider the rule “[i]f the person raising an objection can demonstrate to the Administrator that it was impracticable to raise such objection within [the period for public comment] or if the grounds for such objection arose after the period for public comment (but within the time specified for judicial review) and if such objection is of central relevance to the outcome of the rule.” Any person seeking to make such a demonstration should submit a Petition for Reconsideration to the Office of the Administrator, U.S. EPA, Room 3000, EPA WJC South Building, 1200 Pennsylvania Ave. NW., Washington, DC 20460, with a copy to both the person(s) listed in the preceding **FOR FURTHER INFORMATION CONTACT** section, and the Associate General Counsel for the Air and Radiation Law Office, Office of General Counsel (Mail Code 2344A), U.S. EPA, 1200 Pennsylvania Ave., NW., Washington, DC 20460.

G. What is the effective date of this rule?

We are making these amendments effective upon publication of this action.

This timeframe for the effective date is appropriate because the EPA is issuing this final rule under section 307(d) of the CAA. Section 553(d) of the Administrative Procedure Act (APA), 5 U.S.C. Chapter 5, generally provides that rules may not take effect earlier than 30 days after they are published in the **Federal Register**. CAA section 307(d)(1) clarifies that: “The provisions of section 553 through 557 * * * of Title 5 shall not, except as expressly provided in this section, apply to actions to which this subsection applies.” Thus, section 553(d) of the APA does not apply to this rule. Rather the effective date of this rule is governed by CAA Section 112(d)(10), which provides that “Emission standards or other regulations promulgated under this subsection shall be effective upon promulgation.” Accordingly, we are making this rule effective upon publication in the **Federal Register**. Additionally, making this rule effective upon publication in the **Federal Register** will allow the CFR to be updated more quickly, which will provide greater notice of these amendments to EGU owners or operators affected by this final action.

III. Statutory and Executive Orders Reviews

Additional information about these statutes and Executive Orders can be found at <http://www.epa.gov/laws-regulations/laws-and-executive-orders>.

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 and was, therefore, not submitted to Office of Management and Budget (OMB) for review.

B. Paperwork Reduction Act (PRA)

This action does not impose any new information collection burden under the PRA. OMB has previously approved the information collection activities contained in the existing regulations and has assigned OMB control number 2060-0567. The agency believes this action does not impose an information collection burden because it does not change the information collection requirements.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. In making this determination, the impact of concern is any significant adverse economic impact on small entities. An agency may

certify that a rule will not have a significant economic impact on a substantial number of small entities if the rule relieves regulatory burden, has no net burden or otherwise has a positive economic effect on the small entities subject to the rule. These amendments create no new requirements or burdens, and no costs to small entities would be associated with these amendments. We have therefore concluded that this action will have no net regulatory burden for all directly regulated small entities.

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. The action imposes no enforceable duty on any state, local, or tribal governments or the private sector.

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. The final amendments would impose no requirements on tribal governments. Thus, Executive Order 13175 does not apply to this action.

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

The EPA interprets Executive Order 13045 as applying only to those regulatory actions that concern environmental health or safety risks that the 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 rulemaking does not involve technical standards.

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

The EPA believes that this action does not have disproportionately high and adverse human health or environmental effects on minority, low-income, and/or indigenous peoples, as specified in Executive Order 12898 (59 FR 7629, February 16, 1994). This action does not affect the level of protection provided to human health or the environment. The final amendments are either alternate, temporary reporting instructions or corrections which will neither increase nor decrease environmental protection.

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each House of the Congress and to the Comptroller General of the United States. This action is not a “major rule” as defined by 5 U.S.C. 804(2).

List of Subjects in 40 CFR Part 63

Environmental protection, Administrative practice and procedure, Air pollution control, Hazardous substances, Intergovernmental relations, Reporting and recordkeeping requirements.

Dated: March 29, 2017.

E. Scott Pruitt,
Administrator.

For the reasons set forth in the preamble, EPA amends 40 CFR part 63 as follows:

PART 63—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR SOURCE CATEGORIES

■ 1. The authority citation for part 63 continues to read as follows:

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

Subpart UUUUU—National Emission Standards for Hazardous Air Pollutants: Coal- and Oil-Fired Electric Utility Steam Generating Units

■ 2. Section 63.10021 is amended by revising the first and second sentences of paragraph (e)(9) to read as follows:

§ 63.10021 How do I demonstrate continuous compliance with the emission limitations, operating limits, and work practice standards?

* * * * *

(e) * * *

(9) Report the dates of the initial and subsequent tune-ups in hard copy, as specified in § 63.10031(f)(5), through June 30, 2018. On or after July 1, 2018, report the date of all tune-ups electronically, in accordance with § 63.10031(f). * * *

* * * * *

■ 3. Section 63.10031 is amended by revising the first sentence of paragraphs (f) introductory text, (f)(1), (2), and (4), and (f)(6) introductory text.

The revised text reads as follows:

§ 63.10031 What reports must I submit and when?

* * * * *

(f) On or after July 1, 2018, within 60 days after the date of completing each performance test, you must submit the performance test reports required by this subpart to the EPA’s WebFIRE database by using the Compliance and Emissions Data Reporting Interface (CEDRI) that is accessed through the EPA’s Central Data Exchange (CDX) (www.epa.gov/cdx). * * *

(1) On or after July 1, 2018, within 60 days after the date of completing each CEMS (SO₂, PM, HCl, HF, and Hg) performance evaluation test, as defined in § 63.2 and required by this subpart, you must submit the relative accuracy test audit (RATA) data (or, for PM CEMS, RCA and RRA data) required by this subpart to EPA’s WebFIRE database by using CEDRI that is accessed through EPA’s CDX (www.epa.gov/cdx). * * *

(2) On or after July 1, 2018, for a PM CEMS, PM CPMS, or approved alternative monitoring using a HAP metals CEMS, within 60 days after the reporting periods ending on March 31st, June 30th, September 30th, and December 31st, you must submit quarterly reports to the EPA’s WebFIRE database by using the CEDRI that is accessed through the EPA’s CDX (www.epa.gov/cdx). * * *

* * * * *

(4) On or after July 1, 2018, submit the compliance reports required under paragraphs (c) and (d) of this section and the notification of compliance status required under § 63.10030(e) to the EPA’s WebFIRE database by using the CEDRI that is accessed through the EPA’s CDX (www.epa.gov/cdx). * * *

* * * * *

(6) Prior to July 1, 2018, all reports subject to electronic submittal in paragraphs (f) introductory text, (f)(1),

(2), and (4) shall be submitted to the EPA at the frequency specified in those paragraphs in electronic portable document format (PDF) using the ECMP Client Tool. * * *

* * * * *

■ 4. Appendix A to Subpart UUUUU is amended by:

■ a. Revising section 4.1.1.5.2; and

■ b. Revising the entry "RATA" in Table A-2.

The revised text reads as follows:

Appendix A to Subpart UUUUU of Part 63—Hg Monitoring Provisions

* * * * *

4. Certification and Recertification Requirements

* * * * *

4.1.1.5.2 Calculation of RATA Results.

Calculate the relative accuracy (RA) of the monitoring system, on a µg/scm basis, as described in section 12 of Performance Specification (PS) 2 in appendix B to part 60 of this chapter (see Equations 2—3 through

2-6 of PS 2). For purposes of calculating the relative accuracy, ensure that the reference method and monitoring system data are on a consistent basis, either wet or dry. The CEMS must either meet the main performance specification or the alternative specification in Table A-1 of this appendix.

* * * * *

5. Ongoing Quality Assurance (QA) and Data Validation

* * * * *

TABLE A-2—ON-GOING QA TEST REQUIREMENTS FOR HG CEMS

Perform this type of QA test	At this frequency	With these qualifications and exceptions	Acceptance criteria
RATA	Annual ⁴	<ul style="list-style-type: none"> • Test deadline may be extended for "non-QA operating quarters," up to a maximum of 8 quarters from the quarter of the previous test. • 720 operating hour grace period available 	≤20.0% RA or $|RM_{avg} - C_{avg}| + |CC| \leq 0.5 \mu\text{g}/\text{scm}$, if $RM_{avg} < 2.5 \mu\text{g}/\text{scm}$.

* * * * *

⁴"Annual" means once every four QA operating quarters.

* * * * *

* * * * *

[FR Doc. 2017-06884 Filed 4-5-17; 8:45 am]

BILLING CODE 6560-50-P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 81

[EPA-R05-OAR-2016-0277; FRL-9960-91-Region 5]

Reclassification of the Sheboygan, Wisconsin Area To Moderate Nonattainment for the 2008 Ozone National Ambient Air Quality Standards; Correction

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule; correction.

SUMMARY: The Environmental Protection Agency (EPA) published a final rule in the *Federal Register* on December 19, 2016, revising its regulations entitled "Designation of Areas for Air Quality Planning Purposes" for the 2008 ozone National Ambient Air Quality Standards (NAAQS). An error in the table for the Wisconsin 2008 8-Hour Ozone NAAQS

is identified and corrected in this action.

DATES: This final rule is effective on April 6, 2017.

FOR FURTHER INFORMATION CONTACT: Kathleen D'Agostino, Environmental Scientist, Attainment Planning and Maintenance Section, Air Programs Branch (AR-18), Environmental Protection Agency, Region 5, 77 West Jackson Boulevard, Chicago, Illinois 60604, (312) 886-1767, dagostino.kathleen@epa.gov.

SUPPLEMENTARY INFORMATION: EPA published a final rule document on December 19, 2016, (81 FR 91841) updating 40 CFR part 81, "Designation of Areas for Air Quality Planning Purposes" for the 2008 8-Hour Ozone NAAQS. This final rule included a revision to 40 CFR 81.350 reclassifying the Sheboygan, Wisconsin area (Sheboygan County) as "moderate" nonattainment for the 2008 ozone NAAQS. The entry for the Sheboygan County designated area in the Wisconsin-2008 8-Hour Ozone NAAQS (Primary and secondary) table erroneously indicated that the effective date of the classification is January 18, 2017 when, in fact, the effective date should have been December 19, 2016.

81 FR 91846. Therefore, the entry for the Sheboygan County area is being corrected to reflect the correct classification date.

List of Subjects in 40 CFR Part 81

Environmental protection, Air pollution control, National parks, Wilderness areas.

Dated: March 21, 2017.

Robert A. Kaplan,
Acting Regional Administrator, Region 5.

40 CFR part 81 is amended by the following correcting amendment:

PART 81—DESIGNATION OF AREAS FOR AIR QUALITY PLANNING PURPOSES

■ 1. The authority citation for part 81 continues to read as follows:

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

■ 2. In § 81.350, the table entitled "Wisconsin-2008 8-Hour Ozone NAAQS (Primary and secondary)" is amended by revising the entry for "Sheboygan County, WI:" to read as follows:

§ 81.350 Wisconsin.

* * * * *

- (iii) Shelf life.
- (iv) Compatibility information for use in the magnetic resonance environment.
- (v) Stent foreshortening information supported by dimensional testing.

Dated: July 6, 2016.

Leslie Kux,

Associate Commissioner for Policy.

[FR Doc. 2016-16530 Filed 7-12-16; 8:45 am]

BILLING CODE 4164-01-P

DEPARTMENT OF HOMELAND SECURITY

Coast Guard

33 CFR Part 117

[Docket No. USCG-2016-0643]

Drawbridge Operation Regulation; Willamette River at Portland, OR

AGENCY: Coast Guard, DHS.

ACTION: Notice of deviation from drawbridge regulation.

SUMMARY: The Coast Guard has issued a temporary deviation from the operating schedule that governs four Multnomah County bridges: The Broadway Bridge, mile 11.7; Burnside Bridge, mile 12.4; Morrison Bridge, mile 12.8; and Hawthorne Bridge, mile 13.1; all crossing the Willamette River at Portland, OR. This deviation is necessary to accommodate the annual Portland Providence Bridge Pedal event. The deviation allows the bridges to remain in the closed-to-navigation position to allow safe roadway movement of event participants.

DATES: This deviation is effective from 6 a.m. to 12:30 p.m. on August 14, 2016.

ADDRESSES: The docket for this deviation, [USCG-2016-00643] is available at <http://www.regulations.gov>. Type the docket number in the "SEARCH" box and click "SEARCH." Click on Open Docket Folder on the line associated with this deviation.

FOR FURTHER INFORMATION CONTACT: If you have questions on this temporary deviation, call or email Mr. Steven Fischer, Bridge Administrator, Thirteenth Coast Guard District; telephone 206-220-7282, email d13-pf-d13bridges@uscg.mil.

SUPPLEMENTARY INFORMATION:

Multnomah County has requested a temporary deviation from the operating schedule for the Broadway Bridge, mile 11.7; Burnside Bridge, mile 12.4; Morrison Bridge, mile 12.8; and Hawthorne Bridge, mile 13.1; all crossing the Willamette River at Portland, OR. The requested deviation is

to accommodate the annual Portland Providence Bridge Pedal event. To facilitate this event, the draws of these bridges will be maintained as follows: The Broadway Bridge provides a vertical clearance of 90 feet in the closed-to-navigation position; Burnside Bridge provides a vertical clearance of 64 feet in the closed-to-navigation position; Morrison Bridge provides a vertical clearance of 69 feet in the closed-to-navigation position; and Hawthorne Bridge provides a vertical clearance of 49 feet in the closed-to-navigation position; all clearances are referenced to the vertical clearance above Columbia River Datum 0.0. The normal operating schedule for all four bridges is in 33 CFR 117.897. This deviation allows the Broadway Bridge, Burnside Bridge, Morrison Bridge, and Hawthorne Bridge to remain in the closed-to-navigation position and need not open for maritime traffic from 6 a.m. to 12:30 p.m. on August 14, 2016. Waterway usage on this part of the Willamette River includes vessels ranging from commercial tug and barge to small pleasure craft.

Vessels able to pass through the bridge in the closed-to-navigation positions may do so at any time. The bridges will be able to open for emergencies, and there is no immediate alternate route for vessels to pass. The Coast Guard will inform the users of the waterway, through our Local and Broadcast Notices to Mariners, of the change in operating schedule for the bridges so that vessels can arrange their transits to minimize any impact caused by the temporary deviation.

In accordance with 33 CFR 117.35(e), the drawbridges must return to their regular operating schedules immediately at the end of the effective period of this temporary deviation. This deviation from the operating regulations is authorized under 33 CFR 117.35.

Dated: July 6, 2016.

Steven M. Fischer,

Bridge Administrator, Thirteenth Coast Guard District.

[FR Doc. 2016-16471 Filed 7-12-16; 8:45 am]

BILLING CODE 9110-04-P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Parts 60 and 63

[EPA-HQ-OAR-2010-0682; FRL-9948-92-OAR]

RIN 2016-AS83

National Emission Standards for Hazardous Air Pollutant Emissions: Petroleum Refinery Sector Amendments

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: This action amends the National Emissions Standards for Hazardous Air Pollutants (NESHAP) for Petroleum Refineries in three respects. First, this action adjusts the compliance date for regulatory requirements that apply at maintenance vents during periods of startup, shutdown, maintenance or inspection for sources constructed or reconstructed on or before June 30, 2014. Second, this action amends the compliance dates for the regulatory requirements that apply during startup, shutdown, or hot standby for fluid catalytic cracking units (FCCU) and startup and shutdown for sulfur recovery units (SRU) constructed or reconstructed on or before June 30, 2014. Finally, this action finalizes technical corrections and clarifications to the NESHAP and the New Source Performance Standards (NSPS) for Petroleum Refineries. These amendments are being finalized in response to new information submitted after these regulatory requirements were promulgated as part of the residual risk and technology review (RTR) rulemaking, which was published on December 1, 2015. This action will have an insignificant effect on emissions reductions and costs.

DATES: This final rule is effective on July 13, 2016.

ADDRESSES: The Environmental Protection Agency (EPA) has established a docket for this action under Docket ID No. EPA-HQ-OAR-2010-0682. All documents in the docket are listed on the <http://www.regulations.gov> Web site. Although listed in the index, some information is not publicly available, e.g., confidential business information (CBI) or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are

available electronically through <http://www.regulations.gov>.

FOR FURTHER INFORMATION CONTACT: Ms. Brenda Shine, Sector Policies and Programs Division, Refining and Chemicals Group (E143-01), Office of Air Quality Planning and Standards, Environmental Protection Agency, Research Triangle Park, North Carolina 27711; telephone number: (919) 541-3608; email address: shine.brenda@epa.gov.

SUPPLEMENTARY INFORMATION:

Preamble Acronyms and Abbreviations. We use multiple acronyms and terms in this preamble. While this list may not be exhaustive, to ease the reading of this preamble and for reference purposes, the EPA defines the following terms and acronyms here:

CAA Clean Air Act
 CBI confidential business information
 CFR Code of Federal Regulations
 COMS continuous opacity monitoring system
 CPMS continuous parameter monitoring system
 EPA Environmental Protection Agency
 ESP electrostatic precipitator
 FCCU fluid catalytic cracking unit
 HAP hazardous air pollutants
 LEL lower explosive limit
 NESHAP national emissions standards for hazardous air pollutants
 NSPS new source performance standards
 NTTAA National Technology Transfer and Advancement Act
 OAQPS Office of Air Quality Planning and Standards
 OMB Office of Management and Budget
 OSHA Occupational Safety and Health Administration
 PRA Paperwork Reduction Act
 PSM Process Safety Management
 QA quality assurance
 RFA Regulatory Flexibility Act
 RMP Risk Management Plan
 RSR Refinery Sector Rule
 RTR residual risk and technology review
 SRU sulfur recovery unit
 TTN Technology Transfer Network
 UMRA Unfunded Mandates Reform Act

Organization of This Document. The information in this preamble is organized as follows:

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- K. Congressional Review Act (CRA)

I. General Information

A. Does this action apply to me?

Regulated Entities. Categories and entities potentially regulated by this action are shown in Table 1 of this preamble.

TABLE 1—INDUSTRIAL SOURCE CATEGORIES AFFECTED BY THIS FINAL ACTION

NESHAP and source category	NAICS ^a Code
Petroleum Refining Industry	324110

^aNorth American Industry Classification System.

Table 1 of this preamble is not intended to be exhaustive, but rather to provide a guide for readers regarding entities likely to be affected by the final action for the source categories listed. To determine whether your facility is affected, you should examine the applicability criteria in the appropriate NESHAP or NSPS. If you have any questions regarding the applicability of any aspect of these NESHAP or NSPS, please contact the appropriate person listed in the preceding **FOR FURTHER INFORMATION CONTACT** section of this preamble.

B. Where can I get a copy of this document and other related information?

In addition to being available in the docket, an electronic copy of this final action will also be available on the Internet through the Technology Transfer Network (TTN) Web site, a forum for information and technology exchange in various areas of air pollution control. Following signature

by the EPA Administrator, the EPA will post a copy of this final action at <http://www.epa.gov/ttn/atw/petref.html>.

Following publication in the **Federal Register**, the EPA will post the **Federal Register** version and key technical documents at this same Web site.

C. Judicial Review and Administrative Reconsideration

Under Clean Air Act (CAA) section 307(b)(1), judicial review of this final action is available only by filing a petition for review in the United States Court of Appeals for the District of Columbia Circuit by September 12, 2016. Under CAA section 307(b)(2), the requirements established by this final rule may not be challenged separately in any civil or criminal proceedings brought by the EPA to enforce the requirements.

Section 307(d)(7)(B) of the CAA further provides that “[o]nly an objection to a rule or procedure which was raised with reasonable specificity during the period for public comment (including any public hearing) may be raised during judicial review.” This section also provides a mechanism for the EPA to reconsider the rule “[i]f the person raising an objection can demonstrate to the Administrator that it was impracticable to raise such objection within [the period for public comment] or if the grounds for such objection arose after the period for public comment (but within the time specified for judicial review) and if such objection is of central relevance to the outcome of the rule.” Any person seeking to make such a demonstration should submit a Petition for Reconsideration to the Office of the Administrator, U.S. EPA, Room 3000, EPA WJC North Building, 1200 Pennsylvania Ave. NW., Washington, DC 20460, with a copy to the person listed in the preceding **FOR FURTHER INFORMATION CONTACT** section, and the Associate General Counsel for the Air and Radiation Law Office, Office of General Counsel (Mail Code 2344A), U.S. EPA, 1200 Pennsylvania Ave. NW., Washington, DC 20460.

II. Background Information

The EPA promulgated NESHAP pursuant to the CAA sections 112(d)(2) and (3) for petroleum refineries located at major sources in three separate rules. These standards are also referred to as maximum achievable control technology (MACT) standards. The first rule was promulgated on August 18, 1995, in 40 CFR part 63, subpart CC (also referred to as Refinery MACT 1) and regulates miscellaneous process vents, storage vessels, wastewater,

equipment leaks, gasoline loading racks, marine tank vessel loading, and heat exchange systems. The second rule was promulgated on April 11, 2002, in 40 CFR part 63, subpart UUU (also referred to as Refinery MACT 2) and regulates process vents on catalytic cracking units (CCU, including FCCU), catalytic reforming units, and SRU. Finally, on October 28, 2009, the EPA promulgated amendments to Refinery MACT 1 to include MACT standards for heat exchange systems, which were not originally addressed in Refinery MACT 1. This same rulemaking included updating cross-references to the General Provisions in 40 CFR part 63.

The EPA completed an RTR of Refinery MACT 1 and 2, publishing proposed amendments on June 30, 2014. These proposed amendments also included technical corrections and clarifications raised in a 2008 industry petition for reconsideration of NSPS for Petroleum Refineries (40 CFR part 60, subpart Ja). After seeking, receiving and addressing public comments, the EPA published final amendments on December 1, 2015.

The December 1, 2015, final amendments included requirements in Refinery MACT 1 for process vents designated as “maintenance vents.” Maintenance vents are those whose use is needed only during startup, shutdown, maintenance or inspection of equipment where the equipment is emptied, depressurized, degassed or placed into service. The December 1, 2015, final amendments require that the hydrocarbon content of the vapor in the equipment served by the maintenance vent to be less than or equal to 10 percent of the lower explosive limit (LEL) prior to venting to the atmosphere. The December 1, 2015, final rule also provides specific allowances for situations when the 10 percent LEL cannot be demonstrated or is technically infeasible. After promulgation of the rule, we learned that there was confusion regarding the interpretation of the dates provided in Table 11 of 40 CFR part 63, subpart CC. We intended the compliance date for maintenance vents located at sources constructed on or before June 30, 2014, to be the next qualifying maintenance activity occurring after February 1, 2016 (the effective date of the December 1, 2015, final amendments).

Additionally, the December 1, 2015, final amendments included alternative standards for startup and shutdown events for FCCU and SRU in Refinery MACT 2. For FCCU, the final amendments included two options for demonstrating compliance with the particulate matter (PM) limit (as a

surrogate for metal hazardous air pollutants [HAP]) during periods of startup, shutdown, or hot standby in § 63.1564(a)(5). These options are: Meeting the emission limit(s) that apply during normal operations or meeting a minimum cyclone face velocity limit. Similarly, two options were provided for demonstrating compliance with the carbon monoxide (CO) limit for FCCU (as a surrogate for organic HAP) during periods of startup and shutdown in § 63.1565(a)(5). These options include: Meeting the emission limit(s) that apply during normal operations or meeting an excess oxygen limit in the exhaust from the catalyst regenerator. For SRU, three compliance options were provided to demonstrate compliance during periods of startup and shutdown in § 63.1568(a)(4). These are: Meeting the emission limit(s) that apply during normal operations, sending purge gases to a flare that meets certain operating requirements, or sending purge gases to a thermal oxidizer or incinerator that meets specific temperature and excess oxygen requirements. For owners or operators electing to comply with the alternative limits for startup, shutdown, or hot standby for FCCU (e.g., minimum cyclone face velocity option for PM; excess oxygen limit for the catalyst regenerator exhaust for CO) or for startup or shutdown for SRU (e.g., sending purge gases to a thermal oxidizer or incinerator meeting temperature and excess oxygen requirements), the compliance date established in the final amendments was February 1, 2016 (the effective date of the December 1, 2015, RTR final amendments).

Since the promulgation of the December 1, 2015, final amendments, the EPA received new information that the compliance dates for the maintenance vents and alternative startup/shutdown standards for FCCU and SRU pose safety concerns. This information indicated that the compliance dates do not allow sufficient time to complete the management of change process including evaluating the change, forming an internal team to accomplish the change, engineering the change which could include developing new set points, installing new controls or alarms, conducting risk assessments, updating associated plans and procedures, providing training, performing pre-startup safety reviews, and implementing the change as required by other regulatory programs. Further, the information indicated that in some cases refinery owners or operators may need to install additional control equipment to meet the new

requirements. On January 19, 2016, the EPA received a petition for reconsideration from the American Petroleum Institute (API) and the American Fuel and Petrochemical Manufacturers (AFPMM) formally requesting that EPA reconsider these issues.

On February 9, 2016, the EPA published proposed revisions to the December 1, 2015, final amendments. Specifically, the proposal included a revision to the compliance date in 40 CFR part 63 subpart CC for the requirements for maintenance vents which apply during periods of startup, shutdown, maintenance or inspection for sources constructed or reconstructed on or before June 30, 2014. The proposal also included a revision to the compliance dates in 40 CFR part 63 subpart UUU for the use of the alternative standards for FCCU and SRU which apply during startup and shutdown and for FCCU during hot standby for sources constructed or reconstructed on or before June 30, 2014. Finally, the proposed rule provided technical corrections and clarifications to the NESHAP and NSPS Ja.

The proposal provided a 45-day comment period ending on March 25, 2016. The EPA received comments on the proposed revisions from refiners, trade associations, a state environmental and health department, environmental groups, and private citizens. This final rule provides a discussion of the final revisions, including changes in response to comments on the February 9, 2016, proposal, as well as a summary of the significant comments received and responses. This action fully responds to the January 19, 2016, petition for reconsideration submitted by API and AFPMM.

III. Final Revisions to Compliance Dates and Technical Corrections in the NSPS and NESHAP for Petroleum Refineries and Revisions on the February 9, 2016, Proposal

In the February 9, 2016 proposal, we proposed to require owners and operators of sources that were constructed or reconstructed on or before June 30, 2014, to comply with the requirements for maintenance vents during startup, shutdown, maintenance and inspection; the requirements for FCCU during startup, shutdown and hot standby; and the requirements for SRU during startup and shutdown no later than 18 months after the effective date of the December 1, 2015, rule (*i.e.*, no later than August 1, 2017). We are finalizing these amendments as proposed.

We also proposed to make clarifying revisions to Table 11 in 40 CFR part 63, subpart CC to more clearly delineate the compliance dates for the various provisions in subpart CC and to reflect the compliance date proposed for the maintenance vent provisions. We are finalizing these amendments as proposed with minor clarifications. Relative to the amendments made to Table 11 in subpart CC, we received a comment that the compliance dates for storage vessels in the proposed revisions to Table 11 do not reflect the use of the overlap provisions in § 63.640(n). The overlap provisions in § 63.640(n) allow Group 1 and 2 storage vessels to comply with other regulations (e.g., 40 CFR part 60, subpart Kb) as a means of demonstrating compliance with the standards in Refinery MACT 1. Compliance with the overlap provisions is in lieu of complying with the storage vessel provisions in Refinery MACT 1. We acknowledge that Table 11 does not directly reference the overlap provisions included in § 63.640(n). We are clarifying in Table 11 that owners or operators of affected storage vessels must transition to comply with the provisions in § 63.660 “. . . or, if applicable, § 63.640(n) . . .” on or before April 29, 2016.

We also proposed a number of technical and clarifying revisions to other portions of the regulations. These amendments are listed below and are being finalized as proposed with minor revision as noted in Items 3 and 9. Finally, we are making two additional revisions, as described following the numbered paragraphs below. One change is to correct an error we identified and the other is in response to a comment we received during the comment period.

1. Revising the first sentence in § 60.102a(f)(1)(i) to incorporate the pollutant of concern, sulfur dioxide (SO₂), directly into the regulatory text rather than inside a parenthesis within the sentence;

2. Making a grammatical correction to the closed blowdown system definition in § 63.641 by adding an “a” before the phrase, “. . . process vessel to a control device or back into the process.”;

3. Replacing the term “relief valve” and “valve” with “pressure relief device” and “device” in the force majeure event definition in §§ 63.641 and 63.670(o)(1)(ii)(B), respectively. We received a comment that the term “valve” should be replaced with the term “device” in § 63.670(o)(1)(vi) for consistency and are finalizing this change;

4. Expanding the list of exceptions for equipment leak requirements in

§ 63.648(a) to ensure that the intent of the rulemaking is clear, that pressure relief devices subject to the requirements in either 40 CFR part 60, subpart VV or part 63, subpart H and the requirements in 40 CFR part 63, subpart CC are to comply with the requirements in § 63.648(j)(1) and (2), instead of the pressure relief device requirements in 40 CFR part 60, subpart VV and 40 CFR part 63, subpart H;

5. Editing the reporting and recordkeeping requirements related to fenceline monitoring contained in § 63.655(h)(8) to provide clarity that compliance reports are due 45 days after the end of each reporting period. The term “periodic” in the context of the report for fenceline monitoring has been removed to avoid confusion concerning the due dates of other periodic reports contained in 40 CFR part 63, subpart CC such as those specified in § 63.655(g);

6. Editing the siting requirements for passive monitors near known sources of volatile organic compounds (VOC) contained in § 63.658(c)(1) to clarify that a monitor should be placed on the shoreline adjacent to the dock for marine vessel loading operations by removing the phrase “that are located offshore”;

7. Revising the catalytic reforming unit (CRU) pressure limit exclusion provision in 40 CFR 63.1566(a)(4) to specify that refiners have 3 years to comply with the requirements to meet emission limitations in Tables 15 and 16 if they actively purge or depressurize at vessel pressures of 5 pounds per square inch gage (psig) or less;

8. Revising the entry for item 1 in Table 2 of 40 CFR part 63, subpart UUU to clarify that refineries have 18 months to comply with the 20-percent opacity operating limit for units subject to Refinery NSPS subpart J or units electing to comply with Refinery NSPS subpart J provisions;

9. Removing the reference to § 60.102a(b)(1) in § 63.1564(a)(1)(iv). Additionally, in response to a comment, we are removing the phrase “of this Chapter” from this same provision for consistency.

10. Making a typographical correction to the reference to § 63.1566(a)(5)(iii) in 40 CFR part 63, subpart UUU, Table 3, Item 12 to correctly reference § 63.1564(a)(5)(ii); and

11. Making an editorial correction to add the word “and” in place of a semicolon in 40 CFR part 63, subpart UUU, Table 5, Item 2.

In reviewing the rule requirements, we noted that the last sentence of the introductory paragraph in § 63.1564(a)(1) refers to “. . . the four options in paragraphs (a)(1)(i) through

(vi) of this section.” There are six options in these paragraphs, and thus we are finalizing an amendment to revise § 63.1564(a)(1) to accurately describe these paragraphs by replacing the word “four” with “six.”

As discussed in more detail in Section IV of this preamble, in response to a comment, we are finalizing an amendment to item (5) in the definition of miscellaneous process vent to clarify that in situ sampling systems will be excluded from the definition until February 1, 2016. After this date, these sampling systems will be considered miscellaneous process vents. Systems which are determined to be Group 1 miscellaneous process vents will need to comply with applicable provisions no later January 30, 2019.

IV. Summary of Comments and Responses

This section summarizes substantive comments received on the February 2016 proposal. We received some comments suggesting rule revisions for requirements in the December 2015 rule for which we did not propose a revision in the February 2016 proposal. These comments were not specifically summarized or addressed because they are beyond the scope of the amendments and we did not open those provisions for public comment. The Agency may elect to consider the issues raised by those comments in the context of a future rulemaking action.

A. Compliance Date Amendments

Comment 1: Two commenters expressed support for the proposal to revise the compliance dates for the maintenance vent provisions during periods of startup, shutdown, maintenance and inspection in 40 CFR part 63, subpart CC, for the alternative standards for startup, shutdown and hot standby for FCCU in 40 CFR part 63, subpart UUU and the alternative standards for startup and shutdown for SRU in subpart UUU. These commenters agreed that additional time is needed to install controls and/or comply with management of change requirements in applicable process safety management (PSM) and risk management program (RMP) requirements. Commenters asserted that refineries need this time to fully perform applicability determinations, complete the procurement process to acquire consultant services to assist with these applicability determinations, modify internal procedures, perform training and implement control/equipment/operational changes as needed.

One commenter further explained that they also interpreted statements in the December 1, 2015, preamble to the final rule (80 FR at 75186) as EPA's intent to provide 18 months for compliance with the provisions in §§ 63.1564 and 63.1565 including the associated monitoring, recordkeeping and reporting requirements. The commenter points out that the regulatory provisions in 63.1564 (a)(2) and in Table 2 of subpart UUU do not reflect this intent and that these provisions should be revised to reflect an August 1, 2017, compliance date. The commenter specifically requested that EPA clarify the regulatory language to provide an August 2017 compliance date for monitoring requirements for FCCU controls, such as bag leak detectors, total power and the secondary current operating limits for electrostatic precipitators (ESP), and daily checks of the air or water pressure to the spray nozzles on jet ejector-type wet scrubbers or other types of wet scrubbers equipped with atomizing spray nozzles.

The commenter further explained that pursuant to § 63.1572(c)(1)–(5), the compliance time for continuous parameter monitoring systems (CPMS) specifications in Table 41, when coupled with the revisions to monitoring requirements contained in § 63.1572(d), is inadequate (the commenter believes these requirements are effective within 60 days of the effective date of the Refinery Sector Rule) given that refineries would have to perform an assessment of each CPMS as well as an assessment of potential equipment and operational changes.

Response 1: We appreciate the support for the proposed revisions. We disagree, however, with the comment indicating a belief that we also intended to provide 18 months for refineries to comply with the FCCU provisions in §§ 63.1564 and 63.1565, including the associated monitoring, recordkeeping and reporting requirements.

Sections 63.1564 and 63.1565 refer to NSPS Ja requirements, which are not new requirements for some sources pursuant to the December 2015 final amendments. In the preamble to the December 2015 final amendments, we stated (80 FR 75186): “As proposed, we are providing 18 months after the effective date of the final rule to conduct required performance tests and comply with any *revised* [emphasis added] operating limits for FCCU.” We did not consider the pre-existing NSPS requirements referred to in §§ 63.1564 and 63.1565 to be “revised operating limits” for sources subject to NSPS Ja. We note that an 18-month compliance period for these NSPS Ja requirements is

not supported because the proposed and final MACT operating limits are identical to the NSPS Ja operating limits which already apply to these affected sources. For refinery sources subject to the December 2015 final amendments and that are non-NSPS Ja sources, Tables 1 through 14 to 40 CFR part 63, subpart UUU clearly provide an 18-month compliance period for refineries to transition from the existing requirements to the revised operating limits.

With regard to the revised FCCU monitoring requirements in § 63.1572(d), as discussed in the Response to Comment document for the December 1, 2015, final rule (Docket Item No. EPA–HQ–OAR–2010–0682–0802), we amended the alternative monitoring approach to require daily inspections of the air or water supply lines with the understanding that no new monitoring equipment is needed to complete these inspections. Therefore, we proposed and then finalized these alternative requirements to apply immediately on the effective date of the rule.

With regard to the compliance time for CPMS, the commenter is mistaken that the regulations provide a 60-day compliance period. Section 63.1572(c)(1) provides an 18-month transition period to the new CPMS quality assurance (QA) requirements in Table 41. When establishing this compliance date, we estimated that the time to perform these evaluations, request vendor quotes, if necessary to upgrade or replace existing monitors, and install the new/upgraded equipment would require about 12 to 18 months. Thus, in the promulgating the final rule, the Agency considered the types of concerns raised by the commenter and provided an 18-month transition period.

We note that pursuant to the provisions in § 63.6(i), which are generally applicable, refinery owners or operators may seek compliance extensions on a case-by-case basis if necessary.

Comment 2: One commenter stated that by extending the compliance dates for the provisions addressed in the proposal, the EPA has extended the amount of time for illegal exemptions for periods of startup, shutdown and malfunction. The commenter also asserted that substituting the general duty requirements as the continuous emissions limit during the period between the promulgation and effective date is not consistent with the CAA as it requires that section 112 standards apply at all times, and general duty

requirements do not meet the requirements of CAA section 112.

The commenter also maintained that the CAA requires that air toxics standards should be effective upon promulgation, and provides that existing sources should comply as expeditiously as practicable. The commenter argued that the EPA has not demonstrated in the record how 18 months is as “expeditiously as practicable,” and therefore the extension of the compliance period is arbitrary and unlawful. The commenter continued that the reasons given for the extension were in part based on a potential need to install controls, but the EPA did not provide an independent analysis demonstrating that there is an actual need for new controls. Further, the commenter asserted that this scenario could be addressed on a case-by-case basis by the provisions in § 63.6(i) rather than as a blanket exemption for all sources. The commenter also stated that the other reason given for the extension, compliance with the RMP and the Occupational Safety and Health Administration's (OSHA) PSM, does not justify an extension for compliance with the air toxics program. The commenter also stated that the timing for removing these SSM exemptions has been delayed for approximately 8 years (since the 2008 *Sierra Club* ruling) due to rulemaking processes and delays, and that further delay is unwarranted.

Finally, the commenter stated that the EPA did not provide emissions data to support their statements in the preamble that the emission impacts from extending the compliance deadlines will have “an insignificant effect on emissions reductions.”

Response 2: We share the commenter's desire to implement the new Refinery Sector Rule provisions as quickly as possible. However, we have determined that it is infeasible to immediately comply with certain provisions of the December 1, 2015, final rule, and it is, therefore, necessary to provide the additional compliance time. Based on the information that we now have, we concluded that facilities require additional time to comply with certain provisions in the final rule in order to allow facilities to install the appropriate monitoring equipment, change procedures, and, if necessary, add or modify emission control equipment.

We disagree with the commenters that we substituted the general duty requirement for the requirements for which we are establishing an 18-month compliance period. Rather, we discussed the general duty provision to

emphasize that although compliance with the relevant amendments would be delayed for a period of time, these sources remain obligated to comply with good air pollution control practices as specified in the general duty requirements. We were not suggesting that the “general duty” requirement is sufficient to meet CAA section 112 for the regulated sources at issue in this rule.

We disagree with the commenter that the compliance period is not supported and is therefore arbitrary. The process equipment associated with maintenance vents, FCCU and SRU, are subject to the requirements of the RMP regulation in 40 CFR part 68 and the OSHA PSM standard in 29 CFR part 1910. Therefore, any operational or procedural changes resulting from meeting the applicable standards must follow the management of change procedures in the respective regulatory programs, as codified in § 68.75 and § 1910.119(l). As part of the management of change process, the EPA expects that facilities will have to perform an upfront assessment to determine what changes are required to meet the maintenance vent requirements and alternative standards for FCCU and SRU during periods of startup and shutdown. Based on the new information we received after these regulatory requirements were promulgated, we anticipate that refinery owners or operators will have to adjust or install new instrumentation including alarms, closed drain headers, equipment blowdown drums, and other new or revised equipment and controls in order to comply with the new startup and shutdown provisions. Where these types of projects are necessary, it is likely facilities will have to hire a contractor to assist with the project and complete the procurement process. Additionally, we expect that facilities will have to perform risk assessments and review and revise standard operating procedures, as necessary. Further, the management of change provisions also require that employees who are involved in operating a process, and maintenance and contract employees whose job tasks are affected by the change, must be trained prior to start up of the affected process. Finally, facilities are required to conduct pre-startup safety reviews and obtain authorization to fully implement and startup the modified process and/or equipment.

We disagree that compliance obligations with EPA’s RMP and OSHA’s PSM cannot be considered in determining the appropriate compliance period to the extent those obligations can be met consistent with the

compliance period mandated by CAA section 112. In the present case, the compliance period of 18 months is well within the maximum 3-year compliance period allowed by CAA section 112(i). When considering an appropriate compliance timeframe, it is important to consider the time it takes to safely transition to new operating procedures. If an explosion or fire occurs due to inadequate planning and evaluation of new procedures, the amount of toxics released to the atmosphere could dwarf the emission reductions anticipated from the new startup and shutdown requirements. Such an event could cause harm to refinery personnel and unnecessarily expose the neighboring community to releases of toxic emissions. Therefore, we believe it is reasonable to consider other applicable regulatory compliance obligations for these programs when establishing compliance dates for CAA section 112 requirements.

While we understand the commenter’s concerns that the regulatory changes did not occur as quickly as they would have hoped, we cannot ignore feasibility and compliance with health and safety requirements, as discussed above, in determining an appropriate compliance timeframe. The “delay” in establishing these requirements does not somehow make it technically feasible to immediately comply with these new standards. Even with the 18-month timeframe being finalized today, sources must still begin the planning and evaluation process immediately to meet the compliance date.

We agree with the commenters that another statutory mechanism for addressing compliance issues such as the ones addressed here would be to rely on facility-specific requests pursuant to § 63.6(i). However, when a significant number of extension requests are anticipated, we consider it reasonable and more efficient to provide the additional compliance time within the rule. Providing the compliance time in the rule reduces both industry and Agency burden associated with developing and evaluating waivers on a case-by-case basis. It also reduces the uncertainty that facilities face when a regulatory compliance date is approaching and a request for an extension has not yet been addressed by the Agency. Moreover, in the current case, the compliance period established in the December 1, 2015 rule was only a few months after the publication of the rule and that time period was generally not sufficient for a case-by-case extension process.

We believe that the later compliance date will have an insignificant effect on a refinery’s overall emissions. The maintenance vent provisions apply only to vent emissions associated with taking equipment out of service for maintenance or repair. While there may be a number of pieces of equipment taken out of service over a given year, many facility owners or operators already have standard procedures for de-inventorying equipment. While these procedures may not specifically meet the final rule requirements (for example, they may depressure to atmosphere once the vessel is below 5 psig, but may not measure the lower explosive limit even though it could be monitored), the general equipment de-inventory procedures will typically limit emissions to the atmosphere. For the startup and shutdown operating limit alternatives for FCCU and SRU, these equipment may be shut down only once every 2 to 5 years. Therefore, we expect very few of these events to occur during the revised compliance period so there are limited opportunities for these emissions and limited opportunities for emissions reductions. We note that when we finalized the FCCU requirements, we did not project any emissions reductions associated with these requirements. This is partly due to the limited frequency of occurrence and partly due to uncertainties in the existing practices used by facilities to reduce these emissions. While we developed these requirements to ensure these sources had emission limitations that applied at all times, the decision was not based on a quantitative estimate of the emission reduction that would be achieved by these requirements. In general, we believe the emissions from these emission points to be relatively small compared to the refinery’s total HAP emissions so that the emissions reduction achieved by the new requirements would be small. Therefore, we expect that the modification to the compliance dates in this final rule will not significantly impact a refinery’s emissions.

Comment 3: One commenter stated that the references in the proposed rule to the procedures for requesting compliance extensions through § 63.6(i) are problematic for state regulators and industry. Facilities that have to install new controls or otherwise invest in capital projects in order to comply with the new maintenance vent requirements or alternative standards for FCCU and SRU may not have ample time to submit such requests. Instead of requiring compliance by August 2017, the commenter suggested that the EPA

finalize a compliance date 6 months after promulgation of the final rule. This would allow sources an opportunity to use the provisions in § 63.6(i) as determined appropriate on a case-by-case basis by the delegated authority. Finally, the commenter suggested that, in the future, the EPA should promulgate standards with compliance dates at least 120 days after promulgation and that the EPA should issue a stay of the requirements if similar situations requiring compliance date extensions should arise.

Response 3: As explained in the previous response, a compliance date of August 1, 2017, is consistent with CAA section 112(i)(3). And, because numerous facilities will likely need additional time beyond the current compliance date, it is reasonable to rely on that provision instead of setting a shorter compliance period and relying on the case-by-case extension provisions of CAA section 112 and § 63.6(i). Furthermore, for the reasons provided in the previous response, we do not believe that a 6-month compliance period as requested by this commenter reflects the actual time it will take for most facilities to comply with these provisions. The request that we provide a minimum of 120 days for compliance in future rulemakings goes beyond the scope of this rulemaking. Compliance periods for future regulations will be addressed in the context of the relevant proposed and final rules.

Comment 4: One commenter requested that an 18-month extension to the compliance date be provided to allow for compliance with the general duty requirements for maintenance vents. The commenter stated that prior to the December 1, 2015 final amendments, designated maintenance vents were not considered “affected facilities,” and, therefore, were not subject to the general duty provisions. The commenter argued that facilities will need to perform applicability determinations for vents on refinery processes, update procedures, perform training, and go through the OSHA management of change process to assess the implications of the general duty clause on applicable vents, and thus sources need time to do so.

Response 4: We did not propose any change to the general duty requirement for “maintenance vents.” Rather, we proposed a revision to the compliance date for startup, shutdown, maintenance and inspection for maintenance vents. Although we noted that the general duty provision applies prior to the proposed revised compliance date, we did not propose to modify the compliance obligation for meeting the general duty

requirement. Therefore, we believe that this comment goes beyond the scope of this rulemaking. However, we note that we consider it standard practice for any operating facility to use good air pollution control practices regardless of the emission source and whether or not that source is specifically regulated by the MACT standard; thus, additional time to meet such a requirement would not be warranted.

Comment 5: One commenter stated that the EPA should extend the compliance dates for the monitoring requirements for bypass lines of miscellaneous process vents in § 63.644(c). The commenter asserted that the February 1, 2016 API/AFPM supplemental petition provides a list of reasons why such an extension is needed and that EPA could rely on the same justification as that for the compliance date extension being granted for the startup, shutdown, maintenance and inspection requirements for maintenance vents in § 63.643(c). The commenter noted that the API/AFPM petition explains that items previously excluded from the monitoring requirements in § 63.644(c), such as high point bleeds, analyzer vents, open-ended valves or lines, and pressure relief valves are no longer excluded under the December 2015 final rule, and, thus, would now be required to install flow indicators or employ car-seal or lock-and-key type valves. The API/AFPM petition also explains that since onstream analyzer vents (in situ sampling systems) are excluded from the definition of miscellaneous process vents through January 30, 2019, but not specifically excluded from the bypass line monitoring provisions, some local agencies may interpret that the bypass line provisions apply to analyzer vents and would require analyzer vents to be in compliance during the additional period between the February 1, 2016, effective date of the rule and January 30, 2019.

Response 5: As part of the December 1, 2015, final rule, the EPA removed provisions from § 63.644(c) that excluded high point bleeds, analyzer vents, open-ended valves or lines, and pressure relief valves from the bypass line provisions in § 63.644(c)(1) and (2). Low leg drains and equipment subject to § 63.648 continue to be excluded from the bypass line provisions in § 63.644(c). Because open-ended valves or lines and pressure relief valves (devices) are equipment subject to § 63.648, they remain subject to the bypass line exclusion. In addition, high point bleeds are open-ended valves or lines and would also be equipment

subject to § 63.648, and thus, subject to the bypass line exclusion.

We removed analyzer vents from the list of items excluded from the bypass line provisions because we consider analyzer vents to be miscellaneous process vents consistent with our amendments to item (5) in the list of exclusions from the definition of miscellaneous process vents in § 63.641. We recognize that based on the wording of item (5), some may interpret that, prior to January 30, 2019, these analyzer vents could be construed to be bypass lines. This is not our intent. We consider analyzer vents to be miscellaneous process vents as they routinely or continuously vent gases to the atmosphere. We included the January 30, 2019, date to establish the date at which these analyzer vents must comply with the miscellaneous process vent standards.

It was not our intent that analyzer vents would be considered bypass lines between the February 1, 2016, effective date of the rule and the January 30, 2019, compliance date provided in item (5) of the list of exclusions from the definition of miscellaneous process vents. While we consider it unlikely that local agencies would interpret the Refinery final amendments to require bypass line monitoring for analyzer vents, we understand the commenter’s concern. To clarify these requirements consistent with our original intent, we are amending item (5) in the definition of miscellaneous process vent to exclude “In situ sampling systems (onstream analyzers)” until February 1, 2016. After this date, these sampling systems will be included in the definition of miscellaneous process vents and sampling systems determined to be Group 1 miscellaneous process vents must comply with the requirements in §§ 63.643 and 63.644 no later than January 30, 2019.

Comment 6: One commenter requested that EPA provide an 18-month compliance period, rather than the 150 days provided, for existing storage tanks to transition from complying with the requirements in § 63.646 to the storage vessel requirements in § 63.660, which were established in the December 2015 final rule. The storage vessel provisions in § 63.660 require that new or existing Group 1 storage vessels comply with the requirements in subpart WW or subpart SS of 40 CFR part 63. The commenter stated that sources will need time to assess whether their existing storage tanks meet the “Group 1 Storage Tank” definition finalized in § 63.641 as part of the RTR rulemaking, and, if so, to assess whether existing controls will need to

be updated to meet the subpart WW requirements contained in § 63.660. Should such control upgrades be required, the commenter asserted that additional time will be needed to design and install the equipment, complete management of change process and provide operator training. The commenter also stated that subpart WW imposes additional inspection and recordkeeping requirements which will require additional time for further operator training. A second commenter provided similar comments, stating that inadequate time had been given to assess applicability and upgrade tank controls (if needed) for existing Group 1 storage vessels. Finally, a comment was received stating that Table 11 appears to require compliance with § 63.660 and is in conflict with the overlap provisions in § 63.640(n). The overlap provisions in § 63.640(n) allow Group 1 and 2 storage vessels to comply with other regulations (e.g., 40 CFR part 60, subpart Kb) as a means of demonstrating compliance with the standards in Refinery MACT 1. Compliance with the overlap provisions is made in lieu of complying with the storage vessel provisions in § 63.660 of Refinery MACT 1.

Response 6: While Table 11 was completely re-printed in the proposed amendments, we did not propose to revise the compliance dates for storage vessels or to address storage vessels in any way as part of the proposed rule; thus, this comment is considered out of scope. We note that this small population of tanks was specifically provided additional time to install the required controls as specified in § 63.660(d) and the commenters did not provide specific information on why additional time is required. Section 63.6(i) provides a mechanism to request additional time for the limited number of tanks within this small population of tanks that may need additional time.

With respect to the comment that subpart WW imposes additional inspection and recordkeeping requirements, the required inspections are infrequent (generally once a year to once every 5 or 10 years) and we disagree that existing compliance provisions do not provide sufficient time for owners or operators to “upgrade,” if necessary, their inspection procedures.

We agree with the commenter that Table 11 does appear to require all storage vessels to transition to comply with § 63.660 in conflict with the overlap provisions in § 63.640(n), which allow compliance with 40 CFR part 60, subpart Kb as a means to comply with the amended Refinery MACT 1 storage vessel requirements. Therefore, we are

revising the relevant language in Table 11 to clarify that owners or operators of affected storage vessels must transition to comply with the provisions in § 63.660 “. . . or, if applicable, § 63.640(n) . . .” on or before April 29, 2016.

B. Technical and Editorial Corrections

Comment 1: One commenter questioned the revisions to Items (4)(i) and (4)(ii) in Table 11 of 40 CFR part 63, subpart CC as they apply to existing sources constructed or reconstructed before July 14, 1994. For such sources, the commenter stated that these revisions appear to retroactively impose compliance dates of August 18, 1998, for paragraphs that were added or amended after August 18, 1998. The commenter provided examples of the references to requirements in § 63.648(j)(1) and (2) and § 63.644 which should have an effective date of February 1, 2016. The commenter further stated that Table 11 is not all inclusive and omits many compliance dates of sections in subpart CC, including those revised during the amendment process and provided examples. The commenter asserted that these omissions make the table incomplete and contribute to overall confusion, and, therefore, requested that the table be deleted and compliance dates be incorporated directly into the regulatory text.

Response 1: The commenter is mistaken that § 63.648(j)(1) and (2) are new requirements. In the December 2015 final rule, EPA incorporated requirements from 60.482–4 of 40 CFR part 60, subpart VV (which was previously referenced in 63.648(a) of 40 CFR part 63, subpart CC) directly into § 63.648(j)(1) and (2). Section 63.644 was amended and these final revisions provide additional clarification on the compliance date for analyzer vents, as described in Response No. 5. Therefore, Table 11 neither changed the requirement nor changed the applicable compliance date.

Table 11 is not intended to reflect every requirement and compliance date. Rather, for requirements not identified in Table 11, as in those cited by the commenter, the compliance date is the effective date of the rule, February 1, 2016, or is specified in the appropriate section.

Comment 2: One commenter requested that the use of the term “pressure relief device” or “device” be used in § 63.670(o)(1)(vi), similar to the edits proposed in § 63.641 and § 63.670(o)(1)(ii)(B). The commenter also requested that the EPA provide a

definition of the term “pressure relief device” in § 63.641.

Response 2: We agree that § 63.670(o)(1)(vi) should use the term “pressure relief device” consistent with the edits proposed to § 63.641 and § 63.670(o)(1)(ii)(B), and we are amending this paragraph as suggested.

The request that EPA add a definition of “pressure relief device” is outside the scope of the current rulemaking.

Comment 3: One commenter requested that the proposed revision to § 63.1564(a)(1)(iv) also remove the words “of this chapter” for consistency with other options referencing subpart UUU alternatives.

Response 3: We agree with the commenter that the phrase “of this chapter” should be removed. This referred to the reference to § 60.102a(b)(1), which we proposed to remove and are removing in this final rule. In reviewing this comment, we also noted that the last sentence of the introductory paragraph in § 63.1564(a)(1) refers to “. . . the four options in paragraphs (a)(1)(i) through (vi) of this section.” To address this clerical error, we are also revising the last sentence in § 63.1564(a)(1) to replace the word “four” with the word “six.”

V. Statutory and Executive Order Reviews

Additional information about these statutes and Executive Orders can be found at <http://www2.epa.gov/laws-regulations/laws-and-executive-orders>.

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 and was, therefore, not submitted to the Office of Management and Budget (OMB) for review.

B. Paperwork Reduction Act (PRA)

This action does not impose any new information collection burden under the PRA. OMB has previously approved the information collection activities contained in the existing regulations at 40 CFR part 63, subparts CC and UUU and has assigned OMB control numbers 2060–0340 and 2060–0554. The finalized amendments are revisions to compliance dates, clarifications, and technical corrections that do not affect the estimated burden of the existing rule. Therefore, we have not revised the information collection request for the existing rule.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. In making this determination, the impact of concern is any significant adverse economic impact on small entities. An agency may certify that a rule will not have a significant economic impact on a substantial number of small entities if the rule relieves regulatory burden, has no net burden, or otherwise has a positive economic effect on the small entities subject to the rule. The action consists of revisions to compliance dates, clarifications, and technical corrections which do not change the expected economic impact analysis performed for the existing rule. We have, therefore, concluded that this action will have no net regulatory burden for all directly regulated small entities.

D. Unfunded Mandates Reform Act (UMRA)

This action does not contain any unfunded mandate as described in UMRA, 2 U.S.C. 1531–1538, and does not significantly or uniquely affect small governments. The action imposes no enforceable duty on any state, local, or tribal governments or the private sector.

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. It will not have substantial direct effect on tribal governments, 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, as specified in Executive Order 13175. Thus, Executive Order 13175 does not apply to this action.

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

This action is not subject to Executive Order 13045 because it is not economically significant as defined in Executive Order 12866, and because the EPA does not believe the environmental

health or safety risks addressed by this action present a disproportionate risk to children. The final amendments serve to revise compliance dates and make technical clarifications and corrections. We expect the additional compliance time will have an insignificant effect on emission reductions as many refiners already have measures in place due to state and other federal requirements to minimize emissions during these periods. Further, these periods are relatively infrequent and are usually of short duration. Therefore, these amendments should not appreciably increase risk for any populations. Further, this action will allow more time for refiners to implement procedures to safely start up and shut down equipment which should minimize safety risks for all populations.

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 (NTTAA)

This rulemaking does not involve technical standards.

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

The EPA believes that this action does not have disproportionately high and adverse human health or environmental effects on minority populations, low-income populations, or indigenous peoples, as specified in Executive Order 12898 (59 FR 7629, February 16, 1994). The finalized amendments serve to revise compliance dates and make technical clarifications and corrections. We expect the additional compliance time will have an insignificant effect on emission reductions as many refiners already have measures in place due to state and other federal requirements to minimize emissions during these periods. Further, these periods are relatively infrequent and are usually of short duration. Therefore, the finalized amendments should not appreciably increase risk for any populations. Further, this action will allow more time for refiners to implement procedures to safely start up and shut down equipment which should minimize safety risks for all populations.

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each House of Congress and to the Comptroller General of the United States. This is not a “major rule” as defined by 5 U.S.C. 804(2).

List of Subjects

40 CFR Part 60

Environmental protection, Administrative practice and procedures, Air pollution control, Hazardous substances, Intergovernmental relations, Reporting and recordkeeping requirements.

40 CFR Part 63

Environmental protection, Administrative practice and procedures, Air pollution control, Hazardous substances, Intergovernmental relations, Reporting and recordkeeping requirements.

Dated: July 1, 2016.

Gina McCarthy, Administrator.

For the reasons set forth in the preamble, EPA amends 40 CFR parts 60 and 63 as follows:

PART 60—STANDARDS OF PERFORMANCE FOR NEW STATIONARY SOURCES

■ 1. The authority citation for part 60 continues to read as follows:

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

Subpart Ja—Standards of Performance for Petroleum Refineries for Which Construction, Reconstruction, or Modification Commenced After May 14, 2007

■ 2. Section 60.102a is amended by revising the first sentence of paragraph (f)(1)(i) to read as follows:

§ 60.102a Emissions limitations.

* * * * *

(f) * * *

(1) * * *

(i) For a sulfur recovery plant with an oxidation control system or a reduction control system followed by incineration, the owner or operator shall not discharge or cause the discharge of any gases containing SO₂ into the atmosphere in excess of the emission limit calculated using Equation 1 of this section. * * *

* * * * *

PART 63—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR SOURCE CATEGORIES

■ 3. The authority citation for part 63 continues to read as follows:

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

Subpart CC—National Emission Standards for Hazardous Air Pollutants From Petroleum Refineries

■ 4. Section 63.641 is amended by revising the definitions of “Closed blowdown system”, “Force majeure event” and paragraph (5) of the definition “Miscellaneous process vent” to read as follows:

§ 63.641 Definitions.

* * * * *

Closed blowdown system means a system used for depressuring process vessels that is not open to the atmosphere and is configured of piping, ductwork, connections, accumulators/knockout drums, and, if necessary, flow inducing devices that transport gas or vapor from a process vessel to a control device or back into the process.

* * * * *

Force majeure event means a release of HAP, either directly to the atmosphere from a pressure relief device or discharged via a flare, that is demonstrated to the satisfaction of the Administrator to result from an event beyond the refinery owner or operator’s control, such as natural disasters; acts of war or terrorism; loss of a utility external to the refinery (*e.g.*, external power curtailment), excluding power curtailment due to an interruptible service agreement; and fire or explosion originating at a near or adjoining facility outside of the refinery that impacts the refinery’s ability to operate.

* * * * *

Miscellaneous process vent * * *

(5) In situ sampling systems (onstream analyzers) until February 1, 2016. After this date, these sampling systems will be included in the definition of miscellaneous process vents and sampling systems determined to be Group 1 miscellaneous process vents must comply with the requirements in §§ 63.643 and 63.644 no later than January 30, 2019;

* * * * *

■ 5. Section 63.643 is amended by revising paragraph (c) introductory text and adding paragraph (d) to read as follows:

§ 63.643 Miscellaneous process vent provisions.

* * * * *

(c) An owner or operator may designate a process vent as a maintenance vent if the vent is only used as a result of startup, shutdown, maintenance, or inspection of equipment where equipment is emptied, depressurized, degassed or placed into service. The owner or operator does not need to designate a maintenance vent as a Group 1 or Group 2 miscellaneous process vent. The owner of operator must comply with the applicable requirements in paragraphs (c)(1) through (3) of this section for each maintenance vent according to the compliance dates specified in table 11 of this subpart, unless an extension is requested in accordance with the provisions in § 63.6(i).

* * * * *

(d) After February 1, 2016 and prior to the date of compliance with the maintenance vent provisions in paragraph (c) of this section, the owner or operator must comply with the requirements in § 63.642(n) for each maintenance venting event and maintain records necessary to demonstrate compliance with the requirements in § 63.642(n) including, if appropriate, records of existing standard site procedures used to deinventory equipment for safety purposes.

■ 6. Section 63.648 is amended by revising paragraph (a) introductory text as follows:

§ 63.648 Equipment leak standards.

(a) Each owner or operator of an existing source subject to the provisions of this subpart shall comply with the provisions of 40 CFR part 60, subpart VV, and paragraph (b) of this section except as provided in paragraphs (a)(1) and (2), (c) through (i), and (j)(1) and (2) of this section. Each owner or operator of a new source subject to the provisions of this subpart shall comply with subpart H of this part except as provided in paragraphs (c) through (i) and (j)(1) and (2) of this section.

* * * * *

■ 7. Section 63.655 is amended by revising paragraph (h)(8) introductory text to read as follows:

§ 63.655 Reporting and recordkeeping requirements.

* * * * *

(h) * * *

(8) For fenceline monitoring systems subject to § 63.658, within 45 calendar days after the end of each reporting period, each owner or operator shall submit the following information to the EPA’s Compliance and Emissions Data Reporting Interface (CEDRI). (CEDRI can be accessed through the EPA’s Central

Data Exchange (CDX) (<https://cdx.epa.gov/>). The owner or operator need not transmit these data prior to obtaining 12 months of data.

* * * * *

■ 8. Section 63.658 is amended by revising paragraph (c)(1) to read as follows:

§ 63.658 Fenceline monitoring provisions.

* * * * *

(c) * * *

(1) As it pertains to this subpart, known sources of VOCs, as used in Section 8.2.1.3 in Method 325A of appendix A of this part for siting passive monitors, means a wastewater treatment unit, process unit, or any emission source requiring control according to the requirements of this subpart, including marine vessel loading operations. For marine vessel loading operations, one passive monitor should be sited on the shoreline adjacent to the dock.

* * * * *

■ 9. Section 63.670 is amended by revising paragraphs (o)(1)(ii)(B) and (o)(1)(vi) to read as follows:

§ 63.670 Requirements for flare control devices.

* * * * *

(o) * * *

(1) * * *

(ii) * * *

(B) Implementation of prevention measures listed for pressure relief devices in § 63.648(j)(5) for each pressure relief device that can discharge to the flare.

* * * * *

(vi) For each pressure relief device vented to the flare identified in paragraph (o)(1)(iv) of this section, provide a detailed description of each pressure release device, including type of relief device (rupture disc, valve type) diameter of the relief device opening, set pressure of the relief device and listing of the prevention measures implemented. This information may be maintained in an electronic database on-site and does not need to be submitted as part of the flare management plan unless requested to do so by the Administrator.

* * * * *

■ 10. The appendix to subpart CC is amended by revising table 11 to read as follows:

Appendix to Subpart CC of Part 63—Tables

* * * * *

TABLE 11—COMPLIANCE DATES AND REQUIREMENTS

If the construction/ reconstruction date is . . .	Then the owner or operator must comply with . . .	And the owner or operator must achieve compliance . . .	Except as provided in . . .
(1) After June 30, 2014.	(i) Requirements for new sources in §§ 63.643(a) and (b); 63.644, 63.645, and 63.647; 63.648(a) through (i) and (j)(1) and (2); 63.649 through 63.651; and 63.654 through 63.656.	Upon initial startup	§ 63.640(k), (l) and (m).
	(ii) Requirements for new sources in §§ 63.642(n), 63.643(c), 63.648(j)(3), (6) and (7); and 63.657 through 63.660.	Upon initial startup or February 1, 2016, whichever is later.	§ 63.640(k), (l) and (m).
(2) After September 4, 2007 but on or be- fore June 30, 2014.	(i) Requirements for new sources in §§ 63.643(a) and (b); 63.644, 63.645, and 63.647; 63.648(a) through (i) and (j)(1) and (2); and 63.649 through 63.651, 63.655 and 63.656.	Upon initial startup	§ 63.640(k), (l) and (m).
	(ii) Requirements for new sources in § 63.654.	Upon initial startup or October 28, 2009, whichever is later.	§ 63.640(k), (l) and (m).
	(iii) Requirements for new sources in either § 63.646 or § 63.660 or, if applicable, § 63.640(n).	Upon initial startup, but you must transition to comply with only the requirements in § 63.660 or, if applicable, § 63.640(n) on or before April 29, 2016.	§§ 63.640(k), (l) and (m) and 63.660(d).
	(iv) Requirements for existing sources in § 63.643(c).	On or before August 1, 2017	§§ 63.640(k), (l) and (m) and 63.643(d).
	(v) Requirements for existing sources in § 63.658.	On or before January 30, 2018	§ 63.640(k), (l) and (m).
	(vi) Requirements for existing sources in § 63.648 (j)(3), (6) and (7) and § 63.657.	On or before January 30, 2019	§ 63.640(k), (l) and (m).
	(vii) Requirements in § 63.642 (n)	Upon initial startup or February 1, 2016, whichever is later.	§ 63.640(k), (l) and (m).
(3) After July 14, 1994 but on or before September 4, 2007.	(i) Requirements for new sources in §§ 63.643(a) and (b); 63.644, 63.645, and 63.647; 63.648(a) through (i) and (j)(1) and (2); and 63.649 through 63.651, 63.655 and 63.656.	Upon initial startup or August 18, 1995, whichever is later.	§ 63.640(k), (l) and (m).
	(ii) Requirements for existing sources in § 63.654.	On or before October 29, 2012	§ 63.640(k), (l) and (m).
	(iii) Requirements for new sources in either § 63.646 or § 63.660 or, if applicable, § 63.640(n).	Upon initial startup, but you must transition to comply with only the requirements in § 63.660 or, if applicable, § 63.640(n) on or before April 29, 2016.	§§ 63.640(k), (l) and (m) and 63.660(d).
	(iv) Requirements for existing sources in § 63.643(c).	On or before August 1, 2017	§§ 63.640(k), (l) and (m) and 63.643(d).
	(v) Requirements for existing sources in § 63.658.	On or before January 30, 2018	§ 63.640(k), (l) and (m).
	(vi) Requirements for existing sources in §§ 63.648(j)(3), (6) and (7) and 63.657.	On or before January 30, 2019	§ 63.640(k), (l) and (m).
	(vii) Requirements in § 63.642(n)	Upon initial startup or February 1, 2016, whichever is later.	
(4) On or before July 14, 1994.	(i) Requirements for existing sources in §§ 63.648(a) through (i) and (j)(1) and (2); and 63.649, 63.655 and 63.656.	(A) On or before August 18, 1998	(1) § 63.640(k), (l) and (m). (2) § 63.6(c)(5) or unless an extension has been granted by the Administrator as provided in § 63.6(i).
	(ii) Either the requirements for existing sources in §§ 63.643(a) and (b); 63.644, 63.645, 63.647, 63.650 and 63.651; and item (4)(v) of this table. OR The requirements in §§ 63.652 and 63.653.	(A) On or before August 18, 1998	(1) § 63.640(k), (l) and (m). (2) § 63.6(c)(5) or unless an extension has been granted by the Administrator as provided in § 63.6(i).
	(iii) Requirements for existing sources in either § 63.646 or § 63.660 or, if applicable, § 63.640(n).	On or before August 18, 1998, but you must transition to comply with only the requirements in § 63.660 or, if applicable, § 63.640(n) on or before April 29, 2016.	§§ 63.640(k), (l) and (m) and 63.660(d).

TABLE 11—COMPLIANCE DATES AND REQUIREMENTS—Continued

If the construction/reconstruction date is . . .	Then the owner or operator must comply with . . .	And the owner or operator must achieve compliance . . .	Except as provided in . . .
	(iv) Requirements for existing sources in § 63.654.	On or before October 29, 2012	§ 63.640(k), (l) and (m).
	(v) Requirements for existing sources in § 63.643(c).	On or before August 1, 2017	§§ 63.640(k), (l) and (m) and 63.643(d).
	(vi) Requirements for existing sources in § 63.658.	On or before January 30, 2018	§ 63.640(k), (l) and (m).
	(vii) Requirements for existing sources in §§ 63.648(j)(3), (6) and (7) and 63.657.	On or before January 30, 2019	§ 63.640(k), (l) and (m).
	(viii) Requirements in § 63.642 (n)	Upon initial startup or February 1, 2016, whichever is later.	

* * * * *

Subpart UUU—National Emission Standards for Hazardous Air Pollutants for Petroleum Refineries: Catalytic Cracking Units, Catalytic Reforming Units, and Sulfur Recovery Units

- 11. Section 63.1563 is amended by:
 - a. Revising paragraphs (a)(1) and (2) and (b);
 - b. Redesignating paragraphs (d) and (e) as paragraphs (e) and (f), respectively;
 - c. Adding new paragraph (d); and
 - d. Revising newly redesignated paragraph (e) introductory text.

The revisions and additions to read as follows:

§ 63.1563 When do I have to comply with this subpart?

(a) * * *
 (1) If you startup your affected source before April 11, 2002, then you must comply with the emission limitations and work practice standards for new and reconstructed sources in this subpart no later than April 11, 2002 except as provided in paragraph (d) of this section.

(2) If you startup your affected source after April 11, 2002, you must comply with the emission limitations and work practice standards for new and reconstructed sources in this subpart upon startup of your affected source except as provided in paragraph (d) of this section.

(b) If you have an existing affected source, you must comply with the emission limitations and work practice standards for existing affected sources in this subpart by no later than April 11, 2005 except as specified in paragraphs (c) and (d) of this section.

* * * * *

(d) You must comply with the applicable requirements in §§ 63.1564(a)(5), 63.1565(a)(5) and 63.1568(a)(4) as specified in paragraph

(d)(1) or (2) of this section, as applicable.

(1) For sources which commenced construction or reconstruction before June 30, 2014, you must comply with the applicable requirements in §§ 63.1564(a)(5), 63.1565(a)(5) and 63.1568(a)(4) on or before August 1, 2017 unless an extension is requested and approved in accordance with the provisions in § 63.6(i). After February 1, 2016 and prior to the date of compliance with the provisions in §§ 63.1564(a)(5), 63.1565(a)(5) and 63.1568(a)(4), you must comply with the requirements in § 63.1570(c) and (d).

(2) For sources which commenced construction or reconstruction on or after June 30, 2014, you must comply with the applicable requirements in §§ 63.1564(a)(5), 63.1565(a)(5) and 63.1568(a)(4) on or before February 1, 2016 or upon startup, whichever is later.

(e) If you have an area source that increases its emissions or its potential to emit such that it becomes a major source of HAP, the requirements in paragraphs (e)(1) and (2) of this section apply.

* * * * *

■ 12. Section 63.1564 is amended by revising paragraphs (a)(1) introductory text, (a)(1)(iv), (a)(5) introductory text and (c)(5) introductory text to read as follows:

§ 63.1564 What are my requirements for metal HAP emissions from catalytic cracking units?

(a) * * *
 (1) Except as provided in paragraph (a)(5) of this section, meet each emission limitation in Table 1 of this subpart that applies to you. If your catalytic cracking unit is subject to the NSPS for PM in § 60.102 of this chapter or is subject to § 60.102a(b)(1) of this chapter, you must meet the emission limitations for NSPS units. If your catalytic cracking unit is not subject to the NSPS for PM, you can choose from the six options in

paragraphs (a)(1)(i) through (vi) of this section:

* * * * *

(iv) You can elect to comply with the PM per coke burn-off emission limit (Option 2);

* * * * *

(5) On or before the date specified in § 63.1563(d), you must comply with one of the two options in paragraphs (a)(5)(i) and (ii) of this section during periods of startup, shutdown and hot standby:

* * * * *

(c) * * *

(5) If you elect to comply with the alternative limit in paragraph (a)(5)(ii) of this section during periods of startup, shutdown and hot standby, demonstrate continuous compliance on or before the date specified in § 63.1563(d) by:

* * * * *

■ 13. Section 63.1565 is amended by revising paragraph (a)(5) introductory text to read as follows:

§ 63.1565 What are my requirements for organic HAP emissions from catalytic cracking units?

(a) * * *

(5) On or before the date specified in § 63.1563(d), you must comply with one of the two options in paragraphs (a)(5)(i) and (ii) of this section during periods of startup, shutdown and hot standby:

* * * * *

■ 14. Section 63.1566 is amended by revising paragraph (a)(4) to read as follows:

§ 63.1566 What are my requirements for organic HAP emissions from catalytic reforming units?

(a) * * *

(4) The emission limitations in Tables 15 and 16 of this subpart do not apply to emissions from process vents during passive depressuring when the reactor vent pressure is 5 pounds per square inch gauge (psig) or less or during active depressuring or purging prior to January

30, 2019, when the reactor vent pressure is 5 psig or less. On and after January 30, 2019, the emission limitations in Tables 15 and 16 of this subpart do apply to emissions from process vents during active purging operations (when nitrogen or other purge gas is actively introduced to the reactor vessel) or active depressuring (using a vacuum

pump, ejector system, or similar device) regardless of the reactor vent pressure.

* * * * *

■ 15. Section 63.1568 is amended by revising paragraph (a)(4) introductory text to read as follows:

§ 63.1568 What are my requirements for organic HAP emissions from sulfur recovery units?

(a) * * *

(4) On or before the date specified in § 63.1563(d), you must comply with one of the three options in paragraphs (a)(4)(i) through (iii) of this section during periods of startup and shutdown.

* * * * *

■ 16. Table 2 to subpart UUU of part 63 is amended by revising the entry for item 1 to read as follows:

TABLE 2 TO SUBPART UUU OF PART 63—OPERATING LIMITS FOR METAL HAP EMISSIONS FROM CATALYTIC CRACKING UNITS

For each new or existing catalytic cracking unit . . .	For this type of continuous monitoring system . . .	For this type of control device . . .	You shall meet this operating limit . . .
1. Subject to the NSPS for PM in 40 CFR 60.102 and not elect § 60.100(e).	Continuous opacity monitoring system.	Any	On and after August 1, 2017, maintain the 3-hour rolling average opacity of emissions from your catalyst regenerator vent no higher than 20 percent.
*	*	*	*

* * * * *

■ 17. Table 3 to subpart UUU of part 63 is amended by revising the entry for item 12 to read as follows:

TABLE 3 TO SUBPART UUU OF PART 63—CONTINUOUS MONITORING SYSTEMS FOR METAL HAP EMISSIONS FROM CATALYTIC CRACKING UNITS

For each new or existing catalytic cracking unit . . .	If you use this type of control device for your vent . . .	You shall install, operate, and maintain a . . .
12. Electing to comply with the operating limits in § 63.1564(a)(5)(ii) during periods of startup, shutdown, or hot standby.	Any	Continuous parameter monitoring system to measure and record the gas flow rate exiting the catalyst regenerator. ¹
*	*	*

¹ If applicable, you can use the alternative in § 63.1573(a)(1) instead of a continuous parameter monitoring system for gas flow rate.

* * * * *

■ 18. Table 5 to subpart UUU of part 63 is amended by revising the entry for item 2 to read as follows:

TABLE 5 TO SUBPART UUU OF PART 63—INITIAL COMPLIANCE WITH METAL HAP EMISSION LIMITS FOR CATALYTIC CRACKING UNITS

For each new and existing catalytic cracking unit catalyst regenerator vent . . .	For the following emission limit . . .	You have demonstrated initial compliance if . . .
2. Subject to NSPS for PM in 40 CFR 60.102a(b)(1)(i); or in § 60.102 and electing § 60.100(e) and electing to meet the PM per coke burn-off limit.	PM emissions must not exceed 1.0 g/kg (1.0 lb PM/1,000 lb) of coke burn-off.	You have already conducted a performance test to demonstrate initial compliance with the NSPS and the measured PM emission rate is less than or equal to 1.0 g/kg (1.0 lb/1,000 lb) of coke burn-off in the catalyst regenerator. As part of the Notification of Compliance Status, you must certify that your vent meets the PM limit. You are not required to do another performance test to demonstrate initial compliance. As part of your Notification of Compliance Status, you certify that your BLD; CO ₂ , O ₂ , or CO monitor; or continuous opacity monitoring system meets the requirements in § 63.1572.
*	*	*

[FR Doc. 2016-16451 Filed 7-12-16; 8:45 am]

BILLING CODE 6560-50-P

DEPARTMENT OF COMMERCE**National Oceanic and Atmospheric Administration****50 CFR Part 622**

[Docket No. 160225143-6583-02]

RIN 0648-BF61

Fisheries of the Caribbean, Gulf of Mexico, and South Atlantic; Snapper-Grouper Fishery Off the Southern Atlantic States; Regulatory Amendment 25

AGENCY: National Marine Fisheries Service (NMFS), National Oceanic and Atmospheric Administration (NOAA), Commerce.

ACTION: Final rule.

SUMMARY: NMFS issues regulations to implement Regulatory Amendment 25 for the Fishery Management Plan (FMP) for the Snapper-Grouper Fishery of the South Atlantic Region (Regulatory Amendment 25) as prepared and submitted by the South Atlantic Fishery Management Council (Council). This final rule revises the commercial and recreational annual catch limits (ACLs), the commercial trip limit, and the recreational bag limit for blueline tilefish. Additionally, this final rule revises the black sea bass recreational bag limit and the commercial and recreational fishing years for yellowtail snapper. The purpose of this final rule for blueline tilefish is to increase the optimum yield (OY) and ACLs based on a revised acceptable biological catch (ABC) recommendation from the Council's Scientific and Statistical Committee (SSC). The purpose of this final rule is also to achieve OY for black sea bass, and adjust the fishing year for yellowtail snapper to better protect these species and allow for increased economic benefits to fishers.

DATES: This rule is effective August 12, 2016, except for the amendments to § 622.187(b)(2), § 622.191(a)(10), and § 622.193(z) that are effective July 13, 2016.

ADDRESSES: Electronic copies of Regulatory Amendment 25, which includes an environmental assessment, a Regulatory Flexibility Act analysis, and a regulatory impact review may be obtained from www.regulations.gov or the Southeast Regional Office (SERO) Web site at http://sero.nmfs.noaa.gov/sustainable_fisheries/s_atl/sg/2015/reg_am25/index.html.

FOR FURTHER INFORMATION CONTACT: Mary Janine Vara, NMFS SERO, telephone: 727-824-5305, or email: mary.vara@noaa.gov.

SUPPLEMENTARY INFORMATION: The snapper-grouper fishery of the South Atlantic Region is managed under the FMP and includes blueline tilefish, black sea bass, and yellowtail snapper. The FMP was prepared by the Council and is implemented by NMFS through regulations at 50 CFR part 622 under the authority of the Magnuson-Stevens Fishery Conservation and Management Act (Magnuson-Stevens Act).

On June 1, 2016, NMFS published a proposed rule for Regulatory Amendment 25 and requested public comment (81 FR 34944). The proposed rule and Regulatory Amendment 25 outline the rationale for the actions contained in this final rule. A summary of the actions implemented by Regulatory Amendment 25 and this final rule is provided below.

Management Measures Contained in This Final Rule

This final rule revises the commercial and recreational ACLs, commercial trip limit, and recreational bag limit for blueline tilefish; revises the recreational bag limit for black sea bass; and revises the fishing year for the yellowtail snapper commercial and recreational sectors. All ABC and ACL weights in this final rule are expressed in round weight.

Blueline Tilefish ACLs

This final rule revises the commercial and recreational ACLs for blueline tilefish. The current commercial ACLs are 26,766 lb (12,141 kg) for 2016, 35,785 lb (16,232 kg) for 2017, and 44,048 lb (19,980 kg) for 2018 and subsequent fishing years. The current recreational ACLs are 26,691 lb (12,107 kg) for 2016, 35,685 lb (16,186 kg) for 2017, and 43,925 lb (19,924 kg) for 2018 and subsequent fishing years. These ACLs were implemented through the final rule to implement Amendment 32 to the FMP (80 FR 16583, March 30, 2015). This final rule increases both the commercial and recreational ACLs for blueline tilefish in the exclusive economic zone (EEZ) of the South Atlantic. The commercial ACL will be set at 87,521 lb (39,699 kg) and the recreational ACL will be set at 87,277 lb (39,588 kg).

In Regulatory Amendment 25, the Council is revising the blueline tilefish total ACL (combined commercial and recreational ACL) based on a new ABC recommendation from the Council's SSC. The SSC provided their blueline tilefish ABC recommendation to set the

ABC at the equilibrium yield at 75 percent of the fishing mortality that produces the maximum sustainable yield (224,100 lb (101,650 kg)). The Council accepted the SSC's ABC recommendation and determined that this revised ABC is sufficient to prevent the overfishing of blueline tilefish.

The Council is also revising the total ACL to increase the buffer between the blueline tilefish ABC and ACL from 2 percent to 22 percent. The increase in the buffer is to account for management uncertainty, such as increased blueline tilefish landings north of the Council's area of jurisdiction. In Amendment 32, the Council set the total blueline tilefish ACL for the South Atlantic at 98 percent of the recommended ABC for the entire Atlantic region to account for management uncertainty because the stock assessment was coast-wide and the Council was aware that landings of blueline tilefish occurred north of North Carolina. In Regulatory Amendment 25, the Council set the total ACL at 78 percent of the ABC. This decision is based on a comparison of the landings between the South Atlantic and Greater Atlantic Regions (Maine through Virginia), which indicate that 22 percent of the landings from 2011-2014 are from the Greater Atlantic Region.

Blueline Tilefish Commercial Trip Limit

The current commercial trip limit for blueline tilefish is 100 lb (45 kg), gutted weight; 112 lb (51 kg), round weight, and was implemented in Amendment 32. The Council selected that trip limit as a way to slow the commercial harvest of blueline tilefish, potentially lengthen the commercial fishing season, and reduce the risk of the commercial ACL being exceeded. This final rule increases the blueline tilefish commercial trip limit to 300 lb (136 kg) gutted weight; 336 lb (152 kg), round weight. The Council decided that an appropriate response to the increase in ABC and total ACL is to increase the commercial trip limit. The increase in the commercial trip limit will increase the socioeconomic benefits to commercial fishermen. In addition, the increase in the commercial trip limit is not expected to result in an in-season closure of blueline tilefish.

Blueline Tilefish and Black Sea Bass Recreational Bag Limits

This final rule revises the recreational bag limits for both blueline tilefish and black sea bass. The current blueline tilefish bag limit is one fish per vessel per day for the months of May through August and is part of the aggregate bag limit for grouper and tilefish. There is no recreational retention of blueline

§ 52.247 Control strategy and regulations: Fine Particle Matter.

* * * * *

(g) Determination of Attainment: Effective August 24, 2016, the EPA has determined that, based on 2011 to 2013 ambient air quality data, the South Coast PM2.5 nonattainment area has attained the 1997 annual and 24-hour PM2.5 NAAQS. This determination suspends the requirements for this area to submit an attainment demonstration, associated reasonably available control measures, a reasonable further progress plan, contingency measures and other planning SIPs related to attainment for as long as this area continues to attain the 1997 annual and 24-hour PM2.5 NAAQS. If the EPA determines, after notice-and-comment rulemaking, that this area no longer meets the 1997 PM2.5 NAAQS, the corresponding determination of attainment for the area shall be withdrawn.

[FR Doc. 2016-17410 Filed 7-22-16; 8:45 am]

BILLING CODE 6560-50-P

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 63

[EPA-HQ-OAR-2011-0817; FRL-9949-46-OAR]

RIN 2060-AS98

National Emission Standards for Hazardous Air Pollutants for the Portland Cement Manufacturing Industry

AGENCY: Environmental Protection Agency (EPA).

ACTION: Direct final rule.

SUMMARY: The Environmental Protection Agency (EPA) is taking direct final action to amend the National Emission Standards for Hazardous Air Pollutants for the Portland Cement Manufacturing Industry. This direct final rule provides, for a period of 1 year, an additional compliance alternative for sources that would otherwise be required to use an HCl CEMS to demonstrate compliance with the HCl emissions limit. This compliance alternative is needed due to the current unavailability of a calibration gas used for quality assurance purposes. This direct final rule also restores regulatory text requiring the reporting of clinker production and kiln feed rates that was deleted inadvertently.

DATES: This rule is effective on September 8, 2016 without further notice, unless the EPA receives significant adverse comment by August

24, 2016. If the EPA receives significant adverse comment, we will publish a timely withdrawal in the Federal Register informing the public that the rule will not take effect.

ADDRESSES: Submit your comments, identified by Docket ID No. EPA-HQ-OAR-2011-0817, to the Federal eRulemaking Portal: http://www.regulations.gov. Follow the online instructions for submitting comments. Once submitted, comments cannot be edited or withdrawn. The EPA may publish any comment received to its public docket. Do not submit electronically any information you consider to be Confidential Business Information (CBI) or other information whose disclosure is restricted by statute. Multimedia submissions (audio, video, etc.) must be accompanied by a written comment. The written comment is considered the official comment and should include discussion of all points you wish to make. The EPA will generally not consider comments or comment contents located outside of the primary submission (i.e., on the Web, Cloud, or other file sharing system). For additional submission methods, the full EPA public comment policy, information about CBI or multimedia submissions, and general guidance on making effective comments, please visit http://www2.epa.gov/dockets/commenting-epa-dockets.

FOR FURTHER INFORMATION CONTACT: Ms. Sharon Nizich, Sector Policies and Programs Division (D243-02), Office of Air Quality Planning and Standards, U.S. Environmental Protection Agency, Research Triangle Park, North Carolina, 27711; telephone number: (919) 541-2825; fax number: (919) 541-5450; and email address: nizich.sharon@epa.gov.

SUPPLEMENTARY INFORMATION:

Organization of This Document. The information in this preamble is organized as follows:

- I. General Information
A. Why is the EPA using a direct final rule?
B. Does this direct final rule apply to me?
C. What should I consider as I prepare my comments for the EPA?
II. What are the amendments made by this direct final rule?
III. Statutory and Executive Order Reviews
A. Executive Order 12866: Regulatory Planning and Review and Executive Order 13563: Improving Regulation and Regulatory Review
B. Paperwork Reduction Act (PRA)
C. Regulatory Flexibility Act (RFA)
D. Unfunded Mandates Reform Act (UMRA)
E. Executive Order 13132: Federalism
F. Executive Order 13175: Consultation and Coordination With Indian Tribal Governments

- G. Executive Order 13045: Protection of Children From Environmental Health Risks and Safety Risks
H. Executive Order 13211: Actions Concerning Regulations That Significantly Affect Energy Supply, Distribution, or Use
I. National Technology Transfer and Advancement Act (NTTAA)
J. Executive Order 12898: Federal Actions To Address Environmental Justice in Minority Populations and Low-Income Populations
K. Congressional Review Act (CRA)

I. General Information

A. Why is the EPA using a direct final rule?

The EPA is publishing this direct final rule without a prior proposed rule because we view this as a noncontroversial action and do not anticipate significant adverse comment. However, in the "Proposed Rules" section of this Federal Register, we are publishing a separate document that will serve as the proposed rule to amend the National Emission Standards for Hazardous Air Pollutants for the Portland Cement Manufacturing Industry, if EPA receives significant adverse comments on this direct final rule. We will not institute a second comment period on this action. Any parties interested in commenting must do so at this time. For further information about commenting on this rule, see the ADDRESSES section of this document.

If the EPA receives significant adverse comment on all or a distinct portion of this direct final rule, we will publish a timely withdrawal in the Federal Register informing the public that some or all of this direct final rule will not take effect. We would address all public comments in any subsequent final rule based on the proposed rule.

B. Does this direct final rule apply to me?

Categories and entities potentially regulated by this direct final rule include:

Table with 2 columns: Category, NAICS Code. Row: Portland cement manufacturing facilities, 327310

1 North American Industry Classification System.

This table is not intended to be exhaustive, but rather provides a guide for readers regarding entities likely to be regulated by this direct final rule. To determine whether your facility is affected, you should examine the applicability criteria in 40 CFR 63.1340. If you have questions regarding the applicability of any aspect of this action

to a particular entity, consult either the air permitting authority for the entity or your EPA Regional representative as listed in 40 CFR 63.13.

C. What should I consider as I prepare my comments for the EPA?

Do not submit information containing CBI to the EPA through <http://www.regulations.gov> or email. Clearly mark the part or all of the information that you claim to be CBI. For CBI information on a disk or CD-ROM that you mail to the EPA, mark the outside of the disk or CD-ROM as CBI and then identify electronically within the disk or CD-ROM the specific information that is claimed as CBI. In addition to one complete version of the comments that includes information claimed as CBI, a copy of the comments that does not contain the information claimed as CBI must be submitted for inclusion in the public docket. Information so marked will not be disclosed except in accordance with procedures set forth in 40 CFR part 2. Send or deliver information identified as CBI only to the following address: OAQPS Document Control Officer (C404-02), U.S. Environmental Protection Agency, Research Triangle Park, North Carolina 27711, Attention Docket ID No. EPA-HQ-OAR-2011-0817.

II. What are the amendments made by this direct final rule?

In response to a concern raised by a stakeholder regarding the availability of calibration gases for HCl continuous monitoring compliance, this direct final rule amends 40 CFR 63.1349(b)(6) of the performance testing requirements for HCl by adding an alternative method for performance testing. Under the current rule, the owner or operator of a kiln subject to the emission limits for HCl in 40 CFR 63.1343 may demonstrate compliance by one of the following methods:

- An owner or operator of a kiln may demonstrate compliance by operating a continuous emissions monitoring system (CEMS) meeting the requirements of performance specification 15 (PS-15), PS-18, or any other PS for HCl CEMS in appendix B to part 60, with compliance based on a 30-kiln operating day rolling average.
- If the kiln is controlled using a wet scrubber, tray tower, or dry scrubber, the owner or operator, as an alternative to using a CEMS, may demonstrate compliance with the HCl limit using one of two options, described below.

Under both options, a performance test must be conducted by the owner or operator using Method 321. Under the first option, while conducting the

Method 321 performance test (note Method 321 is the HCl stack testing performance method required by this rule), the owner or operator simultaneously measures a control device parameter and establishes a site-specific parameter limit that will be continuously monitored to determine compliance. If the kiln is controlled using a wet scrubber or tray tower, the owner or operator would monitor the pressure drop across the scrubber and/or liquid flow rate and pH during the HCl performance test. If the kiln is controlled using a dry scrubber, the sorbent injection rate would be monitored during the performance test. Under the second option, the owner or operator may establish sulfur dioxide (SO₂) as the operating parameter by measuring SO₂ emissions using a CEMS simultaneously with the Method 321 test and establishing the site-specific SO₂ limit that will be continuously monitored to determine compliance with the HCl limit.

The current rule requires that if a source chooses to monitor HCl emissions using a CEMS, they must do so in accordance with PS-15, PS-18, or any other PS for HCl CEMS in appendix B to part 60 of this chapter. (See 40 CFR part 60 appendix B.) Quality assurance procedures for HCl CEMS require that they be capable of reading HCl concentrations that span a range of possible emission levels below as well as above expected HCl emission concentrations. These quality assurance procedures require the use of National Institute of Standards and Technology (NIST)-traceable calibration gases for HCl.

Following our decision to create PS-18 and Procedure 6 for HCl continuous monitoring in 2012, the EPA worked with NIST and commercial gas vendors on development of NIST-traceable HCl gas standards to support the PS-18 and Portland Cement Maximum Achievable Control Technology (MACT) rulemaking. While some of the low HCl concentration (<10 parts per million, or ppm) NIST-traceable gases have been available on a limited basis since 2013, the full range of HCl concentrations required to support all HCl emissions monitoring technologies (including integrated path that requires concentrations 100 times higher) are not widely available at this time.

The approach used by NIST in 2013 was to certify the Research Gas Material (RGM) cylinders as primary gas standards. These cylinders contain HCl gas and are provided to NIST by vendors for NIST certification, and subsequently used by the vendors as transfer standards to prepare the Gas

Manufacturer Intermediate Standards (GMIS). The GMIS cylinders are then used to produce NIST-traceable gas cylinders that are sold commercially.¹ The initial approach used by NIST to certify the RGM cylinders was not viable in the long term as the instrumentation used by NIST largely depleted the HCl RGM gas volume, leaving little gas in the cylinder for the vendors to use in preparing GMIS materials. Because of this concern, NIST initiated development of an improved RGM certification procedure. The development of both the initial and more recently improved approach has been hampered by the challenges presented in handling HCl gas. HCl gas is extremely reactive and difficult to handle in both gas cylinders and analytically. As such, it has taken considerable time for NIST to optimize the new analytical equipment and approach to achieve the necessary uncertainty requirements (*e.g.*, <1 percent uncertainty).

In addition, the commercial establishment of NIST-traceable gases is dependent on collaboration between NIST and the specialty gas vendors. There are a limited number of vendors providing the stable, accurate, low and high concentration cylinder gases to NIST to certify as RGMs. NIST is now receiving a regular supply of candidate RGM cylinders from these vendors and is beginning work on higher concentration HCl gas standards needed to support integrated path HCl monitors (IP-CEMS). Once the RGMs are available, the specialty gas vendors must complete a series of procedures to establish the certainty of their products which adds to the time to achieve wide commercial availability.

As a result, the EPA is providing, for a period of 1 year, an additional compliance alternative for sources that would otherwise be required to use an HCl CEMS. In this alternative, the HCl CEMS is still required to be installed and operated, but actual compliance with the HCl emissions limit is determined by a three run stack test. The HCl CEMS will still provide a continuous readout of HCl emissions, but because the CEMS will not be calibrated with the required NIST-traceable calibration gases, the HCl measurement is not considered to be sufficiently accurate on an absolute basis for compliance, but would be sufficient to indicate any relative change in HCl emissions occurring subsequent

¹ EPA Traceability Protocol for Assay and Certification of Gaseous Calibration Standards, U.S. Environmental Protection Agency Office of Research and Development, EPA/600/R-12/531, May 2012.

to the compliance test. Therefore, the HCl CEMS under this alternative would function as a continuous parameter monitor system (CPMS) as in the case of the particulate matter (PM) CPMS requirement (see 78 FR 10014–10015, 10019–10020, February 12, 2013). Based on conversations with gas vendors and NIST, we anticipate that NIST-traceable calibration gases for HCl will be available in sufficient quantities within one year of this notice (see J. Ryan, memo to S. Johnson, Docket ID No. EPA–HQ–OAR–2011–0817, *Status of NIST-Traceable Hydrogen Chloride (HCl) Calibration Gases for Use With HCl Continuous Emissions Monitoring Systems (CEMS) Under 40 CFR part 63, subpart LLL, June 22, 2016*). Thus, this alternative will expire on July 25, 2017 and owner/operators must have in place one of the original HCl compliance demonstration alternatives (we anticipate HCl CEMS operated monitoring equipment according to 40 CFR 63.1350(l)) by this date.

Under this new, temporary alternative, the owner or operator would demonstrate initial compliance by conducting a performance test using Method 321 and would monitor compliance with an operating parameter limit through use of an HCl CPMS. For the HCl CPMS, the owner operator would use the average HCl CPMS indicated output, typically displayed as parts per million volume, wet basis HCl recorded at in-stack oxygen concentration during the HCl performance test to establish the operating limit. To determine continuous compliance with the operating limit, the owner or operator would record the indicated HCl CPMS output data for all periods when the process is operating and use all the HCl CPMS data, except data obtained during times of monitor malfunctions. Thus, continuous compliance with the operating limit would be demonstrated by using all valid hourly average data collected by the HCl CPMS for all operating hours to calculate the arithmetic average operating parameter in units of the operating limit (indicated ppm) on a 30-kiln operating day rolling average basis, updated at the end of each new kiln operating day. An exceedance of the kiln 30-day operating limit would trigger evaluation of the control system operation and resetting the operating limit based on a new correlation with performance testing. For kilns with inline raw mills, performance testing and monitoring HCl to establish the site specific operating limit must be conducted during both raw mill on and raw mill off conditions.

As is the case for the PM CPMS requirements (see 40 CFR 63.1349(b)(1)(i)), this alternative includes a scaling factor of 75 percent of the emission standard as a benchmark (2.25 parts per million volume, dry basis @ 7-percent oxygen). Sources that choose this option will conduct a Method 321 test to determine compliance with the HCl emissions standard and during this testing will also monitor their HCl CPMS output in indicated ppm to determine where their HCl CPMS output would intersect 75 percent of their allowed HCl emissions, and set their operating level at that ppm output. This scaling procedure alleviates re-testing concerns for sources that operate well below the emission limit and provides greater operational flexibility while assuring continuous compliance with the HCl emission standard. For sources whose Method 321 compliance tests place them at or above 75 percent of the emission standard, their operating limit is determined by the average of three Method 321 test runs (for sources with no inline raw mill) or the time weighted average of six Method 321 test runs (for kilns with inline raw mills). We believe that by adopting a scaling factor as well as the use of 30 days of averaged HCl CPMS measurements, the parametric limit in no way imposes a stringency level higher than the level of the HCl emissions standard and will avoid triggering unnecessary retests for many facilities, especially for the lower-emitting sources.

In addition to adding the interim testing and monitoring provisions for HCl, we are restoring a recordkeeping regulatory provision that was deleted inadvertently during one of the recent rule revisions. The provision in question is the former 40 CFR 63.1355(e). This provision relates to the recordkeeping requirements for clinker production and kiln feed rates. This requirement was added in the 2010 final amendments and was not removed or revised in subsequent amendments to the rule. This rulemaking restores this provision in the regulatory text to ensure that the regulated community has a clear understanding of the applicable compliance requirements.

III. Statutory and Executive Order Reviews

Additional information about these statutes and Executive Orders can be found at <http://www2.epa.gov/laws-regulations/laws-and-executive-orders>.

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 and was, therefore, not submitted to the Office of Management and Budget (OMB) for review.

B. Paperwork Reduction Act (PRA)

This action does not impose any new information collection burden under the PRA. OMB has previously approved the information collection activities contained in the existing regulation (40 CFR part 63, subpart RRR) and has assigned OMB control number 2060–0416. This action does not change the information collection requirements.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. This action will not impose any requirements on small entities. This action does not create any new requirements or burdens and no costs are associated with this direct final action.

D. Unfunded Mandates Reform Act (UMRA)

This action does not contain an unfunded mandate as described in UMRA, 2 U.S.C. 1531–1538, and does not significantly or uniquely affect small governments. The action imposes no enforceable duty on any state, local, or tribal governments or the private sector.

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. It will neither impose substantial direct compliance costs on federally recognized tribal governments, nor preempt tribal law. The EPA is aware of one tribally owned Portland cement facility currently subject to 40 CFR part 63, subpart LLL that will be subject to this direct final rule. However, the provisions of this direct final rule are not expected to impose new or substantial direct compliance costs on Tribal governments since the provisions in this direct final rule are

adding an alternative to the HCl monitoring provisions, adding an option which provides operational flexibility. Thus, Executive Order 13175 does not apply to this action.

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

The EPA interprets Executive Order 13045 as applying to those regulatory actions that concern environmental health or safety risks that the 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 (NTTAA)

This rulemaking does not involve technical standards.

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

The EPA believes that this action does not have disproportionately high and adverse human health or environmental effects on minority populations, low-income populations, or indigenous peoples, as specified in Executive Order 12898 (59 FR 7629, February 16, 1994). This action does not affect the level of protection provided to human health or the environment.

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each House of the Congress and to the Comptroller General of the United States. This action is not a “major rule” as defined by 5 U.S.C. 804(2).

List of Subjects in 40 CFR Part 63

Environmental protection, Administrative practice and procedures, Air pollution control, Hazardous substances, Intergovernmental relations, Reporting and recordkeeping requirements.

Dated: July 14, 2016.

Gina McCarthy,
Administrator.

For the reasons stated in the preamble, the Environmental Protection Agency is amending title 40, chapter I, part 63 of the Code of Federal Regulations (CFR) as follows:

PART 63—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR SOURCE CATEGORIES

■ 1. The authority citation for part 63 continues to read as follows:

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

Subpart LLL—National Emission Standards for Hazardous Air Pollutants for the Portland Cement Manufacturing Industry

■ 2. Section 63.1349 is amended by adding paragraph (b)(6)(v) to read as follows:

§ 63.1349 Performance testing requirements.

* * * * *

(b) * * *

(6) * * *

(v) As an alternative to paragraph (b)(6)(ii) of this section, the owner or operator may demonstrate initial compliance by conducting a performance test using Method 321 of appendix A to this part. You must also monitor continuous performance through use of an HCl CPMS according to paragraphs (b)(6)(v)(A) through (H) of this section. For kilns with inline raw mills, compliance testing and monitoring HCl to establish the site specific operating limit must be conducted during both raw mill on and raw mill off conditions.

(A) For your HCl CPMS, you must establish a 30 kiln operating day site-specific operating limit. If your HCl performance test demonstrates your HCl emission levels to be less than 75 percent of your emission limit (2.25 ppmvd @7% O₂), you must use the time weighted average HCl CPMS indicated value recorded during the HCl compliance test (typically measured as ppmvw HCl at stack O₂ concentration, but a dry, oxygen corrected value would also suffice), your HCl instrument zero output value, and the time weighted average HCl result of your compliance test to establish your operating limit. If your HCl compliance test demonstrates your HCl emission levels to be at or above 75 percent of your emission limit (2.25 ppmvd @7% O₂), you must use the time weighted average HCl CPMS indicated value recorded during the HCl

compliance test as your operating limit. You must use the HCl CPMS indicated signal data to demonstrate continuous compliance with your operating limit.

(1) Your HCl CPMS must provide a ppm HCl concentration output and the establishment of its relationship to manual reference method measurements must be determined in units of indicated ppm. The instrument signal may be in ppmvw or ppmvd and the signal may be a measurement of HCl at in-stack concentration or a corrected oxygen concentration. Once the relationship between the indicated output of the HCl CPMS and the reference method test results is established, the HCl CPMS instrument measurement basis (ppmvw or ppmvd, or oxygen correction basis) must not be altered. Likewise, any setting that impacts the HCl CPMS indicated HCl response must remain fixed after the site-specific operating limit is set.

(2) Your HCl CPMS operating range must be capable of reading HCl concentrations from zero to a level equivalent to 125 percent of the highest expected value during mill off operation. If your HCl CPMS is an auto-ranging instrument capable of multiple scales, the primary range of the instrument must be capable of reading an indicated HCl concentration from zero to 10 ppm.

(3) During the initial performance test of a kiln with an inline raw mill, or any such subsequent performance test that demonstrates compliance with the HCl limit, record and average the indicated ppm HCl output values from the HCl CPMS for each of the six periods corresponding to the compliance test runs (*e.g.*, average each of your HCl CPMS output values for six corresponding Method 321 test runs). With the average values of the six test runs, calculate the average of the three mill on test runs and the average of the three mill off test runs. Calculate the time weighted result using the average of the three mill on tests and the average of the three mill off tests and the previous annual ratio of mill on/mill off operations. Kilns without an inline raw mill will conduct three compliance tests and calculate the average monitor output values corresponding to these three test runs and not use time weighted values to determine their site specific operating limit.

(B) Determine your operating limit as specified in paragraphs (b)(6)(i) or (iii) of this section. If your HCl performance test demonstrates your HCl emission levels to be below 75 percent of your emission limit, kilns with inline raw mills will use the time weighted average indicated HCl ppm concentration CPMS

value recorded during the HCl compliance test, the zero value output from your HCl CPMS, and the time weighted average HCl result of your compliance test to establish your operating limit. Kilns without inline raw mills will not use a time weighted average value to establish their operating limit. If your time weighted HCl compliance test demonstrates your HCl emission levels to be at or above 75 percent of your emission limit, you will use the time weighted HCl CPMS indicated ppm value recorded during the HCl compliance test to establish your operating limit. Kilns without inline raw mills will not use time weighted compliance test results to make this determination. You must verify an existing operating limit or establish a new operating limit for each kiln, after each repeated performance test.

(C) If the average of your three Method 321 compliance test runs (for kilns without an inline raw mill) or the time weighted average of your six Method 321 compliance test runs (for an kiln with an inline raw mill) is below 75 percent of your HCl emission limit, you must calculate an operating limit by establishing a relationship of the average HCl CPMS indicated ppm to the Method 321 test average HCl concentration using the HCl CPMS instrument zero, the average HCl CPMS indicated values corresponding to the three (for kilns without inline raw mills) or time weighted HCl CPMS indicated values corresponding to the six (for kilns with inline raw mills) compliance test runs, and the average HCl concentration (for kilns without raw mills) or average time weighted HCl concentration (for kilns with inline raw mills) from the Method 321 compliance

test with the procedures in paragraphs (b)(6)(v)(C)(1) through (5) of this section.

(1) Determine your HCl CPMS instrument zero output with one of the following procedures:

(i) Zero point data for in situ instruments should be obtained by removing the instrument from the stack and monitoring ambient air on a test bench.

(ii) If neither of the steps in paragraphs (b)(6)(v)(C)(1)(i) through (ii) of this section are possible, you must use a zero output value provided by the manufacturer.

(2) If your facility does not have an inline raw mill you will determine your HCl CPMS indicated average in HCl ppm, and the average of your corresponding three HCl compliance test runs, using equation 11a.

$$\bar{x} = \frac{1}{n} \sum_{i=1}^n X_i, \bar{y} = \frac{1}{n} \sum_{i=1}^n Y_i \tag{Eq. 11a}$$

Where:

X_i = The HCl CPMS data points for the three (or six) runs constituting the performance test;

Y_i = The HCl concentration value for the three (or six) runs constituting the performance test; and
n = The number of data points.

(3) You will determine your HCl CPMS indicated average in HCl ppm,

and the average of your corresponding HCl compliance test runs, using equation 11b. If you have an inline raw mill, use this same equation to calculate a second three-test average for your mill off CPMS and compliance test data.

$$\bar{x} = \frac{1}{n} \sum_{i=1}^n X_i, \bar{y} = \frac{1}{n} \sum_{i=1}^n Y_i \tag{Eq. 11b}$$

Where:

X_i = The HCl CPMS data points for the three runs constituting the mill on OR mill off performance test;

Y_i = The HCl concentration value for the three runs constituting the mill on OR mill off performance test; and
n = The number of data points.

(4) With your instrument zero expressed in ppm, your average HCl

CPMS ppm value, and your HCl compliance test average, determine a relationship of performance test HCl (as ppmvd @7% O₂) concentration per HCl CPMS indicated ppm with Equation 11c.

$$R = \frac{Y_1}{(X_1 - z)} \tag{Eq. 11c}$$

Where:

R = The relative performance test concentration per indicated ppm for your HCl CPMS;
Y₁ = The average HCl concentration as ppmvd @7% O₂ during the performance test;

X₁ = The average indicated ppm output from your HCl CPMS; and
z = The ppm of your instrument zero determined from paragraph (b)(6)(v)(C)(1) of this section.

(5) Determine your source specific 30 kiln operating day operating limit using

HC1 CPMS indicated value from Equation 11c in Equation 11d, below. This sets your operating limit at the HC1 CPMS output value corresponding to 75 percent of your emission limit.

$$O_1 = z + \frac{0.75 (L)}{R}$$

(Eq. 11d)

Where:
 O₁ = The operating limit for your HCl CPMS on a 30 kiln operating day average, as indicated ppm;
 L = 3 ppmvd @7% O₂;
 z = Your instrument zero, determined from paragraph (b)(6)(v)(C)(1) of this section ; and

R = The relative performance test concentration per indicated ppm for your HCl CPMS, from Equation 11c.
 (D) If the average of your HCl compliance test runs is at or above 75 percent of your HCl emission limit (2.25 ppmvd@7% O₂) you must determine

your operating limit by averaging the HCl CPMS output corresponding to your HCl performance test runs that demonstrate compliance with the emission limit using Equation 11e.

$$O_h = \frac{1}{n} \sum_{i=1}^n X_i$$

(Eq. 11e)

Where:
 O_h = Your site specific HCl CPMS operating limit, in indicated ppm.
 X_i = The HCl CPMS data points for all runs i.
 n = The number of data points.

(E) To determine continuous compliance with the operating limit, you must record the HCl CPMS

indicated output data for all periods when the process is operating and use all the HCl CPMS data for calculations when the source is not out of control. You must demonstrate continuous compliance with the operating limit by using all quality-assured hourly average data collected by the HCl CPMS for all

operating hours to calculate the arithmetic average operating parameter in units of the operating limit (ppmvw) on a 30 kiln operating day rolling average basis, updated at the end of each new kiln operating day. Use Equation 11f to determine the 30 kiln operating day average.

$$30\text{kiln operating day parameter average} = \frac{\sum_{i=1}^n Hpv_i}{n}$$

(Eq. 11f)

Where:
 30 kiln operating day parameter average = The average indicated value for the CPMS parameter over the previous 30 days of kiln operation;
 Hpv_i = The hourly parameter value for hour i; and
 n = The number of valid hourly parameter values collected over 30 kiln operating days.

(F) If you exceed the 30 kiln operating day operating limit, you must evaluate the control system operation and re-set the operating limit.
 (G) The owner or operator of a kiln with an inline raw mill and subject to limitations on HCl emissions must demonstrate initial compliance by conducting separate performance tests

while the raw mill is on and while the raw mill is off. Using the fraction of time the raw mill is on calculate your HCl CPMS limit as a weighted average of the HCl CPMS indicated values measured during raw mill on and raw mill off compliance testing using Equation 11g.

$$R = (b * t) + (a * (1 - t))$$

(Eq. 11g)

Where:
 R = HCl CPMS operating limit;
 b = Average indicated HCl CPMS value during mill on operations, ppm;
 t = Fraction of operating time with mill on;
 a = Average indicated HCl CPMS value during mill off operations ppm; and
 (1 - t) = Fraction of operating time with mill off.

(H) Paragraph (b)(6)(v) of this section expires on July 25, 2017 at which time the owner or operator must demonstrate compliance with paragraphs (b)(6)(i), (ii), or (iii).

■ 3. Section 63.1350 is amended by adding paragraph (l)(4) to read as follows:

§ 63.1350 Monitoring requirements.

* * * * *

(l) * * *

(4) If you monitor continuous performance through the use of an HCl CPMS according to paragraphs (b)(6)(v)(A) through (H) of § 63.1349, for any exceedance of the 30 kiln operating day HCl CPMS average value from the established operating limit, you must:

(i) Within 48 hours of the exceedance, visually inspect the APCD;

(ii) If inspection of the APCD identifies the cause of the exceedance, take corrective action as soon as possible and return the HCl CPMS measurement to within the established value; and

(iii) Within 30 days of the exceedance or at the time of the annual compliance test, whichever comes first, conduct an HCl emissions compliance test to determine compliance with the HCl emissions limit and to verify or reestablish the HCl CPMS operating

* * * * *

limit within 45 days. You are not required to conduct additional testing for any exceedances that occur between the time of the original exceedance and the HCl emissions compliance test required under this paragraph.

(iv) HCl CPMS exceedances leading to more than four required performance tests in a 12-month process operating period (rolling monthly) constitute a presumptive violation of this subpart.

* * * * *

■ 4. Section 63.1355 is amended by adding paragraph (e) to read as follows:

§ 63.1355 Recordkeeping requirements.

* * * * *

(e) You must keep records of the daily clinker production rates and kiln feed rates.

* * * * *

[FR Doc. 2016-17293 Filed 7-22-16; 8:45 am]

BILLING CODE 6560-50-P

FEDERAL COMMUNICATIONS COMMISSION

47 CFR Part 5

[ET Docket Nos. 10-236 and 06-155; FCC 16-86]

Radio Experimentation and Market Trials—Streamlining Rules

AGENCY: Federal Communications Commission.

ACTION: Final rule.

SUMMARY: In this document, the Commission modifies its rules to permit program experimental radio licensees (program licensees) to experiment with radio frequency (RF)-based medical devices on certain restricted frequencies, if the medical device being tested is designed to comply with applicable Commission service rules. Adoption of this proposal facilitates access to spectrum that can be used under an experimental program license to improve the utility of this type of licensing scheme for those entities experimenting with RF-based medical devices, and thereby help to advance innovation in this area. This action will result in no harm to any qualified license applicant or licensee.

DATES: Effective August 24, 2016.

FOR FURTHER INFORMATION CONTACT: Rodney Small, Office of Engineering and Technology, 202-418-2452, Rodney.Small@fcc.gov.

SUPPLEMENTARY INFORMATION: This is a summary of the Commission's Second Report and Order, ET Docket No. 10-236 and 06-155, FCC 16-86, adopted June 29, 2016, and released June 30,

2016. The full text of this document is available for inspection and copying during normal business hours in the FCC Reference Center (Room CY-A257), 445 12th Street SW., Washington, DC 20554. The complete text of this document also may be purchased from the Commission's copy contractor, Best Copy and Printing, Inc., 445 12th Street SW., Room, CY-B402, Washington, DC 20554. The full text may also be downloaded at: https://apps.fcc.gov/edocs_public/Query.do?numberFld=16-86&numberFld2=&docket=&dateFld=&docTitleDesc.

People with Disabilities: To request materials in accessible formats for people with disabilities (braille, large print, electronic files, audio format), send an email to fcc504@fcc.gov or call the Consumer & Governmental Affairs Bureau at 202-418-0530 (voice), 202-418-0432 (tty).

This document does not contain new or modified information collection requirements subject to the Paperwork Reduction Act of 1995 (PRA), Public Law 104-13.

Synopsis

1. In 2013, the Commission established in the *Report and Order* in this proceeding, 78 FR 25137, April 29, 2013, three new kinds of experimental licenses—including program licenses—designed to benefit the development of new technologies and expedite their introduction to the marketplace. In this Second Report and Order, the Commission adopts the proposal set forth in the *Further NPRM*, 80 FR 52437, August 31, 2015, by modifying section 5.303 of its rules for program licenses to permit experimentation in the restricted frequency bands for medical devices that comply with the service rules in Part 18 (Industrial, Scientific, and Medical Equipment), Part 95 Subpart H (Wireless Medical Telemetry Service), or Part 95 Subpart I (Medical Device Radiocommunication Service). This rule change will establish parity between all qualified medical device manufacturers and developers—whether they are health care institutions or medical device manufacturers—as to permissible frequencies of operation for conducting basic research and clinical trials with RF-based medical devices. Accordingly, because the Commission finds that the proposal will serve the public interest by promoting medical innovation with no detriment to the public, it adopts that proposal. Revised section 5.303 of the rules is set forth at the end of this summary.

Regulatory Flexibility Certification

2. The Regulatory Flexibility Act (RFA)¹ requires that agencies prepare a regulatory flexibility analysis for notice-and-comment rulemaking proceedings, unless the agency certifies that “the rule will not have a significant economic impact on a substantial number of small entities.”² Modification of section 5.303 of the Commission's Rules establishes parity between all qualified medical device manufacturers as to permissible frequencies of operation for conducting basic research and clinical trials with RF-based medical devices. The Commission previously determined that “[t]he entities affected by the proposed rule change are equipment manufacturers seeking to test medical equipment designed to operate in the restricted frequency bands listed in section 15.205(a) of the rules, and such manufacturers are limited in number,” and certified that the proposed rules would not have a significant economic impact on a substantial number of small entities. The Commission received no comments that addressed this determination or that claimed that the proposal requires additional RFA analysis. The Commission therefore certifies that the rule revisions set forth herein will not have a significant economic impact on a substantial number of small entities.

Congressional Review Act

3. The Commission will send a copy of this Second Report and Order in a report to Congress and the Government Accountability Office pursuant to the Congressional Review Act, *see* 5 U.S.C. 801(a)(1)(A).

Ordering Clauses

4. Accordingly, IT IS ORDERED, that, pursuant to sections 301 and 303 of the Communications Act of 1934, as amended, 47 U.S.C. 301 and 303, and §§ 1.1 and 1.425 of the Commission's rules, 47 CFR 1.1, 1.425, this Second Report and Order IS ADOPTED.

5. IT IS FURTHER ORDERED that part 5 of the Commission's rules, 47 CFR part 5, IS AMENDED, as set forth in the Rule Changes. These revisions will be effective August 24, 2016.

6. IT IS FURTHER ORDERED that, if no applications for review are timely filed, this proceeding SHALL BE TERMINATED and the docket CLOSED.

¹ See 5 U.S.C. 604. The RFA, *see* 5 U.S.C. 601 *et seq.*, has been amended by the Contract with America Advancement Act of 1996, Public Law 104-121, 110 Stat. 847 (1996) (CWAAA). Title II of the CWAAA is the Small Business Regulatory Enforcement Fairness Act of 1996 (SBREFA).

² 5 U.S.C. 605(b).

ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 61

[EPA-HQ-OAR-2008-0218; FRL-9957-54-OAR]

RIN 2060-AP26

Revisions to National Emission Standards for Radon Emissions From Operating Mill Tailings

AGENCY: Environmental Protection Agency (EPA).

ACTION: Final rule.

SUMMARY: The Environmental Protection Agency (EPA) is taking final action to revise certain portions of the National Emission Standards for Hazardous Air Pollutants (NESHAP) for Radon Emissions from Operating Mill Tailings. The revisions for this final action are based on the EPA's determination as to what constitutes generally available control technology or management practices (GACT) for this area source category. We are also adding new definitions to the NESHAP, revising existing definitions and clarifying that the NESHAP also applies to uranium recovery facilities that extract uranium through the in-situ leach method and the heap leach method.

DATES: This rule is effective on March 20, 2017.

ADDRESSES: The EPA has established a docket for this action under Docket ID No. EPA-HQ-OAR-2008-0218. All documents in the docket are listed on the <http://www.regulations.gov> Web site. Although listed in the index, some information is not publicly available, e.g., Confidential Business Information (CBI) or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are available electronically through <http://www.regulations.gov>.

FOR FURTHER INFORMATION CONTACT: Dan Schultheisz, Office of Radiation and Indoor Air, Radiation Protection Division, Mail code 6608T, U.S. Environmental Protection Agency, 1200 Pennsylvania Ave. NW., Washington, DC 20460; telephone number: 202-343-9290; fax number: 202-343-2304; email address: schultheisz.daniel@epa.gov. You may also access the EPA Web site to find information related to this rulemaking at <https://www.epa.gov/radiation/>.

SUPPLEMENTARY INFORMATION:

Throughout this document, “we,” “us” and “our” refer to the EPA.

Preamble Acronyms and Abbreviations. We use the following acronyms and abbreviations in this document:

AEA—Atomic Energy Act
 ALARA—As low as reasonably achievable
 BID—Background information document
 CAA—Clean Air Act
 CAAA—Clean Air Act Amendments of 1990
 CCAT—Colorado Citizens Against Toxic Waste
 CFR—Code of Federal Regulations
 Ci—Curie, a unit of radioactivity equal to the amount of a radioactive isotope that decays at the rate of 3.7×10^{10} disintegrations per second
 DOE—U.S. Department of Energy
 EIA—Economic impact analysis
 EO—Executive Order
 EPA—U.S. Environmental Protection Agency
 FR—Federal Register
 GACT—Generally Available Control Technology
 HAP—Hazardous Air Pollutant
 ISL—In-situ leach uranium recovery, also known as in-situ recovery (ISR)
 mrem—millirem, 1×10^{-3} rem—a unit of radiation exposure
 MACT—Maximum Achievable Control Technology
 MOU—Memorandum of Understanding
 NESHAP—National Emission Standard for Hazardous Air Pollutants
 NRC—U.S. Nuclear Regulatory Commission
 NTAA—National Tribal Air Association
 OMB—Office of Management and Budget
 pCi—picocurie, 1×10^{-12} curie
 Ra-226—Radium-226
 Rn-222—Radon-222
 Radon flux—A term applied to the amount of radon crossing a unit area per unit time, as in picocuries per square centimeter per second (pCi/m²/sec)
 RCRA—Resource Conservation and Recovery Act
 Subpart W—National Emission Standards for Radon Emissions from Operating Mill Tailings at 40 CFR 61.250–61.256
 SWIPR—Subpart W Impoundment Photographic Reporting
 tpy—tons per year
 U₃O₈—uranium oxide, also known as “yellowcake”
 UMTRCA—Uranium Mill Tailings Radiation Control Act of 1978
 U.S.C.—United States Code

Background Information. In this action we are finalizing changes to the NESHAP for Radon Emissions from Operating Mill Tailings. These changes were proposed on May 2, 2014 (79 FR 25388) as part of a review of pre-1990 NESHAPs pursuant to Clean Air Act Section 112(q)(1). After review of the public comments we have made some changes to the rule since the proposal, and these will be discussed later in this document. We summarize some of the more significant comments received regarding the proposed rule and provide

our responses in this preamble. A summary of all other public comments on the proposal and the EPA's responses to those comments is provided in the “Summary and Response to Public Comments” document, which is available in Docket ID No. EPA-HQ-OAR-2008-0218. The “track changes” version of the regulatory language that incorporates the changes in this final action resulting from review by the Office of Management and Budget (OMB) is also available in the docket for this rulemaking.

Outline. The information in this preamble is organized as follows:

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 - H. Executive Order 13211: Actions Concerning Regulations That Significantly Affect Energy Supply, Distribution or Use
 - I. National Technology Transfer and Advancement Act (NTTAA)
 - J. Executive Order 12898: Federal Actions To Address Environmental Justice in Minority Populations and Low-Income Populations
 - K. Congressional Review Act (CRA)

I. General Information

A. Executive Summary

1. Introduction

This final rule amends requirements promulgated in 1989 under the Clean Air Act to control emissions of radon-222 from operating structures used to manage uranium byproduct material or tailings¹ at uranium recovery facilities.

¹ The EPA first defined the term “uranium byproduct material or tailings” in 1986 (51 FR 34066). The 1986 and 1989 rulemakings were primarily concerned with, but not limited to, conventional mill tailings as the most significant source of radon. We used the term “tailings” throughout those rulemakings for simplicity, reflecting that rulemaking emphasis. We

The rule does not apply to disposal of uranium byproduct material or tailings. The rule retains monitoring requirements for certain uranium byproduct material or tailings impoundments in existence on or before December 15, 1989 and establishes generally available control technology or management practices (GACT) for other impoundments and heap leach piles. This final rule completes the EPA’s obligation under the requirements of CAA section 112(q)(1) to “review, and if appropriate, revise” 40 CFR part 61, subpart W (hereafter Subpart W).

Uranium recovery and processing currently occurs by one of three methods: (1) Conventional milling; (2) in-situ leach (ISL); and (3) heap leach. A conventional uranium mill is a chemical plant that extracts uranium from ore that has typically been obtained from an underground or open-pit mine. The ore is crushed and the uranium leached using chemical solutions, concentrated into uranium oxide (U₃O₈ or “yellowcake”), and transported to a uranium conversion facility to begin the processing into fuel for nuclear reactors. Solid and liquid wastes produced during this process are called uranium byproduct material or tailings. Uranium byproduct material or tailings contains residual uranium, radium and heavy metals. Radon-222 is generated by the decay of radium-226. As defined in this final rule, conventional impoundments are used to manage the mostly solid wastes from processing. Non-conventional impoundments, also known as evaporation or holding ponds, are used to manage process liquids and effluents. Non-conventional impoundments may accumulate sediments at the bottom as solids contained in the liquids settle out. Conventional impoundments are permanent structures that require long-term stewardship. Non-conventional impoundments are typically removed at facility closure and often placed into conventional impoundments for disposal. Non-conventional impoundments are sometimes also designed to be used as conventional impoundments as needed.

ISL is often used when a uranium ore body is in a formation through which ground water flows. A liquid solution containing chemicals can be injected

understand that this has contributed to the impression among some stakeholders that Subpart W cannot apply to materials other than the mostly solid wastes resulting from conventional milling that are managed, and ultimately disposed, in permanent impoundments. We are reiterating in this action that the term “uranium byproduct material or tailings” more broadly defines the materials that are subject to Subpart W.

into the formation to mobilize the uranium into solution, which is then recovered and processed. Process liquids and effluents from ISL are managed in non-conventional impoundments. ISL is now the predominant form of uranium recovery in the United States.

Heap leaching is a method of processing that is expected to be used for low-grade ore or in other situations where it is economically favorable. During heap leaching a pile of ore is sprayed with a chemical solution and uranium leaches into solution. The uranium solution is collected at the bottom of the pile and further processed. At the end of processing, the heap leach pile may be closed in place (typically by being covered), or removed and placed in a conventional impoundment. Process liquids and effluents are managed in non-conventional impoundments. At the time of this rulemaking, there are no heap leach facilities in the United States, although one such facility is planned.

There is currently one operating conventional mill in the United States, the White Mesa Mill in Utah. Two other conventional mills remain on standby, the Shootaring Canyon Mill in Utah and the Sweetwater Mill in Wyoming. There are six operating ISL facilities: Crow Butte in Nebraska; Smith Ranch, Lost Creek, Nichols Ranch, Willow Creek (which includes the Irigary and Christensen Ranch wellfields) and Ross CPP, all in Wyoming. Four other ISL facilities have operated and are now in standby. They are Alta Mesa, Kingsville Dome,² Rosita and Hobson/La Palangana, all located in Texas. These facilities are subject to the requirements of Subpart W. There are no heap leach facilities operating or on standby. Future heap leach facilities, as well as conventional mills and ISL facilities that have been or are being licensed, will be subject to Subpart W when they begin operating.

Subpart W was initially promulgated in 1986 and amended pursuant to a voluntary remand in 1989. For CAA section 112 standards that were in effect before November 15, 1990, CAA section 112(q)(1) requires the EPA to review, and, if appropriate, revise such standards to comply with the requirements of subsection (d). As a result of this review, we are promulgating this final rule pursuant to

² Operating permits at the Kingsville Dome facility have lapsed and may not be renewed; however, because there are still uranium resources that could be exploited, Kingsville Dome is considered to be on standby for purposes of this discussion.

CAA sections 112(q) and 112(d) and setting standards that comply with the requirements of CAA section 112(d)(5). CAA section 112(d)(5) addresses standards for area sources and provides that section 112(d) standards for area sources may provide for the use of GACT by the affected area sources.

Subpart W regulates facilities and materials that are also regulated under the authority of the Uranium Mill Tailings Radiation Control Act of 1978 (UMTRCA). UMTRCA directed the EPA to establish standards of general application to protect public health, safety and the environment from hazards associated with wastes from extraction or concentration of uranium or thorium. The Nuclear Regulatory Commission (NRC) implements and enforces the EPA's standards through its licensing and regulatory program. By establishing requirements to control radon emissions from uranium byproduct material or tailings during the facility's operational period, Subpart W supports and works in harmony with the NRC's UMTRCA-based provisions that limit radon concentrations at the site boundary.

2. Provisions of the 1989 Rule

When promulgated in 1989, Subpart W established monitoring requirements and work practices as methods to control radon emissions from impoundments used to manage uranium byproduct material or tailings (51 FR 51654, December 15, 1989). Existing impoundments (those operating as of December 15, 1989) were required to comply with a radon flux standard of 20 pCi/m²-sec, monitored using Method 115. New impoundments built after December 15, 1989 were required to be operated in accordance with the provisions of 40 CFR 192.32(a) and be designed to meet one of two work practices:

- Phased disposal in impoundments no larger than 40 acres in area, with no more than two such impoundments operating at any one time; or
- Continuous disposal of tailings such that tailings are dewatered and immediately disposed with no more than 10 acres of tailings exposed at any one time.

All impoundments were required to be operated to comply with the requirements of 40 CFR 192.32(a),³

notwithstanding the exemption in § 192.32(a)(1) for impoundments constructed prior to the promulgation of 40 CFR part 192. This provision was incorporated to ensure that older impoundments were equipped with liners capable of retaining liquids within the impoundment and monitoring systems capable of detecting leakages. Leaks could allow the contents of the impoundment to dry out and increase radon emissions. As originally promulgated in 1986, Subpart W envisioned that older impoundments would not be in use beyond December 31, 1992 unless granted an exemption or extension. Such impoundments were not required to comply with the provisions of 40 CFR 192.32(a). The 1989 rulemaking eliminated the prohibition on using existing impoundments beyond December 31, 1992 and required older impoundments to comply with the requirements at 40 CFR 192.32(a) (51 FR 34066, September 24, 1986 and 54 FR 51680, December 15, 1989).

3. Provisions of the Final Rule

This final rule defines and establishes GACT-based standards for conventional and non-conventional impoundments and heap leach piles; in doing so, the final rule clarifies the applicability of the 1989 rule to these different types of units and distinguishes among them. The final rule retains the radon flux standard and monitoring requirements for conventional impoundments in existence on December 15, 1989, and retains the provision that extended the construction requirements in 40 CFR 192.32(a)(1) to these conventional impoundments. The final rule also formalizes the 1989 management practices as GACT-based standards for conventional impoundments constructed after December 15, 1989, with limited changes to the 1989 standard—the final rule focuses the cross-reference regarding the impoundment construction requirements to 40 CFR 192.32(a)(1), instead of a more broad reference to 40 CFR 192.32(a) and removes the phrase “as determined by the Nuclear Regulatory Commission.” In addition, the final rule establishes GACT-based standards for non-conventional

impoundments and heap leach piles, as follows:

- Non-conventional impoundments must maintain solid materials in a saturated condition, with no solid materials visible above the level of liquid in the impoundment;
- Heap leach piles that have completed their operational life but not yet entered closure are limited to no more than two such piles with an area no greater than 40 acres each; and
- Conformance to the construction requirements in 40 CFR 192.32(a)(1).

The final rule changes some existing definitions and adds several new definitions. The amended definition of “operation” is finalized as proposed. The definitions of “continuous disposal,” “dewatered,” “existing impoundment,” and “phased disposal” are amended to conform to the amended definition of “operation.” New definitions of “standby,” “conventional impoundment,” “non-conventional impoundment,” “heap leach pile,” “heap leach pile operational life,” and “uranium recovery facility” are also being finalized as proposed. New definitions of “final closure” and “reclamation plan” are added to the final rule to clarify when Subpart W no longer applies to an impoundment or heap leach pile.

4. Key Changes to the Proposal

The proposed rule contained several provisions that are modified in the final rule in response to public comments. We proposed to eliminate the radon flux standard and monitoring requirement for impoundments in existence on December 15, 1989. We believed this was appropriate based on information that indicated that the remaining impoundments in this category could comply with the GACT-based management practices. Information received through public comments demonstrated that the assumptions that supported our proposal were not correct and also that the pre-1989 unit that was expected to close (Cell 3 at the White Mesa Mill) remains open. Therefore, the final rule retains the radon flux standard and monitoring requirement for conventional impoundments in existence on December 15, 1989.

We proposed that non-conventional impoundments maintain one meter of liquid above any solid materials in the impoundment. Our analyses indicate that liquids effectively attenuate radon emissions, and that one meter of liquid would reduce the radon emissions by greater than 99%, to a level nearly indistinguishable from background. Based on public comment regarding feasibility and cost associated with the

³ 40 CFR 192.32(a) includes six elements, which apply during processing and prior to the end of the closure period: (1) Construction of impoundments in conformance with the requirements of 40 CFR 264.221; (2) conformance to the groundwater protection standards in 40 CFR 264.92 and related sections; (3) placement of a permanent radon barrier on nonoperational impoundments; (4)

demonstration that the permanent radon barrier limits radon releases to no greater than 20 pCi/m²-sec; (5) conformance to the requirements of 40 CFR part 190 and 40 CFR part 440; and (6) maintenance by NRC of public doses from radon emissions as far below the Federal Radiation Protection Guidance as practicable. Only § 192.32(a)(1) is directly relevant to the goals of Subpart W, which in turn facilitate NRC in achieving § 192.32(a)(6).

water demand to maintain the liquid level in the impoundment, the final rule requires only that solid materials remain saturated. Saturation will effectively reduce radon emissions by approximately 95% compared to dry uranium byproduct material or tailing. The water demand to maintain saturation should also be considerably reduced compared to the proposal.

We proposed that heap leach piles be regulated under Subpart W from the time they begin processing (*i.e.*, at the time the leaching solution is first applied), because uranium byproduct material or tailings begins to be generated at that time. We proposed they be limited in size (40 acres) and number (no more than two operating at any one time), and maintain a 30% moisture content to reduce radon emissions. Based on public comment, the final rule provides that heap leach piles become subject to Subpart W once they have finished their operational life, when their sole purpose is to manage uranium byproduct material or tailings.

As commenters pointed out, this is consistent with the approach we have taken for conventional mills, where waste material that has been separated from the recovered uranium has not been regulated under Subpart W until it leaves the processing unit and is deposited in an impoundment. Further, Subpart W will only apply to post-processing heap leach piles until they enter the closure process. The final rule retains the proposed area and number limitations on piles that are between processing and closure.

5. Economic Impacts

This final rule will have limited economic impact. No new requirements are placed on conventional impoundments. Further, impacts associated with non-conventional impoundments and heap leach piles will be less than those estimated for the proposed rule. Operators of non-conventional impoundments and heap leach piles will not incur additional cost related to liners, which are required by other regulations. Operators of non-

conventional impoundments will be required to maintain liquids in the impoundment such that no solids are visible above the liquid level. In addition, operators of heap leach facilities can reduce the period of time they are subject to Subpart W and thus reduce compliance costs by expeditiously beginning the closure process after the operational life of the pile has ended, and we encourage timely closure in all cases.

Table 1 presents a summary of the unit cost (per pound of U₃O₈) for implementing each GACT-based standard at each of the three types of uranium recovery facilities. In addition to presenting the GACT costs individually, Table 1 presents the total unit cost to implement all relevant GACT-based standards at each type of facility. Table 1 shows that a conventional mill will have both conventional and non-conventional impoundments, and be required to maintain saturation in the non-conventional impoundments.

TABLE 1—FINAL GACT-BASED STANDARDS COSTS PER POUND OF U₃O₈

	Unit cost (\$/lb U ₃ O ₈)		
	Conventional mills	ISL facilities	Heap leach
GACT—Double Liners for Conventional Impoundments *	\$1.04		
GACT—Double Liners for Non-conventional Impoundments *	1.04	3.07	0.22
GACT—Maintaining Non-conventional Impoundment Sediments 100% Saturated	0.015	0.026	0.0013
GACT—Liners for Heap Leach Piles *			2.01
GACTs—Total for All Four	2.09	3.09	2.24
Baseline Facility Costs ** (EIA Section 6.2)	55.18	51.31	45.06

* Liners required by 40 CFR part 192.
 ** Based on a price of U₃O₈ of \$55/lb.

Based on the information in Table 1, the four GACT-based standards represent about 4%, 6%, and 5% of the baseline cost (per pound of U₃O₈) at conventional, ISL, and heap leach uranium recovery facilities, respectively. The table shows that, at a market price of \$55 per pound, the baseline facility costs for a conventional mill are greater than the market price of uranium. However, since the liner requirements would have to be met under 40 CFR part 192, these costs are not actually being imposed by Subpart W. The only cost associated with the final rule is the cost of maintaining saturation in the non-conventional impoundments, which is minimal.

6. Public Engagement

During development of the proposed rule and throughout the public comment period, the EPA engaged with

stakeholders and sought public input. Subsequent to beginning the rulemaking process, the EPA entered into a settlement agreement in August 2009 with Colorado Citizens Against Toxic Waste (CCAT) and Rocky Mountain Clean Air Action. As part of the settlement agreement, the EPA agreed to:

- Provide three public presentations and a national webinar on the rulemaking;
- Conduct quarterly stakeholder conference calls on the status of the rulemaking; and
- Create a public Web site and post non-privileged records.

The EPA conducted public presentations in June 2009 in Cañon City, Colorado, near the Cotter Mill; in October 2009 in Rapid City, South Dakota, in conjunction with the Western Mining Action Network’s semi-annual

conference; and in May 2010 on lands of the Ute Mountain Ute Tribe in southeastern Utah, near the White Mesa Mill. The EPA also presented a national webinar in June 2010. Records of EPA’s quarterly stakeholder calls and non-privileged records regarding this Subpart W rulemaking are available at the following public Web site: <https://www.epa.gov/radiation/subpart-w-rulemaking-activity>.

In addition to the presentations specified in the settlement agreement, the EPA conducted presentations at numerous industry-sponsored events, particularly the annual uranium recovery workshop sponsored by the NRC and the National Mining Association (NMA). Beginning in 2009, the EPA provided regular updates on the Subpart W rulemaking at these annual workshops. The EPA also provided a presentation for NMA

officials in October 2009 and participated in NRC’s uranium recovery licensing workshop in January 2011.

The EPA also actively sought interactions with tribal stakeholders. Several current or proposed uranium recovery facilities are of interest to tribes. The White Mesa Mill is located just north of Ute Mountain Ute lands in southeastern Utah. The Oglala Sioux Tribe has been active in the renewal of the operating license for the Crow Butte ISL facility in northwestern Nebraska and the initial licensing of the proposed Dewey-Burdock ISL facility in southwestern South Dakota. The Navajo Nation has been active in the development of proposed ISL facilities in New Mexico.

The EPA conducted presentations at the Uranium Contamination Stakeholder Workshops in 2009 and 2010 in Gallup, New Mexico and Tuba City, Arizona, respectively. In addition to the presentations, the EPA also held

discussions with representatives from the Navajo EPA and the Hopi Tribe. In June 2014, after the proposed rule was published, the EPA gave a presentation for the National Tribal Air Association (NTAA) on the monthly NTAA/EPA policy call.

Concurrent with issuance of the 2014 proposed rule, the EPA sent letters to 53 tribal leaders offering consultation on the rule, consistent with the EPA’s “Policy on Consultation and Coordination with Indian Tribes.” Consultation is a process of meaningful communication and coordination between the EPA and tribal officials prior to the EPA taking actions or implementing decisions that may affect tribes. The Ute Mountain Ute Tribe responded and requested a formal consultation. The consultation was held in July 2014 between officials of the EPA’s Office of Radiation and Indoor Air in Washington, DC and officials from EPA Region 8 and the Tribe at

Tribal headquarters in Towaoc, Colorado (Docket No. EPA–HQ–OAR–2008–0218–0120).

The EPA has also met with individual stakeholder groups. Prior to publication of the proposed rule, the EPA met with representatives from CCAT, Uranium Watch, and the Sheep Mountain Alliance. Following publication of the proposed rule, the EPA met with the Southern Environmental Law Center. Concurrent with public hearings in September 2014, the EPA met with representatives from CCAT and the Energy Minerals Law Center. Following the public comment period, in November 2014 the EPA met with representatives from Uranium Watch and the Information Network for Responsible Mining (INFORM).

B. Does this action apply to me?

The regulated categories and entities potentially affected by the final standards are shown below in Table 2:

TABLE 2—INDUSTRIAL SOURCE CATEGORIES AFFECTED BY THIS FINAL ACTION

Category	NAICS code ¹	Examples of regulated entities
Industry:		
Uranium Ores Mining and/or Beneficiating	212291	Area source facilities that extract or concentrate uranium from any ore processed primarily for its source material content.
Leaching of Uranium, Radium or Vanadium Ores	212291	Area source facilities that extract or concentrate uranium from any ore processed primarily for its source material content.

¹ North American Industry Classification System.

This table is not intended to be exhaustive, but rather provides a guide for readers regarding entities likely to be affected by this final action. If you have any questions regarding the applicability of this action to a particular entity, consult either the air permit authority for the entity or your EPA regional representative as listed in 40 CFR 61.04 of subpart A (General Provisions).

C. Where can I get a copy of this document and other related information?

In addition to being available in the docket, an electronic copy of this final action will also be available on the Internet. Following signature, a copy of this final action will be posted at the following address: <https://www.epa.gov/radiation/subpart-w-national-emission-standards-radon-emissions-operating-mill-tailings>. Following publication in the **Federal Register**, the EPA will post the **Federal Register** version and key technical documents at this same Web site.

D. Judicial Review and Administrative Reconsideration

Under CAA section 307(b)(1), judicial review of this final action is available only by filing a petition for review in the United States Court of Appeals for the District of Columbia Circuit by March 20, 2017. Under CAA section 307(b)(2), the requirements established by this final rule may not be challenged separately in any civil or criminal proceedings brought by the EPA to enforce the requirements.

Section 307(d)(7)(B) of the CAA further provides that “[o]nly an objection to a rule or procedure which was raised with reasonable specificity during the period for public comment (including any public hearing) may be raised during judicial review.” This section also provides a mechanism for the EPA to reconsider the rule “[i]f the person raising an objection can demonstrate to the Administrator that it was impracticable to raise such objection within [the period for public comment] or if the grounds for such objection arose after the period for public comment (but within the time specified for judicial review) and if such objection is of central relevance to the

outcome of the rule.” Any person seeking to make such a demonstration should submit a Petition for Reconsideration to the Office of the Administrator, U.S. EPA, Room 3000, EPA WJC West Building, 1200 Pennsylvania Ave. NW., Washington, DC 20460, with a copy to both the person(s) listed in the preceding **FOR FURTHER INFORMATION CONTACT** section, and the Associate General Counsel for the Air and Radiation Law Office, Office of General Counsel (Mail Code 2344A), U.S. EPA, 1200 Pennsylvania Ave. NW., Washington, DC 20460.

II. Background

A. What is the Agency’s legal authority for taking this action?

Section 112(q)(1) of the Clean Air Act (CAA) requires that NESHAPs “in effect before the date of enactment of the Clean Air Act Amendments of 1990 [Nov. 15, 1990] . . . shall be reviewed and, if appropriate, revised, to comply with the requirements of subsection (d) of . . . section [112].” The EPA promulgated 40 CFR part 61, subpart W, “National Emission Standards for Radon Emissions from Operating Mill

Tailings,” (Subpart W) on December 15, 1989.⁴ The EPA conducted this review of Subpart W under CAA section 112(q)(1).

Section 112(d) of the CAA requires the EPA to establish emission standards for major and area sources. A major source is any stationary source that emits or has the potential to emit 10 tons per year (tpy) or more of any single HAP or 25 tpy or more of any combination of HAPs. An area source is a stationary source of HAP that is not a major source. For operating uranium byproduct material or tailings impoundments, the HAP of concern is radon-222 (hereafter referred to as “radon” or Rn-222). Radon emissions from operating uranium recovery facilities are far below the statutory thresholds⁵ and EPA has not set alternative criteria for identifying major sources of radionuclide emissions; thus, all sources regulated under Subpart W are area sources (EPA-HQ-OAR-2008-0218-0001, 0002). See Section IV.A.2.

Section 112(q)(1) does not dictate how the EPA must conduct its review of those NESHAPs issued prior to 1990. Rather, it provides that the Agency must review, and, if appropriate, revise the standards to comply with the requirements of section 112(d). Determining what revisions, if any, are appropriate for these NESHAPs is best assessed through a case-by-case consideration of each NESHAP. As explained below, in this case, we have reviewed Subpart W and are revising the standards consistent with section 112(d)(5), which addresses standards for area sources. After our review, we determined it was appropriate to revise Subpart W to clarify the applicability of the rule to non-conventional impoundments and heap leach piles and promulgate standards that are more appropriate for controlling radon emissions at those sources, consistent with the requirements of CAA section 112(d)(5). All units regulated by Subpart W are area sources and we determined that promulgating GACT-based

standards under CAA section 112(d)(5) is appropriate for these sources.

For area sources, the Administrator has the discretion under CAA section 112(d)(5) to set standards based on GACT in lieu of maximum achievable control technology (MACT) under sections 112(d)(2) and (d)(3), which is required for major sources. Under CAA section 112(d)(5), the Administrator may elect to promulgate standards or requirements for area sources “which provide for the use of generally available control technologies or management practices by such sources to reduce emissions of hazardous air pollutants.” Consistent with section 112(d)(5), we are revising Subpart W to reflect GACT-based standards.

B. What source category is affected by the final rule?

The source category regulated under Subpart W, first defined in 1986, is facilities licensed to manage uranium byproduct material during and following the processing of uranium ores, commonly referred to as uranium mills and their associated tailings. Licenses are issued by the U.S. Nuclear Regulatory Commission (NRC) or NRC Agreement States. As promulgated in 1986 and 1989, Subpart W defines “uranium byproduct material or tailings” as “the waste produced by the extraction or concentration of uranium from any ore processed primarily for its source material content.”⁶ Neither of these definitions is affected by this action. For clarity, in this action we refer to this source category by the term “uranium recovery facilities,” and we are adding this phrase to the definitions section of the rule. Use of this term encompasses the existing universe of facilities whose HAP emissions are currently regulated under Subpart W. Uranium recovery facilities process uranium ore to extract uranium. The HAP emissions from any type of uranium recovery facility that manages uranium byproduct material or tailings are subject to regulation under Subpart W. This currently includes three types

of uranium recovery facilities: (1) Conventional uranium mills; (2) ISL facilities; and (3) heap leach facilities. Subpart W requirements specifically apply to the affected sources at the uranium recovery facilities that are used to manage or contain the uranium byproduct material or tailings. Common names for these structures may include, but are not limited to, impoundments, tailings impoundments, tailings piles, evaporation or holding ponds, and heap leach piles. However, the name itself is not important for determining whether Subpart W requirements apply to that structure; rather, applicability is based on what these structures contain and the use of these structures to manage or contain uranium byproduct material or tailings.

C. How does Subpart W regulate HAP emissions from the source category?

Subpart W was initially promulgated on September 24, 1986 (51 FR 34056) and amended pursuant to a voluntary remand on December 15, 1989 (54 FR 51654). At the time of promulgation in the 1980s, the predominant form of uranium recovery was through the use of conventional mills. As promulgated in 1989, Subpart W contained two separate standards. The first standard applied to “existing” impoundments, *i.e.*, those in existence and licensed by the NRC (or its Agreement States) on or prior to December 15, 1989. Owners or operators of existing tailings impoundments were required to ensure that emissions from those impoundments did not exceed a radon (Rn-222) flux standard of 20 picocuries per meter squared per second (pCi/m²-sec). As stated at the time of promulgation: “This rule will have the practical effect of requiring the mill owners to keep their piles wet or covered” (54 FR 51689). Keeping the piles (impoundments) wet or covered with soil would reduce radon emissions to a level that would meet the standard. This is still considered an effective method to reduce radon emissions at all uranium byproduct material or tailings impoundments.

The method for monitoring for compliance with the radon flux standard was prescribed as Method 115, found at 40 CFR part 61, Appendix B. The owners or operators of existing impoundments were required to report to the EPA the results of the compliance testing for any calendar year by no later than March 31 of the following year.

There is currently one operating mill with impoundments that pre-date December 15, 1989, and two mills that are currently in standby mode. All of

⁴ On April 26, 2007, Colorado Citizens Against Toxic Waste (CCAT) and Rocky Mountain Clean Air Action filed a lawsuit against EPA (EPA-HQ-OAR-2008-0218-0013) for EPA’s alleged failure to review and, if appropriate, revise NESHAP Subpart W under CAA section 112(q)(1). A settlement agreement was entered into between the parties in November 2009 (EPA-HQ-OAR-2008-0218-0020, 0021).

⁵ Annual emissions of radon from a 40-acre impoundment, assuming a radon flux of 20 pCi/m²-sec, can be calculated to be approximately 2.5 Ci. The specific activity of radon is about 150,000 Ci/g. Reasonably anticipated emissions from sources subject to Subpart W do not approach the 10 tpy threshold established in CAA § 112(a)(1) to define major sources.

⁶ Pursuant to the Atomic Energy Act of 1954, as amended, the Nuclear Regulatory Commission defines “source material” as “(1) Uranium or thorium or any combination of uranium or thorium in any chemical or physical form; or (2) Ores that contain, by weight, one-twentieth of one percent (0.05 percent), or more, of uranium or thorium, or any combination of uranium or thorium” (10 CFR 20.1003). For a uranium recovery facility licensed by the Nuclear Regulatory Commission under 10 CFR part 40, “byproduct material” means the “tailings or wastes produced by the extraction or concentration of uranium or thorium from ore processed primarily for its source material content, including discrete surface wastes resulting from uranium solution extraction processes” (10 CFR 20.1003 and 40.4.)

these impoundments are subject to Subpart W until they begin closure.

The second standard applied to “new” impoundments constructed after December 15, 1989. The requirements applicable to new impoundments were work practice standards that regulated either the size and number of impoundments, or the amount of tailings that may remain uncovered at any time. After December 15, 1989, “no new tailings impoundment can be built unless it is designed, constructed and operated to meet one of the following two work practices:

1. Phased disposal in lined tailings impoundments that are no more than 40 acres in area and meet the requirements of 40 CFR 192.32(a) as determined by the Nuclear Regulatory Commission. The owner or operator shall have no more than two impoundments, including existing impoundments, in operation at any one time.

2. Continuous disposal of tailings such that tailings are dewatered and immediately disposed with no more than 10 acres uncovered at any time and operated in accordance with § 192.32(a) as determined by the Nuclear Regulatory Commission.”

The basis of the work practice standards was to (1) limit the size of the impoundment, which limits the radon source; or (2) use the continuous disposal system, which prohibits large accumulations of dewatered uncovered uranium byproduct material or tailings, limiting the amount of radon released.

D. What changes to Subpart W did we propose?

Pursuant to CAA Section 112(d)(5), in the May 2, 2014 notice we proposed GACT-based standards for the affected sources at conventional uranium mills, ISL facilities and heap leach facilities. Subpart W has always applied to these sources; however, given the evolution of uranium recovery facilities over the last 20 years, we thought it appropriate to revise Subpart W to tailor the requirements of the NESHAP to the different types of facilities in existence at this time and reaffirm Subpart W’s applicability to these facilities. For the conventional impoundments the GACT-based standards were based upon the requirements established in 1989. We also proposed to revise Subpart W to add appropriate definitions, standards and other requirements that are more applicable to HAP emissions at these different types of uranium recovery facilities. Specifically, we proposed to:

- Remove monitoring requirements for impoundments constructed prior to December 15, 1989 and to have these “existing” impoundments demonstrate

compliance with the proposed GACT-based standards;

- clarify that any impoundment at a uranium recovery facility that contained uranium byproduct materials or tailings is regulated under Subpart W and subject to the liner requirements referenced at 40 CFR 192.32(a)(1), including “evaporation” or “holding” ponds;

- establish as GACT-based standards that these “non-conventional” or liquid-holding impoundments meet the design and construction requirements of 40 CFR 192.32(a)(1), with no size/area restriction or monitoring requirement, and that during the active life of the pond at least one meter of liquid be maintained in the pond;

- establish as GACT-based standards that heap leach piles meet the phased disposal management practice standard (which limits an owner/operator to no more than two operating heap leach piles of no more than 40 acres each at any time) and the design and construction requirements at 40 CFR 192.32(a)(1) as GACT-based standards, and maintain minimum moisture content of 30%;

- add a definition of “standby” to clarify the term and how it relates to the operational phase of an impoundment;

- amend the definition of “operation” of an impoundment so that it is clear when the owner or operator is subject to the requirements of Subpart W;

- add definitions of “conventional impoundment,” “non-conventional impoundment,” “heap leach pile,” “uranium recovery facility” and “heap leach pile operational life” to be consistent with the GACT-based standards;

- determine whether Subpart W adequately addresses protection from extreme weather events;

- revise 40 CFR 61.252(b) and (c) to accurately reflect that it is only 40 CFR 192.32(a)(1) that is applicable to Subpart W; and

- remove the phrase “as determined by the Nuclear Regulatory Commission” in 40 CFR 61.252(b)(1) and (2).

E. Comments on the Proposed Rule

The public comment period began on May 2, 2014 and was originally proposed to end on July 31, 2014. The comment period was extended by public request until October 29, 2014. We held two days of public hearings in Denver, CO on September 4 and 5, 2014. During the public comment period for the proposed rule, the EPA met with tribal leaders from the Ute Mountain Ute Tribe, consistent with the “EPA Policy on Consultation and Coordination with Indian Tribes”

(<http://www.epa.gov/tribal/forms/consultation-and-coordination-tribes>).

The consultation was held on July 10, 2014. The Tribe had numerous comments regarding the White Mesa uranium mill. Tribal land is several miles from the mill. The mill is the only operating conventional mill in the country, and the Tribe presented valuable information and comments for the rulemaking. The Tribe also raised enforcement issues that are concerns for the State of Utah and the EPA Region 8 office, but are not relevant to this rulemaking. The EPA has delegated to the State of Utah authority for implementation and enforcement of Subpart W (60 FR 13912, March 15, 1995).

The EPA received approximately 45 separate sets of comments on the proposed rule, including multiple submittals by the same author(s). The comments range in size from one page to several hundred pages, and in many cases contain dozens of individual comments. All told the EPA identified over 4,000 individual comments. A mass mailer that contains over one thousand signatures is also in the docket for this rulemaking (Docket No. EPA–HQ–OAR–2008–0218). The docket also includes the transcripts of the two public hearings held in Denver, CO on September 4 and 5, 2014. All of the comments received are in the docket for this rulemaking. All comments can be accessed electronically through the Federal Document Management System (FDMS), available at <http://www.regulations.gov>. This Web site provides instructions on how to access the electronic docket. Some submittals may be duplicated in FDMS, as a commenter may have used several methods to ensure the comments were received, such as statement at a public hearing, fax, email, U.S. mail, or directly through FDMS.

There are two primary mechanisms by which we explain the issues raised in public comments and our reactions to them. First, we discuss broad or major comments in the following sections of this document. Second, we are including in the docket a document, accompanying this action, entitled “Summary of Public Comments and Responses.” The Response to Comments document addresses all other significant comments on the proposal. We gave all the relevant comments we received, whether written or oral, consideration in developing the final rule.

III. What final amendments are we issuing with this action?

This action finalizes the EPA’s determinations pursuant to its review of

Subpart W under CAA section 112(q)(1) to “review, and if appropriate, revise” NESHAPs promulgated prior to November 15, 1990. After review of the comments we determined that commenters provided reasons and presented information supporting revision to certain aspects of the proposed rule. In this section we describe the final amendments to Subpart W for this action and identify revisions made to the proposed rule in response to comments.

A. Application of Generally Available Control Technologies (GACT) to Uranium Recovery Facilities

We determined that the management practices promulgated in 1989 for conventional impoundments constructed after December 15, 1989 remain suitable for controlling radon from uranium byproduct material or tailings. We also concluded that these management practices qualify as elements of GACT-based standards for these impoundments. We further determined that there are management practices which constitute generally available control technologies that could be applied to non-conventional impoundments and heap leach piles. The final rule establishes the following elements as GACT-based standards for conventional impoundments constructed after December 15, 1989, non-conventional impoundments and heap leach piles:

- Construction of all impoundments containing or managing uranium byproduct material in accordance with the requirements in 40 CFR 192.32(a)(1);
- Operation of conventional impoundments in accordance with either the phased disposal or continuous disposal method;
- Operation of non-conventional impoundments such that solid materials in the impoundment are not visible above the liquid level, to be verified by daily visual inspection and documented by digital photograph no less frequently than weekly; and
- Maintenance of heap leach piles that have completed their operational life but have not yet entered closure in accordance with the phased disposal method (piles no larger than 40 acres in area and no more than two such piles at any time).

For conventional impoundments constructed before December 15, 1989, we retained the radon flux standard originally promulgated in 1989, and retained the requirement that the impoundments comply with the construction requirements in 40 CFR 192.32(a)(1), notwithstanding the exemption in § 192.32(a)(1) for

impoundments constructed prior to the promulgation of 40 CFR part 192.

B. Definitions, References and Conforming Editorial Revisions

We are making revisions to several existing definitions and references, deleting a phrase and providing several new definitions. These revisions are:

- The definition of “operation” is revised as proposed;
- The definitions of “continuous disposal,” “dewatered,” “existing impoundment,” and “phased disposal” are revised to conform to the revised definition of “operation”;
- Definitions of “standby,” “conventional impoundment,” “non-conventional impoundment,” “heap leach pile,” “uranium recovery facility,” and “heap leach pile operational life” are added as proposed, with minor conforming changes;
- The reference in the 1989 rule at 40 CFR 61.252(b) and (c) is revised to 40 CFR 192.32(a)(1), as proposed, to clarify that the liner requirements are the portion of interest; as finalized, the reference to 40 CFR 192.32(a)(1) is included in § 261.252(a)(2)(i), (a)(2)(ii), (b) & (c) and the reference at § 61.252(c) in the 1989 rule is incorporated into § 61.252(a)(1) in the final rule;
- The phrase “as determined by the Nuclear Regulatory Commission” is eliminated from 40 CFR 61.252(b)(1) and (2), as proposed (§ 61.252(a)(2)(i) and (ii) in the final rule);
- The definition of “final closure” is added for completeness and clarity, in response to comments regarding the applicability of Subpart W; and
- The definition of “reclamation plan” is added to further clarify the concept of closure.

C. What are the recordkeeping, notification and reporting requirements?

New and existing affected sources are required to comply with the existing requirements of the General Provisions (40 CFR part 61, subpart A). The General Provisions include specific requirements for notifications, recordkeeping and reporting, including provisions for notification of construction and/or modification and startup as required by 40 CFR 61.07, 61.08 and 61.09.

We are also requiring that all affected sources maintain certain records pertaining to the design, construction and operation of conventional impoundments, non-conventional impoundments and heap leach piles. These records must be retained at the facility and contain information demonstrating that the impoundments and/or heap leach pile meet the

requirements in 40 CFR 192.32(a)(1), including but not limited to, all tests performed that prove the liner is compatible with the material(s) being placed on the liner. For non-conventional impoundments, this requirement also includes records showing compliance with the requirement to maintain liquid in the impoundment such that solid materials are not visible above the liquid.⁷ Documents showing that the impoundments and/or heap leach pile meet the requirements in § 192.32(a)(1) are already required as part of the pre-construction application submitted under 40 CFR 61.07, so these records should already be available. Written and other records showing compliance with the liquid requirement for non-conventional impoundments can be created during the daily inspections of the tailings and waste retention systems required by the NRC (and Agreement States) under the inspection requirements of 10 CFR part 40, Appendix A, Criterion 8A.

Because we are retaining the radon flux standard for conventional impoundments in existence on December 15, 1989, we are also retaining the associated reporting requirements at 40 CFR 61.254 and these units must also comply with the revised recordkeeping requirements at 40 CFR 61.255, as applicable.

Because we are promulgating new recordkeeping requirements for uranium recovery facilities, we are required by the Paperwork Reduction Act (PRA) to prepare an estimate of the burden of such record-keeping on the regulated entity, in both cost and hours necessary to comply with the requirements. We have submitted the Information Collection Request (ICR) containing this burden estimate and other supporting documentation to the Office of Management and Budget (OMB). See Section VII.B for more discussion of the PRA and ICR.

We believe the record-keeping requirements promulgated today will not create a significant burden for operators of uranium recovery facilities. As described earlier, we are requiring retention of two types of records: (1) Records demonstrating that the impoundments and/or heap leach pile meet the requirements in § 192.32(a)(1) (e.g., the design and liner testing information); and (2) records showing that liquid is maintained to cover any

⁷ The liquid requirement pertains to having the level of liquid cover any and all solid uranium byproduct material or tailings. We do not anticipate a large quantity of solid uranium byproduct material or tailings in these non-conventional impoundments (EPA-HQ-OAR-2008-0218-0088).

solid uranium byproduct material or tailings present in non-conventional impoundments.

Documents demonstrating that the affected sources comply with § 192.32(a)(1) requirements are necessary for the facility to obtain regulatory approval from the NRC (or an NRC Agreement State) and the EPA to construct and operate the affected sources (this includes any revisions during the period of operations). Therefore, these records will exist independent of Subpart W requirements and will not need to be continually updated as a result of this record-keeping requirement in Subpart W; however, we are including this record-keeping requirement in Subpart W to require that the records be maintained at the facility and available for inspection during its operational lifetime (in some cases the records might be stored at a location away from the facility, such as corporate offices). This might necessitate creating copies of the original records and providing a location for storing them at the facility.

Keeping a record to provide confirmation that liquid is maintained above the solid uranium byproduct material or tailings present in non-

conventional impoundments should also be relatively straightforward. This would involve visual inspection and documentation, such as written notes and digital photographs with embedded date and time and other identifying metadata, using photographic capabilities that are readily available, such as smartphones or small digital cameras. As noted earlier, NRC and Agreement State licenses require operators to inspect the facility on a daily basis. Only minimal effort will be necessary to make observations of saturation and record the information in inspection log books that are already kept on site and available to inspectors. Inspections for saturation can occur during the daily inspections that are already required by NRC and Agreement States. The final rule requires that operators record written observations daily and collect photographic evidence of liquid depth no less frequently than weekly. Beginning on the effective date of this final rule, digital photographs are to be uploaded on at least a monthly basis to the EPA's Subpart W Impoundment Photographic Reporting (SWIPR) system. If that system is unavailable, digital photographs are to

be retained by the facility and provided to the EPA or the authorized state upon request.

The final rule also includes a definition of "final closure" that refers to notification by the facility owner/operator. Subpart W applies to operating sources used to manage uranium byproduct material or tailings. Sources cease to be operating when they enter the closure process. The definition of "final closure" in the final rule clarifies that closure does not begin until the owner or operator provides written notification to the EPA and the NRC that the impoundment or heap leach pile is no longer used for its operational purpose and is being managed under an approved reclamation plan for that impoundment or pile, or the facility closure plan. Such notifications should involve limited effort on the part of facility owners or operators. A reclamation plan is required by NRC regulation and is not a new requirement under Subpart W.

We estimate the burden in hours and cost for uranium recovery facilities to comply with the proposed recordkeeping and notification requirements are as follows:

TABLE 3—BURDEN HOURS AND COSTS FOR RECORDKEEPING REQUIREMENTS

[Annual figures except where noted]

Activity	Hours	Costs
Maintaining Records for the 40 CFR 192.32(a)(1) requirements	* 20	* \$1,430
Verifying saturation for non-conventional impoundments, including collecting and uploading digital photographs	291	14,650

* These figures represent a one-time cost to the facility.

IV. What is the rationale for our final decisions and amendments to Subpart W?

A. Legal Authorities and GACT

1. What is the legal authority for GACT based standards and management practices in the final rule?

Section 112(q)(1) of the CAA requires that NESHAPs "in effect before the date of enactment of the Clean Air Act Amendments of 1990 [Nov. 15, 1990] . . . shall be reviewed and, if appropriate, revised, to comply with the requirements of subsection (d) of . . . section [112]." The EPA promulgated 40 CFR part 61, subpart W, "National Emission Standards for Radon Emissions from Operating Mill Tailings," ("Subpart W") on December 15, 1989.⁸ The EPA conducted this

review of Subpart W under CAA section 112(q)(1).

Section 112(d) establishes the requirements for emission standards for HAP promulgated under section 112. It establishes different requirements for major sources and area sources. A major source is any stationary source that emits or has the potential to emit 10 tpy or more of any single HAP or 25 tpy or more of any combination of HAPs. An area source is a stationary source of HAP that is not a major source. See Sections II.B and IV.A.2 for discussion of area sources as they relate to Subpart W.

Pursuant to CAA section 112(d), standards for major sources "shall require the maximum degree of reduction in emissions of the hazardous air pollutants . . . that the Administrator . . . determines is

achievable." For area sources, the Administrator has the discretion under CAA section 112(d)(5) to set standards based on GACT in lieu of MACT. Specifically, CAA section 112(d)(5) provides that the Administrator may elect to promulgate standards or requirements for area sources "which provide for the use of generally available control technologies or management practices by such sources to reduce emissions of hazardous air pollutants."

Section 112(q)(1) does not dictate how the EPA must conduct its review of those NESHAPs issued prior to 1990. Rather, it provides that the Agency must review, and if appropriate, revise the standards to comply with the requirements of section 112(d). Determining what revisions, if any, are appropriate for these NESHAPs is best assessed through a case-by-case consideration of each NESHAP. In other rulemakings, the EPA has determined that GACT standards are appropriate for

⁸ On April 26, 2007, CCAT and Rocky Mountain Clean Air Action filed a lawsuit against the EPA (EPA-HQ-OAR-2008-0218-0013) for the EPA's alleged failure to review and, if appropriate, revise NESHAP Subpart W under CAA section 112(q)(1).

A settlement agreement was entered into between the parties in November 2009 (EPA-HQ-OAR-2008-0218-0020, -0021).

a number of different area sources, including, for example, industrial, commercial and institutional boilers (promulgated at 40 CFR part 63, subpart JJJJJ) and oil and natural gas production facilities (promulgated at 40 CFR part 63, subpart HH). Using a GACT evaluation, the EPA has historically established both emission standards and management practices, as appropriate.

As explained below, in this case, we have reviewed Subpart W and are revising the standards consistent with section 112(d)(5), which addresses standards for area sources. After our review, we determined it was appropriate to revise Subpart W to clarify the applicability of the rule to non-conventional impoundments and heap leach piles and promulgate standards that are more appropriate for controlling radon emissions at those sources. All units regulated by Subpart W are area sources and we determined that promulgating GACT-based standards under CAA section 112(d)(5) is appropriate for these sources. Consistent with section 112(q)(1) we are revising Subpart W to comply with the requirements in section 112(d) relating to emission standards for area sources and are thus revising the Subpart W standards to reflect GACT-based standards.

2. What key comments did we receive on our legal authorities and the GACT approach?

We received several comments challenging our use of GACT for this rulemaking. Commenters specifically asserted that the EPA may not set GACT-based standards for sources subject to Subpart W and challenged our conclusion that facilities subject to Subpart W are area sources.

Commenters further argued that the work practices instituted for conventional impoundments in 1989, which we are finalizing today as GACT-based standards, are contrary to CAA section 112(h), which allows the EPA to promulgate work practices in lieu of MACT standards only when “it is not feasible in the judgment of the Administrator to prescribe or enforce an emission standard.”

We summarize below a number of comments received on this topic and present our responses. Additional comment responses on this topic appear in the Response to Comments document in the docket for this rulemaking.

Comment: A commenter argued that uranium recovery operations should be considered, by definition, major sources of hazardous air pollutants and should be subject to major source requirements. The commenter further stated that the

EPA’s document Background Information for Proposed Area Source Standards is misleading because it uses the standard major source threshold at CAA section 112(a)(1), that any stationary source that emits or has the potential to emit 10 tpy or more of any single HAP or 25 tpy or more of any combination of HAPs, to support its conclusion that uranium recovery facilities regulated under Subpart W are area sources. The commenter stated that radon is not measured in tpy and that the CAA section 112 threshold of 10 or 25 tpy was not intended to apply to radon or other radionuclides.

Response: Under section 112(a)(1) of the CAA major sources are defined as stationary sources or groups of stationary sources that emit, or have the potential to emit, any single HAP at a rate of 10 tpy or more, or 25 tpy or more of any combination of HAP. An area source, in turn, is any stationary source of HAP that is not a major source. CAA section 112(a)(2). The statute also allows the EPA to establish lower thresholds, or for radionuclides to establish different criteria based on the characteristics of the air pollutant and relevant factors, but the statute is clear on its face that the EPA is not required to set alternative criteria. CAA section 112(a)(1). In the absence of alternative criteria, the statutory criteria of 10 tpy of a single HAP or 25 tpy of a combination of HAP applies, and any source that does not meet or exceed those thresholds is an area source. By allowing the EPA to set different criteria only for radionuclides, the statute implicitly recognizes that an alternative to the statutory thresholds based on tpy may be appropriate for sources of radionuclides. Nonetheless, the statute neither requires the EPA to set alternative criteria for defining major sources of radionuclides, nor obligates the EPA to designate any or all radionuclide sources as major sources. In sum, the statute explicitly leaves open the possibility that all sources of radionuclides will be regulated as area sources unless the EPA decides to establish alternate criteria. Moreover, even if the EPA had decided to set alternate criteria, nothing in the CAA would have required the EPA to establish criteria that would have the effect of making some sources that manage uranium byproduct material or tailings major sources of HAP. Thus, there is no basis for the commenter’s assertion that uranium recovery operations should be considered, by definition, major sources of HAP.

In addition, regulating sources that manage uranium byproduct material or tailings as area sources does not

constrain the EPA’s regulatory options. For area sources, the EPA can set GACT standards under CAA section 112(d)(5) or MACT standards under CAA section 112(d)(2). EPA’s decision to retain this flexibility by regulating these sources as area sources is reasonable and consistent with the discretion given to the EPA by the statutory text.

It is also worth noting that, under Subpart W, radon emissions from sources that manage uranium byproduct material or tailings are regulated regardless of whether they qualify as major or area sources. For source categories not regulated before 1990, the EPA has discretion to decide whether to list and thus whether to regulate area sources. Radon emissions from uranium byproduct material or tailings, however, were regulated prior to 1990 and CAA section 112(q) explicitly provides that such standards remain in force and effect after the effective date of the 1990 CAA Amendments. The distinction between major and area sources thus does not affect whether sources subject to Subpart W are regulated under CAA section 112. Nothing in CAA section 112(q)(1) or CAA section 112(d) limits EPA’s discretion to set standards under CAA section 112(d)(5), for sources regulated prior to the 1990 CAA Amendments whose emissions do not exceed the major source threshold established by Congress.

Comment: Commenters stated that the EPA must establish a source category pursuant to CAA section 112(c)(1) before promulgating CAA section 112(d) standards. One of these commenters cites to a 2007 EPA rulemaking which stated that listing pursuant to section 112(c) is a critical aspect and a condition precedent to issuing CAA section 112(d)(5) standards. Commenters also argued that the EPA must determine all HAPs present at uranium recovery facilities before the EPA can establish a source category, develop criteria to differentiate between major and area sources of radionuclides, and promulgate emission standards, whether MACT or GACT.

Another commenter asserted that because CAA section 112(q) requires pre-1990 regulations to be reviewed and, if appropriate, revised in accordance with the requirements of subsection (d), the revision must comply with all applicable requirements in CAA section 112, including all parts of CAA section 112 enacted as part of the 1990 CAA Amendments.

One commenter also argued that the EPA must establish a source category or subcategory before promulgating standards under CAA section 112(d)(5) for facilities licensed to manage

uranium byproduct materials. The comments state that the EPA has not complied with the requirements of CAA section 112 and has not taken the requisite preliminary actions and evaluations to support establishing revised standards for uranium recovery facilities, specifically GACT. Another commenter stated that the EPA has no basis for setting GACT standards in lieu of MACT standards.

Response: The EPA originally promulgated Subpart W in 1989, before Congress enacted the 1990 CAA Amendments. The 1990 Amendments introduced the requirement to list major and area sources of HAPs. See CAA sections 112(c)(1) & (c)(3), 42 U.S.C. 7412(c)(1) & (c)(3). The 1990 Amendments also added CAA section 112(q), which explicitly provides that section 112 standards in effect prior to the date of enactment of the 1990 CAA Amendments shall remain in force and effect after that date. CAA section 112(q)(1) also provides that: “Each [standard in effect before the enactment of the CAA Amendments of 1990] shall be reviewed and, if appropriate, revised to comply with the requirements of subsection (d) of this section . . .” In sum, Congress clearly intended that (1) standards promulgated prior to 1990 remain in effect; and (2) the EPA may update the standards, as appropriate. However, there is no indication that Congress intended to require that the EPA go through the process of listing source categories that were subject to regulations prior to 1990 and thus, effectively already “listed.” CAA section 112(c)(4) provides that, “The Administrator may, in the Administrator’s discretion, list any category or subcategory of source previously regulated under this section as in effect before November 15, 1990.” The EPA reviewed Subpart W pursuant to section 112(q)(1) and has not listed uranium recovery operations pursuant to section 112(c).

The EPA disagrees with the commenters’ assertions that the EPA must list the regulated source category pursuant to section 112(c) before revising the existing Subpart W. Section 112(q)(1), on its face, does not require the EPA to list such sources pursuant to subsection (c) as part of a section 112(q) review. It does not contain any cross reference to the listing provisions of section 112(c). Instead, section 112(q) requires revision, if appropriate, in accordance with subsection (d)—the subsection that governs standard setting under section 112. Moreover, section 112(c)(4) explicitly grants the Administrator discretion to decide whether or not to list categories and

subcategories of sources regulated under section 112 prior to the 1990 CAA Amendments. Thus, neither of the provisions addressing standards promulgated prior to the 1990 CAA Amendments, nor any other statutory provision, support the commenters’ assertion that listing under section 112(c) is a necessary part of a section 112(q) review.

There is also no basis for commenters’ statements that the EPA must determine all HAPs present at uranium recovery facilities and develop criteria to differentiate between major and area sources of radionuclides before it can promulgate emission standards, whether MACT or GACT. The EPA’s task under section 112(q) is to review and, if appropriate, revise standards in effect before the date of enactment of the 1990 CAA Amendments. Prior to the 1990 CAA Amendments, section 112 standards were promulgated for individual pollutants and Subpart W only establishes standards for radon resulting from management of uranium byproduct material or tailings at uranium recovery operations. The EPA’s obligation under section 112(q) therefore is limited to reviewing and, if appropriate, revising standards for radon resulting from management of uranium byproduct material or tailings at uranium recovery operations. The statutorily required review does not encompass listing the source category under section 112(c) or evaluating HAPs not previously regulated under the subpart being reviewed. As explained in the previous response, the statute also does not require the EPA to set alternate criteria for distinguishing between major and area sources of radionuclides.

The commenter’s reliance on a 2007 rulemaking is misplaced. In that rulemaking, the EPA promulgated NESHAPs for the first time for the identified source categories. The present rulemaking is governed by CAA section 112(q)(1), which only requires that the review and revision comply with the standard setting requirements of subsection (d). As explained above, the section 112(q)(1) review does not require listing the source category under section 112(c). The 2007 rulemaking set new standards and was not subject to the narrow review requirements of CAA section 112(q)(1). Further, CAA section 112(c)(4) explicitly provides the EPA with discretion regarding whether to list source categories regulated prior to the 1990 CAA Amendments. CAA section 112(c)(4) applies to the sources subject to Subpart W but was not applicable to the sources impacted by the 2007 rulemaking. For these reasons, the

statements made in the 2007 rulemaking are inapposite.

The commenter’s assertion that the EPA must revise Subpart W to comply with all provisions of section 112 is also based on an overly broad reading of CAA section 112(q)(1). The statute only instructs the EPA to “review[] and, if appropriate, revise[], to comply with the requirements of subsection (d) of this section . . .” It does not require the EPA to revise the pre-1990 rules to comply with every provision in the section 112 CAA Amendments of 1990. Indeed, to read section 112(q)(1) as requiring the EPA to revise the rules to comply with all provisions in section 112 would be to read the reference to subsection (d) out of the statute.

Finally, listing a source category under section 112(c) is not a pre-requisite to establishing GACT standards for area sources as part of a section 112(q) review. As explained in the previous response, section 112(d)(5) allows the EPA to set GACT instead of MACT standards for area sources. Specifically, CAA section 112(d)(5) provides that with respect only to categories and subcategories of area sources listed pursuant to section 112(c), the Administrator may, in lieu of setting standards under sections 112(d)(2) and 112(f), decide to promulgate standards based on generally available control technologies. Such standards are commonly referred to as GACT standards.

CAA section 112(d)(5) is ambiguous to the extent that it is not clear whether it provides that the EPA may set GACT standards “only” for “area sources” or whether it also prohibits the EPA from setting section 112(d)(5) GACT standards for area sources regulated under section 112 but not listed pursuant to section 112(c)—that is, area sources that are regulated pursuant to section 112 standards promulgated before the 1990 CAA Amendments but not added to the section 112(c) list. For the reasons explained below, the EPA does not interpret section 112(d)(5) as limiting its discretion to promulgate GACT standards as part of a section 112(q) review simply because the area source category has not been added to the section 112(c) list.

As an initial matter, the specific statutory provisions addressing section 112 standards that pre-dated the 1990 Amendments appear in sections 112(q)(1) and 112(c)(4). As discussed above, these provisions require the EPA to review and, if appropriate, revise such standards to comply with the requirements of subsection (d) and also establish that the EPA has discretion to decide whether or not to list source

categories under section 112(c). In the event of any conflict with other more general provisions in section 112, the more specific provisions of sections 112(q)(1) and 112(c)(4) govern.

The general standard setting obligation in section 112(d)(1) also provides helpful context. Specifically, CAA section 112(d)(1) states that “The Administrator shall promulgate regulations establishing emission standards for each category or subcategory of major sources and area sources of hazardous air pollutants listed for regulation pursuant to subsection (c) of this section . . .” Section 112(d)(1) grants the EPA authority to set emission standards under both section 112(d)(2) (MACT standards) and section 112(d)(5) (GACT standards). Like section 112(d)(5), it cross references the listing provision of subsection (c). Neither provision explicitly addresses how it applies in the context of a section 112(q) review. And neither provision explicitly overrides either the section 112(q) review requirements or the discretion granted to the Administrator under section 112(c)(4). Therefore, for standards promulgated prior to the 1990 CAA Amendments, it is reasonable for the EPA to interpret sections 112(d)(1) and (d)(5) to not require listing pursuant to § 112(c) before the EPA can review the standards under section 112(q)(1) and, if appropriate, revise them to comply with subsection (d). In contrast, if the EPA were to take the approach suggested by commenters, and read the cross references to subsection (c) in sections 112(d)(1) and 112(d)(5) as a limitation on the EPA’s authority under section 112(q) to revise standards to comply with subsection (d) it would be inconsistent with CAA sections 112(q)(1) and 112(c)(4).

Given the statutory context outlined above, for this CAA section 112(q)(1) review, it is reasonable for the EPA to interpret CAA section 112(d)(5) as restricting the EPA’s ability to set GACT standards to “only area sources,” but not prohibiting the EPA from setting GACT standards as part of a section 112(q) review simply because the area source category is not listed pursuant to subsection (c).

Comment: Several commenters argued that the EPA improperly proposed to promulgate design and work practice standards in lieu of emissions standards. Specifically, commenters stated that the EPA cannot promulgate design and work practice standards without the Administrator first making a finding pursuant to CAA section 112(h) that emission standards are not feasible. Commenters took the position

that the EPA has not and cannot make a finding pursuant to CAA section 112(h) that radon emissions standards are not feasible at uranium recovery facilities. These and another commenter assert that the EPA has not and cannot make the “not feasible” showing, so the EPA must promulgate an emissions standard.

One of these commenters stated that the EPA has no legal basis for the promulgation of a design, equipment, work practice, or operational standard, or combination thereof, in lieu of a radon emission standard, because design, equipment, work practice, or operational standards are meant to supplement, not replace, a standard that places specific numerical limitations on HAP emissions. The commenter also asserts that the EPA has no legal basis for eliminating the emission standard for existing mill tailings impoundments.

The other commenter pointed to text from the legislative history of the 1990 CAA Amendments and stated that work practice standards must achieve the same or greater level of emissions reduction as a numerical emission standard. The commenter argues that radon emissions will be higher under the GACT standards than they would be under a numerical emission standard and therefore the EPA should promulgate an emission standard.

Response: The EPA disagrees with these comments. The statute does not require the EPA to make a finding pursuant to CAA section 112(h) prior to promulgating management practices for area sources pursuant to section 112(d)(5). While section 112(d)(2) requires the EPA to make such a finding prior to setting work practice standards in lieu of an emission standard, section 112(d)(5) contains no such requirement.

Instead, CAA section 112(d)(5) provides the EPA with discretion regarding the type of standards it sets for area sources by permitting the EPA to set standards or requirements “which provide for the use of generally available control technologies or management practices” (42 U.S.C. 7412(d)(5)). The EPA determined that the management practices required in this final rule constitute generally available management practices and effectively control radon emissions from conventional impoundments constructed after December 15, 1989, non-conventional impoundments and heap leach piles.

Because CAA section 112(d)(5) provides the EPA with the option of establishing management practices, the EPA was not required to make a showing under CAA section 112(h) that an emissions standard is not feasible

before we set management practices. Further, CAA section 112 does not provide that management practices must supplement emission standards; the EPA may set management practices to control emissions pursuant to CAA section 112(d)(5).

With respect to existing conventional impoundments in existence on December 15, 1989, the EPA is retaining the emissions standard originally promulgated in 1989. During the comment period, the EPA learned that the information on which it relied when proposing to remove the emission standard requirement for existing conventional impoundments designed or constructed prior to December 15, 1989 was not accurate. Because the conventional impoundments in existence on December 15, 1989 are constructed in such a way that they are unable to comply with the standards being promulgated for conventional impoundments constructed after December 15, 1989, the EPA determined that it is appropriate to retain the emissions standard and monitoring requirement for conventional impoundments in existence on December 15, 1989. Because these units have been subject to a radon flux standard of 20 pCi/m²-sec since 1989, this method of compliance is generally available and effectively regulates radon emissions from these units.

The EPA evaluated all types of units regulated by Subpart W: Conventional impoundments in existence as of December 15, 1989, conventional impoundments constructed after December 15, 1989, non-conventional impoundments, and heap leach piles. Each type of unit has different characteristics. Also, not all units were subject to the same requirements at the time of their construction, and the feasibility of compliance with emissions standards and/or management practices also varies between types of units. The EPA took these variations into consideration when we conducted our GACT analysis for each type of unit. Because the three remaining conventional impoundments in existence as of December 15, 1989 were subject to different construction requirements than units constructed after that date, and are not amenable to the management practices established in 1989 for those newer units, different standards are appropriate.

The legislative history language referenced by the commenter is concerned with the stringency of work practice standards promulgated under CAA section 112(h), when an emissions standard is not feasible. This passage of the legislative history is not discussing

the stringency of management practices promulgated under CAA section 112(d)(5) and thus is not relevant. Further, the commenter's claim that radon emissions will be higher under the GACT-based standards than they would be under a numerical emission standard is speculative. The commenter has not shown that the management practices promulgated in Subpart W will not effectively result in the same emissions reductions that would be achieved if the EPA had set a MACT standard under CAA section 112(d)(2). The GACT-based standards finalized in the rule will effectively control radon emissions from uranium byproduct material or tailings.

Comment: Several commenters challenged the EPA's authority to regulate impoundments associated with management of process liquids or effluents, referred to as non-conventional impoundments in the Subpart W rulemaking. One commenter submits that Subpart W does not apply to evaporation ponds at currently operating and future operating uranium recovery facilities, specifically in-situ facilities, because of the significant amount of process or waste water present. This and another commenter assert that evaporation ponds should not be regulated in Subpart W because the liquid cover substantially eliminates radon emissions. The second commenter further supports excluding evaporation ponds because the original 1989 rulemaking stated that science did not support the EPA exercising jurisdiction over fluid retention impoundments.

This commenter similarly argues that the EPA has no legal or regulatory bases to apply Subpart W to evaporation ponds at uranium recovery facilities. Further, the commenter states that after 20 years of consistent interpretation that Subpart W is only applicable to uranium mill tailings impoundments, the EPA is now asserting that Subpart W applies to evaporation ponds at in-situ recovery and conventional mill tailings facilities. The commenter argues that the EPA's position is inconsistent with the language and the rulemaking history associated with Subpart W since the regulations discuss uranium mill tailings "piles" and the rulemaking record states that the radon cover requirements in Subpart W's work practice standards are not intended to apply to such fluid retention impoundments.

The commenter also challenges that evaporation ponds are not covered by Subpart W because the specific examples in the regulations do not include evaporation ponds.

Another commenter argues that the liquid impoundments should not be regulated as tailings impoundments and should not be subject to 40 CFR part 192.

Alternatively, one commenter supported the EPA's confirmation that ISL facilities and liquid impoundments are subject to the EPA's CAA NESHAP jurisdiction. The commenter also stated that where the rule does not include emissions limits confirmed by monitoring and reporting requirements, the EPA has not carried out its CAA duty to minimize or eliminate radon emissions.

Response: Non-conventional impoundments (which include evaporation and holding ponds) are associated with all types of uranium recovery facilities, but especially ISL facilities. Non-conventional impoundments receive liquids containing uranium byproduct material or tailings from conventional milling, ISL operations or heap leach piles and the uranium byproduct material or tailings may be suspended or dissolved in the liquids. Some portion of the material will precipitate out and settle on the bottom of the impoundment. In fact, the liquid itself constitutes uranium byproduct material or tailings because it is a waste from the concentration or extraction process.

Commenters' arguments that the EPA lacks authority to regulate non-conventional impoundments lack merit. As an initial matter, commenters do not and could not support their assertion that the EPA lacks legal authority to regulate these impoundments. Radionuclides, including radon, are listed as HAPs in CAA section 112(b)(1), and the EPA has authority under sections 112(d) and 112(q) to regulate radionuclide emissions from sources that manage uranium byproduct materials or tailings.

In addition, commenters' alternate arguments, that these impoundments are not currently and should not be regulated by Subpart W, are incorrect. As promulgated in 1989, Subpart W requirements specifically apply to the structures at the uranium recovery facilities that are used to manage or contain the uranium byproduct material or tailings during and following the processing of uranium ores. 40 CFR 61.250. Common names for these structures may include, but are not limited to, impoundments, tailings impoundments, evaporation or holding ponds, and heap leach piles. However, the name itself is not important for determining whether Subpart W requirements apply to that structure; rather, applicability is based on what

these structures contain. Uranium byproduct material or tailings produced by ISL is covered by the definition of uranium byproduct material or tailings included in the 1989 Subpart W NESHAP, which is not altered by this final rule.

The EPA understood that there was previously some confusion regarding the applicability of Subpart W to different units that manage uranium byproduct material or tailings, including impoundments and evaporation ponds at ISL facilities (non-conventional impoundments) and heap leach facilities. The EPA also acknowledges that the provisions of the 1989 rule applied imperfectly to these units. The industry is shifting toward ISL as the dominant method of uranium recovery and, while it is not expected to be as significant a source of radon emissions as conventional impoundments, it is reasonable for the EPA, as part of this section 112(q) review, to clarify that the standards in Subpart W apply to non-conventional impoundments. To eliminate any potential confusion, the final rule reaffirms that Subpart W continues to regulate radon emissions from all management of uranium byproduct material or tailings at uranium recovery facilities. Subpart W has always applied to these units; this final rule clarifies that applicability and confirms that these impoundments are covered by Subpart W by establishing management practices tailored to non-conventional impoundments.⁹

The EPA has authority to interpret its own regulations, *Auer v. Robbins*, 519 U.S. 452 (1992), and may clarify its interpretation when justified. In this rulemaking, the EPA did not revise its interpretation of Subpart W, rather we clarified the applicability of the regulations. Moreover, the EPA also provided notice and opportunity for comment on these clarifications.

Commenters incorrectly state that evaporation ponds are not covered by Subpart W because evaporation ponds are not used as an example in the regulation. Similarly, commenters' claims that the radon cover requirements are not intended to apply

⁹Note that the BID supporting the 1989 final rule stated: "The licensed uranium mill tailings source category comprises the tailings impoundments and evaporation ponds created by conventional acid or alkaline leach processes at uranium mills licensed by the Nuclear Regulatory Commission (NRC) or the Agreement States" (BID Volume 2, Risk Assessments, EPA/520/1-89-006-1, page 9-1, emphasis added). The risk assessment evaluated the contribution of evaporation ponds to total radon emissions at some, but not all, of the operating and standby mills. If allowed to dry out, evaporation ponds could represent a non-negligible portion of the overall radon emissions subject to control under Subpart W. See Tables 9-2, 9-3, 9-28.

to fluid retention impoundments is inaccurate.¹⁰ As explained previously, the determining factor of whether evaporation ponds are subject to Subpart W and whether the radon cover requirements apply is whether the unit contains uranium byproduct material or tailings. Since promulgated in 1989, Subpart W has applied to facilities licensed to manage uranium byproduct material or tailings; units that manage uranium byproduct material or tailings must comply with the applicable GACT-based standard.

In addition, to the extent commenters are challenging the EPA's interpretation of the applicability provisions in 40 CFR part 192, such comments are beyond the scope of this rulemaking and the EPA has no obligation to respond. This rulemaking addresses only Subpart W. The EPA's May 2, 2014 proposal did not reopen or take comment on any aspects of part 192. The applicability provisions of part 192 appear at 40 CFR 192.00. Subpart W does not expand the scope of applicability of part 192 as liners meeting the requirements at 40 CFR 192.32(a)(1) are already mandated by other regulations (79 FR 25407).

In response to one commenter's argument that Subpart W should not regulate evaporation ponds at ISL facilities because of the amount of water present in the ponds, the EPA disagrees. While the EPA agrees that the presence of sufficient liquid significantly reduces the radon emissions, that is not itself a reason to exclude evaporation ponds from regulation as a pond may still contain uranium byproduct material or tailings, which have the potential to emit radon. As stated above, the presence of uranium byproduct material or tailings in the pond determines whether the pond is regulated by Subpart W. The management practices the EPA is promulgating in Subpart W ensure that the radon emissions are continuously effectively controlled. The EPA requires that owners and operators of non-conventional impoundments ensure that the uranium byproduct material or tailings remains saturated, meaning that the material is covered in liquid, which will effectively control

radon emissions from these impoundments.

The EPA acknowledges and appreciates the commenter's support of the EPA's clarification that uranium in-situ leach facilities are subject to Subpart W. The EPA's response to the comment regarding the requirement to establish emissions limits confirmed by monitoring and reporting requirements is contained in the response to the previous comment.

Comment: Commenters questioned the appropriateness of including groundwater protection requirements in a NESHAP promulgated under the CAA since they do not affect air pollution. Further, one commenter added that the rule is unnecessary because it is designed to regulate HAPs yet it incorporates groundwater protection standards. The commenters stated that the additional requirements for fluid retention impoundments imposed by the imposition of 40 CFR 192.32(a)(1) and, by extension 40 CFR 264.221, are not justified.

Both commenters asserted that if the NRC believed that the imposition of the part 192 requirements were justified, the NRC would have explicitly referenced 40 CFR 192.32(a)(1) and by extension 40 CFR 264.221 in 10 CFR part 40 Appendix A, but it does not.

Alternatively, another commenter asserted that the EPA cannot allow a situation where the reduction of radon emissions comes at the expense of increased pollution of the groundwater or surface water. The commenter is concerned that the rule works at cross-purpose with 40 CFR part 192.

Response: The EPA may evaluate the non-air quality impacts of rules issued under CAA section 112. CAA section 112(d)(2) explicitly provides that the EPA has authority to consider non-air quality health and environmental impacts when promulgating standards under that section. For area sources, the EPA may promulgate standards under CAA section 112(d)(5) in lieu of CAA section 112(d)(2). Since the CAA provides for the EPA to consider such impacts under CAA section 112(d)(2), it is reasonable for the EPA to consider such impacts under CAA section 112(d)(5). Further, the CAA does not prohibit the EPA from considering non-air quality health and environmental impacts for CAA section 112(d)(5) standards. Additionally, we believe the Legislative History of the CAA Amendments of 1990 provides for the EPA generally taking environmental protection into account when promulgating standards for area sources (Senate Report Number 101-228, December 20, 1989).

Subpart W does not regulate groundwater or establish groundwater protection standards. Groundwater contamination is controlled by pre-existing regulations prepared under the Uranium Mill Tailings Radiation Control Act of 1978 (UMTRCA). During Subpart W rule development, the EPA considered the other regulations that impact sources subject to Subpart W and understood that surface impoundments subject to Subpart W are also subject to the standards in 40 CFR part 192 and part 264, subpart K. The part 192 groundwater protection regulations and liner requirements independently apply to the units subject to Subpart W. Through part 192 and part 264, subpart K, requirements were already in place at the time Subpart W was originally promulgated to protect groundwater from sources that manage uranium byproduct material or tailings. As the EPA explained in 1986, "potential effects of various alternatives on ground water were considered as part of the analysis of the impacts of this rule, since EPA has a responsibility to consider the impacts that its rules may have on the total environment. In part, this is done to ensure that regulations do not control pollution in one environmental medium only to degrade another" (51 FR 34058-34059). See also 54 FR 51680.

The EPA has considered the potential effects on groundwater from industry practices under this rule. The EPA also considered the separate, already existent, groundwater protection requirements when initially developing Subpart W. The EPA recognized that if water cover is maintained or expanded in order to limit radon emissions to the atmosphere, the potential for impacting groundwater increases because of the greater hydraulic head. It thus reasonably considered the extent to which existing requirements would limit potential groundwater impacts in determining reasonable management practices to limit radon emissions to the ambient air.

Additionally, the liner requirements have a direct connection to the effectiveness of Subpart W in limiting radon emissions from uranium byproduct material or tailings. It is well established that moisture reduces the rate of radon emanation. An unlined or poorly lined impoundment is more likely to lose moisture through the bottom of the impoundment. This not only increases the potential for ground water contamination, but increases the potential for the uranium byproduct material or tailings in the impoundment to dry out, thereby increasing radon emissions. Thus, the liner requirements

¹⁰ In amending 40 CFR part 192 pursuant to an MOU with NRC, EPA stated the following in response to comments that evaporation ponds should remain open after emplacement of the final radon barrier: "EPA reiterates that the Agency does not intend the expeditious radon cover requirements to extend to areas where evaporation ponds are located, even if on the pile itself, to the extent that such evaporation pond is deemed by the implementing agency (NRC or an affected Agreement State) to be an appropriate aspect to the overall remedial program for the particular site" (emphasis added) (58 FR 60354, November 15, 1993).

boost the impoundment's ability to retain moisture and continue to control radon emissions. Because the liner requirements directly relate to the effectiveness of controlling radon emissions by retaining moisture and because the EPA considered the existing groundwater protection standards when evaluating the non-air environmental impact of using water to control air emissions, it was appropriate to acknowledge those standards and incorporate them into Subpart W. Further, nothing in this final action expands the applicability of 40 CFR part 192 to sources that would not otherwise be covered by part 192. See also Section IV.F.1.b.

Comments on the NRC regulations contained in 10 CFR part 40 Appendix A are beyond the scope of this rulemaking and, in any event, the regulations in 10 CFR part 40 Appendix A speak for themselves. In 10 CFR part 40 Appendix A, the NRC references and recognizes that the standards promulgated by EPA in 40 CFR part 192 achieve the minimum level of stabilization and containment of the sites concerned and a level of protection for public health, safety, and the environment from radiological and nonradiological hazards associated with the sites. Additionally, 10 CFR part 40 Appendix A incorporates the basic groundwater protection standards imposed by the EPA in 40 CFR part 192 which apply during operations and prior to the end of closure. 10 CFR part 40 Appendix A requires groundwater monitoring to comply with these standards.

In response to the other commenter, the EPA considered the regulations that independently apply to sources subject to Subpart W. The EPA recognized that the scope of units required to operate with liners pursuant to part 192 is consistent with the Subpart W regulations. Subpart W does not lessen the effectiveness of part 192.

Comment: Commenters concurred with the EPA's authority under Section 112 of the CAA to regulate radionuclide emissions at holding or evaporation ponds at conventional mills, at ISL facilities and at heap leach facilities. However, the commenters contend that the EPA should not only regulate uranium byproduct material or tailings in conventional impoundments, liquid effluent ponds, and heap leach piles, but should also regulate the large amounts of radon emitted from wellfields and other parts of ISL operations. One commenter used the Smith Ranch-Highland operation in Wyoming as an example.

The commenters also advocated for the EPA expanding the scope of operations covered by Subpart W at heap leach facilities. Specifically, the commenters encouraged the EPA to regulate radon emissions from the time ore is placed on the pile, to the placement of a final radon barrier, including periods of standby, and time periods prior to and during the placement of lixiviant on a heap leach pile. The commenters also took the position that heap leach piles that are drying out should be subject to a radon emission standard.

Response: The EPA acknowledges and appreciates the commenters' concurrence with the EPA's authority to regulate radionuclide emissions at holding or evaporation ponds at conventional mills, at ISL facilities and at heap leach facilities.

When the EPA initially promulgated Subpart W in 1986, we identified radon as the radionuclide released to air that presented the highest risk at uranium recovery facilities and determined that units managing uranium byproduct material or tailings were the most significant source of radon emissions (51 FR 34056). Since 1986 and re-promulgation in 1989, Subpart W has only regulated units that manage uranium byproduct material or tailings at uranium recovery facilities (40 CFR 61.250). Other potential emission points in these facilities were not previously the subject of Subpart W regulation and were not assessed for the 1989 rulemaking. The EPA's CAA section 112(q) review of Subpart W was limited to the existing standard. Because Subpart W did not regulate other potential emission points, the EPA did not include any other potential emission points in its CAA section 112(q) review. In this final rule, the EPA continues to regulate the management of uranium byproduct material or tailings from conventional mills, from ISL facilities and from heap leach piles.

With respect to regulation of heap leach piles, the EPA similarly retained the scope of Subpart W's applicability to sources that manage uranium byproduct material or tailings from heap leach operations. The EPA determined that, for purposes of Subpart W, while lixiviant is being sprayed on heap leach piles, the piles are part of the milling process rather than an impoundment whose function is to manage uranium byproduct material or tailings. The final rule does, however, cover the other impoundments used to manage the uranium byproduct material or tailings associated with the heap leaching operation and covers the heap leach pile during the period between the

conclusion of processing and the day that final closure begins. See Section IV.D.

Comment: Several commenters stated that the NRC has exclusive jurisdiction over the radiological and non-radiological aspects of uranium mill operations and the nuclear energy business and that the EPA lacks jurisdiction, particularly once the NRC promulgates conforming regulations. Commenters question the need to retain Subpart W at all, with one commenter contending that the existence of the Atomic Energy Act (AEA) makes Subpart W redundant and not necessary.

One commenter takes the position that the EPA does not have authority to define when uranium recovery facilities are considered to be "active" or involved in "operations." Instead, the commenter states that the NRC, not the EPA, has authority over decommissioning and decontamination of AEA-licensed source material recovery facilities, including the mill itself, site soil cleanup, final tailings stabilization, and groundwater restoration or corrective action. Further, the commenter states it is inefficient for uranium recovery operations to obtain two separate authorizations with essentially the same requirements for radon risk from fluid retention impoundments (*i.e.*, the NRC operating license or license amendment and the EPA Subpart W construction approval), and that these duplicative requirements are inconsistent with the EPA's past efforts towards regulatory efficiency evidenced by the rescissions of 40 CFR part 61, subparts I and T.

Another commenter states the Department of Energy also has authority to regulate this industry.

Alternatively, some commenters supported the EPA's authority under the CAA to regulate HAPs, particularly radon, from uranium processing and do not believe that the CAA limits the EPA's regulatory authority with respect to 11e.(2) byproduct material¹¹ at uranium recovery mill operations. Similarly, a commenter supported the proposed clarification to 40 CFR 61.252(b) (§ 61.252(a)(2) in the final rule) that the EPA, and not the NRC, is the regulatory agency administering the radon NESHAP requirements.

Response: The EPA disagrees that it lacks authority to regulate, under CAA section 112, the radionuclide air

¹¹ UMTRCA amended the AEA definition of "byproduct material" by adding a second category. Section 11e.(2) byproduct material is "the tailings or wastes produced by the extraction or concentration of uranium or thorium from any ore processed primarily for its source material content."

emissions of sources also regulated pursuant to the AEA by the NRC. The CAA lists radionuclides as a HAP under CAA section 112(b)(1), and section 112(q) explicitly retains standards such as Subpart W that were in effect before the date of enactment of the CAA Amendments of 1990. In addition, UMTRCA resolves this issue by quite explicitly stating that “[n]othing in this chapter applicable to byproduct material . . . shall affect the authority of the [EPA] under the Clean Air Act of 1970, as amended . . .” (42 U.S.C. 2022(e)). The legislative history is similar: “Authorities of the EPA under other laws would not be abridged by the new requirements” (H. Rep. No. 1480, 95th Cong., 2d Sess. 6, p. 21). There is no indication that Congress intended UMTRCA to preempt the EPA’s regulatory authority under the CAA; rather Congress expressly contemplated the EPA authority to simultaneously regulate under both legislative schemes (54 FR 51690–51691). Similarly, the EPA’s regulation of the uranium processing industry works in concert with the AEA and the NRC’s regulations.

Comment: Some commenters stated that the NRC, not the EPA, has exclusive authority over the definition of 11e.(2) byproduct material, as well as the material itself. Commenters question the EPA’s authority to promulgate a new definition for “11e.(2) byproduct material” or to equate the definition to the term “mill tailings.” The commenters opine that the EPA may not infringe on NRC authority by proposing an alternative definition of 11e.(2) byproduct material.

One commenter also thinks that the EPA does not have statutory authority to define tailings as restoration fluid because that authority rests exclusively with the NRC.

Response: The EPA disagrees with these comments. The EPA has authority to regulate radon emissions and this authority is not limited by the AEA or the NRC. Radionuclides, including radon, are listed HAPs in CAA section 112(b). The EPA regulated radon emissions from uranium byproduct material or tailings impoundments before the list of HAPs in CAA section 112(b) was added as part of the CAA Amendments of 1990 and CAA section 112(q) explicitly retains standards that were in effect before the 1990 CAA Amendments were enacted. The EPA’s regulation of the uranium processing industry works in concert with the NRC’s regulation. The EPA has authority to promulgate definitions under the CAA as it deems appropriate and is not limited to the AEA’s

definition of “byproduct material” or “tailings,” or the NRC’s definition in 10 CFR 40.4. The EPA first defined “uranium byproduct material or tailings” when promulgating Subpart W in 1986 (51 FR 34066, September 24, 1986). The EPA’s definition identifies the scope of material covered by the Subpart W regulations and does not preempt the NRC’s AEA authority. The definition in Subpart W of uranium byproduct material or tailings is not substantially or meaningfully different from the NRC’s definition of byproduct material in 10 CFR 40.4 or the definition of 11e.(2) byproduct material and should not result in conflict. See also Section IV.F.2.

Regarding the question of restoration fluids, we note that the designation of restoration fluids as “waste produced by the extraction or concentration of uranium from any ore processed primarily for its source material content” is consistent with the approach taken by the NRC. See Staff Requirements Memorandum—SECY–99–013, “Recommendation on Ways to Improve the Efficiency of NRC Regulation at *In Situ* Leach Uranium Recovery Facilities,” July 26, 2000.

Comment: One commenter opposed comments of the regulated industry which argued that the EPA does not have authority to directly regulate radon emissions from uranium processing facilities. The commenter argued that the industry’s arguments amount to an argument the EPA lacks authority over emissions from uranium mill tailings impoundments. The commenter opined that if industry wishes to remove a tailings facility from NESHAP regulation, it should submit a petition showing that radon emissions are not hazardous, but believes that such an effort would fail. The commenter continued that the EPA’s proposed rule continues to recognize the health hazards of uncontrolled radon emissions from uranium mill tailings and the rulemaking record confirms that CAA NESHAP regulation is a necessary part of the EPA’s role in regulating uranium mill tailings pursuant to its CAA and UMTRCA authorities.

Numerous commenters supported the EPA’s decision to regulate radon emissions from uranium mill facilities. Specifically, two commenters state that the EPA has authority to regulate all radon at mills and another commenter confirmed that the EPA has a role in regulating uranium mill tailings. A third commenter stated that the EPA has authority to conduct radon flux measurements.

Response: The EPA acknowledges and appreciates these comments. The EPA

agrees that it has authority under the CAA to regulate radionuclide emissions from uranium byproduct material or tailings as radionuclides, including radon, are listed HAPs in CAA section 112(b)(1). Data confirm conclusively that radon-222 emissions, ambient concentrations, bioaccumulation or deposition of radon and its decay products cause adverse effects on public health and the environment.

B. Retaining the Radon Flux Requirement for Impoundments in Existence on December 15, 1989

1. How did we address the radon flux requirement in the proposed and final rules?

After reviewing stakeholder comments and verifying the information provided in them, we are not eliminating the radon flux standard of 20 pCi/m²-sec for all impoundments in existence prior to or on December 15, 1989. In the proposed rule, we provided information to show that the impoundments in existence prior to December 15, 1989 met the management practice requirements of impoundments constructed after that date (79 FR 25394). Since the conventional impoundments in existence prior to or on December 15, 1989 appeared to meet those management practice standards, we proposed that all conventional impoundments would be subject to the same management practices, regardless of the date of construction. We also proposed that all conventional impoundments (including those in existence prior to or on December 15, 1989) must meet the requirements of one of the two management practice standards, and that the flux standard of 20 pCi/m²-sec would no longer be required for any impoundments.

During the comment period we received information that led us to conclude that we had erred in stating an equivalency between the two types of impoundments. We originally stated that the Sweetwater and Shootaring impoundments had a double liner system equivalent to the impoundments designed after December 15, 1989. We were incorrect. Commenters¹² showed that the liner systems at these two facilities were not double liners. Additionally, we were originally informed that Cell 3 at the White Mesa facility would be closed by 2014. In fact,

¹² EPA–HQ–OAR–2008–0218–0151, –0153, –0155, –0162. To be clear, our error was in believing that these impoundments were constructed in a manner that allowed them to meet the more stringent standards that were put in place after they were constructed. The standards applicable to these impoundments at the time of the 1989 rulemaking did not require double liners.

it has not.¹³ After reviewing the information obtained during the public comment period, we concluded that these impoundments do not meet the management practice standards we proposed for impoundments constructed after 1989. Our analysis also showed that the impoundments in existence on December 15, 1989 can monitor radon emissions to determine compliance with the existing 20 pCi/m²-sec standard. It is a generally available management practice standard that successfully limits radon emissions from these area sources, as provided for in CAA section 112(d)(5). Therefore, we decided to retain the radon flux standard (20 pCi/m²-sec) and monitoring requirement for conventional impoundments in existence on or before December 15, 1989 as the applicable GACT-based management practice. Because the 1989 rule required these impoundments to comply with the requirements at 40 CFR 192.32(a)(1), we concluded that such a management practice is generally available and contributes to the control of radon emissions as described more fully in Section IV.A.2.

Some commenters also supported requiring compliance with the flux standard for all impoundments, including those not now subject to it, but we have concluded that to be unnecessary if the owner/operator of an impoundment follows the design and other management practices outlined in the GACT-based standard because these measures are expected to effectively control total radon emissions.

2. What did our updated risk assessment tell us?

As described in the preamble to the proposed rule, we updated the risk analysis we performed when we promulgated Subpart W in 1989 (79 FR 25395, May 2, 2014). We performed a comparison between the 1989 risk assessment and current risk assessment approaches, focusing on the adequacy and the appropriateness of the original assessments.¹⁴

Because we proposed to establish GACT-based standards to limit radon emissions from the management of uranium byproduct material or tailings at uranium recovery facilities, thereby eliminating any emissions standards and monitoring requirements, it was not necessary for us to update the risk assessment. GACT is not determined on the basis of risk. We conducted the

analysis to inform ourselves regarding the continued protectiveness of the radon flux standard as we considered whether the proposed GACT approach could be extended to impoundments in existence on December 15, 1989. We concluded that, even using updated risk analysis procedures (*i.e.*, using procedures updated from those used in the 1980s), the existing radon flux standard appears to be protective of the public health and the environment.

The updated risk assessment involved evaluating exposures to off-site (maximally exposed) individuals and populations from reported total site radon emissions at a number of uranium recovery facilities. In doing so, we found that the risks to individuals and populations were comparable to or lower than those estimated in the 1989 rulemaking. The updated risk assessment employed the most recent risk factors for radon inhalation, which are age-averaged to incorporate the sensitivity of children to radiation. The factors used in the 1989 risk assessment were based on exposures to adults.

This final rule retains the flux standard for conventional impoundments in existence on December 15, 1989. The updated risk assessment and our conclusion that the radon flux standard continues to be protective support our decision to retain the flux standard in the rule. The updated risk assessment is included in the Background Information Document (BID) for the final rule.

In developing the risk assessment and BID, we also conducted environmental justice analyses for the immediate areas (*i.e.*, counties) surrounding the existing and proposed uranium recovery facilities. For all of the sites considered together, the data did not reveal a disproportionately high incidence of minority populations being located near uranium recovery facilities. However, certain individual sites may be located in areas with high minority populations. Those sites would need to be evaluated during their individual licensing processes. The data also did not reveal disproportionately high incidence of low-income populations being located near uranium recovery facilities. We also considered environmental justice analyses that were performed during the EPA's review of construction applications under 40 CFR 61.08. These analyses were conducted by EPA Region 8 in connection with the Piñon Ridge Uranium Mill in Colorado and the Lost Creek ISL uranium project in Wyoming.

3. What key comments did we receive on the radon flux requirement?

We received comments stating that the monitoring requirements for impoundments in existence on December 15, 1989 should be retained and that our proposal was based on faulty information. We also received comments recommending that monitoring be extended to all impoundments. Some commenters supported lowering the flux standard.

Comment: Many commenters opposed the proposed elimination of the monitoring requirement for conventional impoundments in existence on December 15, 1989. Commenters expressed a general concern that no data would be available, but several also specifically questioned our rationale for doing so. They provided information indicating that the three "existing" (*i.e.*, pre-1989) impoundments would not be able to meet the work practice standards (now designated as GACT). By contrast, a few commenters supported eliminating the monitoring requirement based on the effectiveness of the management practices.

Response: We are retaining both the radon flux standard and the monitoring requirement for conventional impoundments in existence on December 15, 1989. Commenters provided information demonstrating that the conventional impoundments previously required to monitor radon emissions (*i.e.*, Cell 3 at the White Mesa Mill and the impoundments at Shootaring Canyon and Sweetwater) are unable to meet the GACT-based standards. Although we agree with the other commenters that the GACT-based standards are effective in limiting radon emissions, they were predicated on the impoundments meeting certain minimum requirements. Because comments included information demonstrating some conventional impoundments in existence on December 15, 1989 do not meet these minimum requirements or did not enter closure as the EPA expected, it is necessary and appropriate to retain the radon flux standard and monitoring requirement for these units.

Comment: A number of commenters expressed the view that monitoring should not be limited to conventional impoundments constructed before December 15, 1989. They asserted that they have little confidence that the management practices in place for newer impoundments are effectively being implemented, and argue that it is not possible to verify their effectiveness without monitoring. The commenters

¹³ EPA-HQ-OAR-2008-0218-0151, -0170.

¹⁴ "Risk Assessment Revision for 40 CFR part 61 Subpart W: Task 4—Detailed Risk Estimates," prepared by S. Cohen & Associates, November 2011, Docket No. EPA-HQ-OAR-2008-0218-0078.

also expressed concern that impoundments that are drying out (“dewatering”) are emitting larger amounts of radon, and that without monitoring the operators are not compelled to provide additional soil cover.

Response: The EPA reviewed the management practices prescribed for conventional impoundments constructed after December 15, 1989 and reaffirmed its determination that they effectively reduce radon emissions. The radon flux standard and monitoring requirement were instituted in the 1989 rulemaking to provide a means to control radon emissions from impoundments that were constructed and operated according to earlier industry practices. The EPA found that the management practices would represent a demonstrable improvement compared to those industry practices. The Agency has concluded that the appropriate action to satisfy its CAA review is to establish these management practices as GACT-based standards. We agree that operators need to take appropriate action to control radon during the period when the impoundment is operating, and not allow excessive drying during standby or other periods of limited activity. The management practices are intended to limit radon emissions. For conventional impoundments and heap leach piles, the management practices limit the exposed area and/or number of impoundments at a uranium recovery facility, which effectively limits the opportunity for radon emissions. For non-conventional impoundments, ensuring that the material is saturated will limit radon emissions by approximately 95% compared to dry materials.

Comment: Some commenters favored retaining the emissions standard for conventional impoundments constructed before December 15, 1989, but at a more stringent level. One commenter stated that a standard below 10 pCi/m²-sec would be appropriate, and also that a review of current control technologies would support a standard of 1 to 5 pCi/m²-sec. Another commenter noted that the 1989 Background Information Document found that a 6 pCi/m²-sec standard was achievable and cost effective. This general view was supported by other commenters, with one stating that the 20 pCi/m²-sec standard was established “for economic reasons.” One commenter also expressed concern that the EPA did not evaluate monitoring methods other than Method 115, and specifically referred to the Landauer RadTrak.

Response: Because the proposal involved eliminating all monitoring, the EPA did not evaluate the impacts of implementing other standards or monitoring methods. However, we did reaffirm that the 20 pCi/m²-sec standard remains protective, and we also find that Method 115 remains an appropriate method to measure radon emissions from conventional impoundments.¹⁵ We disagree with the characterization of the 20 pCi/m²-sec flux standard as based on economics. As stated in the preamble to the 1989 final rule, when determining an ample margin of safety for the rule, “As explained above, the risks from current emissions are very low. A NESHAP requiring that emissions from operating mill tailings piles limit their emissions to no more than 20 pCi/m²-sec represents current emissions. EPA has determined that the risks are low enough that it is unnecessary to reduce the already low risks from the tailings piles further” (54 FR 51680, December 15, 1989). The update of the 1989 risk assessment conducted for this rulemaking confirms that the risk to public health from uranium byproduct material or tailings managed at operating uranium recovery facilities is comparable to, if not lower than, the level of risk considered presumptively acceptable in the 1989 rulemaking. See Section IV.B.2.

C. GACT for Conventional Impoundments Constructed After December 15, 1989

1. How did we address conventional impoundments constructed after December 15, 1989 in the proposed and final rules?

We proposed to designate the management practices promulgated in the 1989 rulemaking for impoundments constructed after December 15, 1989 as GACT-based standards for all conventional impoundments. In doing so, we evaluated the reasoning used in the 1986 and 1989 Subpart W rulemakings to determine that the phased disposal and continuous disposal management practices protect public health with an ample margin of safety (54 FR 51681).

We initially defined these two management practices because they provided a means for newly-designed impoundments to limit radon emissions, either by limiting the overall size of the impoundment or by limiting the area of dried (dewatered) uranium byproduct material or tailings that can

be exposed at any time. We found the two management practices to improve performance (risk to exposed individuals and population) by approximately 35% to more than 50%, respectively, compared to earlier practices of constructing larger impoundments without limiting their number or the exposed area. The potential for larger impoundments or many smaller impoundments to remain uncovered and their radon emissions uncontrolled if bankruptcy prevented proper closure was considered to provide a further advantage to the two management practices (54 FR 51680).

Owners and operators of uranium recovery facilities in the United States have all used the phased disposal method for management of uranium byproduct material or tailings in conventional impoundments, making it a generally available management practice to control radon emissions. We have found no reason to believe that this method is unworkable, unreasonably burdensome or ineffective in limiting radon emissions. Keeping the uranium byproduct material or tailings wet or partially covered, as is typical practice, further reduces radon emissions. These industry practices also clearly demonstrate that the phased disposal method is a generally available technology. In addition, while there has been no use of the continuous disposal method in the United States, it has been successfully employed in other countries, and was proposed for use by some U.S. companies in the 1980s. Therefore, this final rule designates the phased disposal and continuous disposal methods as elements of GACT-based standards for conventional impoundments constructed after December 15, 1989. Because these impoundments are separately required to comply with the requirements at 40 CFR 192.32(a)(1), we concluded that such a management practice is generally available and contributes to the control of radon emissions as described more fully in Section IV.A.2. Conventional impoundments must also comply with the construction requirements in 40 CFR 192.32(a)(1).

2. What key comments did we receive on conventional impoundments constructed after December 15, 1989?

We received some comments questioning the effectiveness of the 1989 management practices and our decision to adopt those practices as GACT-based standards. These commenters argued that there is no basis for concluding that these practices are effective in limiting radon emissions when no confirmatory monitoring has been done. They further

¹⁵ “Report on the Review of Method 115 to Monitor Radon Emissions From Uranium Tailings,” prepared by S. Cohen & Associates, September 2008, Docket No. EPA-HQ-OAR-2008-0218-0122.

assert that the work practices were inadequate because practices that are actually effective in reducing radon emissions, such as maintaining a soil or water cover, were not elements of the 1989 work practices or the proposed GACT management practices.

Comment: Several commenters believe our GACT standards are unsupported because there is no monitoring data to demonstrate the effectiveness of the measures for post-1989 impoundments. Commenters criticize the analysis of control technologies in the BID prepared to support the proposal as flawed and insufficient. One commenter states that limiting the size of the impoundment is not in itself an effective means to limit radon emissions without monitoring, reporting, and the requirement of liquid or soil application. This and another commenter also believe that any new impoundments should be required to use the continuous disposal method, as the commenters view the phased disposal method as ineffective in controlling radon emissions, particularly when using water cover. The first commenter further disputes the reliance on 40 CFR 192.32(a)(1) as an effective control technology to limit radon emissions. Another commenter also suggests that the most effective control technology is an emissions limit coupled with monitoring, and believes the rule should be re-crafted along those lines.

Commenters also asserted that we have not sufficiently examined other technologies employed either in other countries or in related industries. One commenter argues that other technologies (e.g., dry-stack placement, paste tailings, solidification) may be superior to open-air storage and cover in conventional impoundments, but were not evaluated in the BID.

Response: Our review under CAA section 112(q)(1) focused on the management practices applicable to post-1989 conventional impoundments (i.e., continuous or phased disposal). However, as noted in the proposal, we also considered control technologies employed at other facilities in the same industrial sector and internationally. We found that the continuous and phased disposal methods adequately control radon emissions and meet the requirements for GACT—these management practices are generally available and effectively prevent adverse health impacts from radon emissions. We recognize the commenter's position that the design and engineering requirement in 40 CFR 192.32(a)(1) does not directly limit radon emissions. However, the design

requirement serves two purposes. Retaining moisture or maintaining liquid levels within the impoundment does effectively inhibit radon flux while at the same time preventing releases to ground water. It is possible and important to achieve both goals.

Regarding the area limitation, we disagree with the commenters. The focus of the 1989 analysis was on limiting the surface area from which radon would be emitted.¹⁶ Surface area is directly correlated with radon emanation—the smaller the surface, the lower the overall emissions, given similar materials. While the 1989 rulemaking clearly recognized that the use of soil cover or water are also effective in reducing radon emissions and were commonly employed by industry, the acceptability of the promulgated work practices was not predicated on those additional measures being employed, except to the extent that it was necessary to limit the exposed area when using the continuous disposal method.

Comment: Some commenters stated that the designation as an area source is not in itself sufficient to justify use of GACT. Commenters cite the legacy of contamination associated with the uranium industry as justifying the “strongest preventive measures.” Similarly, other commenters accuse the industry of “cutting corners” and believe GACT “runs counter to everything EPA knows” about past practices. Another commenter argues that the Agency’s “discretion” must be supported by full and complete explanation and justification. These and other commenters also believe the EPA has not sufficiently considered MACT approaches.

Response: When setting standards, the EPA aims to ensure that the promulgated standards effectively protect against adverse environmental and health impacts, regardless of whether such standards are based on GACT or MACT. For area sources, the Administrator has the discretion under CAA section 112(d)(5) to set standards based on GACT in lieu of setting MACT standards under sections 112(d)(2) and (d)(3), which is required for major sources. See Section IV.A.2 for discussion of regulating these units as area sources. Under CAA section 112(d)(5), the Administrator may elect to promulgate standards or requirements for area sources “which provide for the use of generally available control

technologies or management practices by such sources to reduce emissions of hazardous air pollutants.” Consistent with section 112(d)(5), we are revising Subpart W to reflect GACT-based standards. Based on the EPA’s evaluation of available information, the GACT-based approach in the final rule provides the necessary protections from management of uranium byproduct material or tailings. The emission standards and management practices established in Subpart W will appropriately reduce radon emissions from uranium recovery facilities.

D. GACT for Heap Leach Piles

1. How did we address heap leach piles in the proposed and final rules?

a. When are heap leach piles regulated under Subpart W?

We proposed to regulate the heap leach pile from the moment that uranium begins leaching from the ore pile. This approach was based on the view that uranium byproduct material or tailings is produced the moment the lixiviant passes through on its first pass and uranium begins to be leached from the ore (79 FR 25403). At the point of uranium movement out of the heap, what remains is uranium byproduct material or tailings as defined by 40 CFR 61.251(g). In other words, what remains in the heap is the waste produced by the extraction or concentration of uranium from ore processed primarily for its source material content. The heap leach pile manages that uranium byproduct material or tailings, even as the pile is further leached to extract uranium. The proposal placed the emphasis on the presence of uranium byproduct material or tailings in the heap leach pile.

We also requested comment on an alternative approach we described in the proposal (79 FR 25398). Under this approach, heap leach piles would not fall under Subpart W until after leaching is permanently discontinued. This approach is based on the view that, as long as the heap is being leached, the ore on the heap leach pad is being processed. While uranium byproduct material or tailings may exist in the heap, the heap does not become engaged in managing uranium byproduct material or tailings until leaching is permanently discontinued. This view places the emphasis on the continued extraction of uranium from the heap leach pile. Only after that extraction potential is exhausted, and only uranium byproduct material or tailings remains, would the pile fall under Subpart W.

Many commenters (primarily those from industry) supported basing the

¹⁶ “Either one of these technologies will ensure that future risks will be kept under control by assuring that *only small amounts of tailings are uncovered at any time*” (54 FR 51681 (emphasis added)).

final rule on this alternative view. These commenters argued that the heap leaching cycle is essentially serving the same function as the successive leaching of uranium that occurs in the leach and counter current decantation circuits of a conventional mill, where the ore pulp is successively leached in a series of leach tanks and thickeners. The material does not become uranium byproduct material or tailings (*i.e.*, waste) and fall under the requirements of Subpart W until it leaves the final thickener and is discharged to the tailings impoundment.

Although we proposed to bring the heap under the jurisdiction of Subpart W based upon the presence of uranium byproduct material or tailings within the pile, after further consideration we find the commenters' reasoning compelling and more consistent with previous application of the rule. Subpart W has historically not regulated radon emissions from the milling or extraction process, even at the intermediate points where residuals from uranium extraction make up the bulk of the material being processed, which may be the situation as processing of the heap progresses. Subpart W has regulated only the disposition of the wastes at the end of the separations process. Consistent with this precedent, the heap leach pile is like a conventional impoundment and will be subject to Subpart W once uranium extraction is complete and only uranium byproduct material or tailings remains. Until that time, the heap is considered to be either an unprocessed ore pile or a uranium recovery facility. Thus, heap leach piles are regulated by Subpart W only during the period between the end of processing (*i.e.*, after the pile's operational life) and the beginning of closure. As described in Section IV.F.1.a, and consistent with the requirements applicable to conventional and non-conventional impoundments, the final rule requires that operators provide written notification to the EPA and the NRC that the heap leach pile is being managed under an approved reclamation plan for that pile or the facility closure plan. Impoundments used to manage liquids resulting from the heap leach operation, to the extent they contain uranium byproduct material or tailings, are considered non-conventional impoundments subject to Subpart W, as defined in today's final rule.

There is a significant aspect of heap leach pile management that is important to these regulations. Several commenters from industry stated that a heap leach pile, unlike a conventional impoundment, will immediately begin

closure after processing has concluded (either closure in place, or possibly removal for placement in a conventional tailings impoundment). If that is the case, there will be no period when the heap is subject to the requirements of Subpart W. Because there are no heap leach facilities operating in the United States, we have no basis for disputing these statements of industry's intent. Nevertheless, we have concerns that these good intentions may prove insufficient to ensure that closure takes place as expeditiously as the commenters believe. There is some potential that heap leach piles will complete processing but not immediately enter closure. During such a period the owner or operator is only using the pile to manage uranium byproduct material or tailings, and the heap leach pile is then subject to the requirements of Subpart W. The specification in the final rule that final closure does not begin until the operator has provided a written notification to the EPA and the NRC will minimize the potential for confusion regarding the applicability of Subpart W. A further concern might be that operators continue "processing" the pile indefinitely, thereby postponing the costs associated with closure. This would be a matter for the NRC or NRC Agreement States to consider.

We recognize that heap leach piles will emit radon while they are being processed. However, as explained above, Subpart W has traditionally been applied to uranium byproduct material or tailings after exiting the extraction process. Thus, Subpart W has not been applied to other sources of radon at uranium recovery facilities where wastes are present, such as material in thickeners or other processing units. The NRC, or NRC Agreement State, regulates the radionuclide emissions from all sources at a uranium recovery facility. The operator is required to report particulate radionuclide and Rn-222 concentrations at the facility boundary. Thus, radon emissions from sources not covered under Subpart W, including those from the raw ore in heap leach piles or processed yellowcake, are captured by the NRC reporting requirements. However, we emphasize that the best way to control radon emissions from heap leach piles after they have completed processing is to expeditiously close them and install a permanent radon barrier.

b. Phased Disposal

As described in the preceding section, after reviewing comments, we have decided to require that heap leach piles conform to the standards for other

uranium recovery facility impoundments only during the period between processing (*i.e.*, after the pile's operational life) and closure. Heap leach piles meeting this description will conform to the GACT-based standard of phased disposal (piles that are 40 acres or less in area, and no more than two in this status at any time) and follow the construction requirements of 40 CFR 192.32(a)(1). We note that piles that will close in place would separately be required by NRC or Agreement State license to meet the construction requirements.

Since heap leach piles are in many ways similar to the design of conventional impoundments, the same combination of phased disposal management practices (limitation to no more than two heap leach piles that are no longer being processed but have not yet entered closure, each one no more than 40 acres in area) that limit radon emissions from conventional impoundments will also limit radon emissions from heap leach piles. Because this management practice is generally available for conventional impoundments, heap leach piles can control radon emissions through the same practice. We determined that phased disposal is a GACT-based management practice that will effectively limit radon emissions from these units. Use of the phased disposal management practice will limit the amount of exposed uranium byproduct material or tailings that can emit radon. Because these units will be separately required to comply with the requirements at 40 CFR 192.32(a)(1), we concluded that such a management practice is generally available and contributes to the control of radon emissions as described more fully in Section IV.A.2.

c. Regulating the Moisture Content of Heap Leach Piles

The third issue we are addressing is the proposed requirement for heap leach piles to maintain a 30% moisture content. In the proposal we recognized that owners and operators of conventional impoundments also limit the amount of radon emitted by keeping the uranium byproduct material or tailings in the impoundments covered, either with soil or liquids (79 FR 25398). At the same time, we recognized that keeping the uranium byproduct material or tailings in the heap in a saturated or near-saturated state (in order to reduce radon emissions) is not a similarly practical solution. In the definitions at 40 CFR 61.251(c) we have defined "dewatered" tailings as those where the water content of the tailings does not

exceed 30% by weight. We proposed to require operating heaps to maintain moisture content of greater than 30% so that the uranium byproduct material or tailings in the heap is not allowed to become dewatered, which would allow more radon emissions. We specifically asked for comment on the amount of liquid that should be required in the heap, and whether the 30% figure was a realistic objective.

After considering stakeholder comments and information, we conclude that it is physically impossible to maintain a 30% moisture content within the heap leach pile and have it remain stable.¹⁷ Calculations submitted by numerous commenters showed that maintaining a 30% moisture content across the heap leach pile would require the pile to be almost submerged. Further, such a condition would place a great amount of hydraulic head on the liner system, potentially causing failure. So, the final rule does not include the requirement to maintain 30% moisture content, even for the period between the end of processing and the beginning of closure, when the pile will be allowed to “dry” in preparation for placing a permanent radon barrier. We do encourage the NRC and facility operators to consider the appropriate use of soil and liquid to limit radon emissions from heap leach piles, as well as methods to reduce the potential for wind erosion (*e.g.*, by spraying or covering the pile when not actively being leached). However, we emphasize that the best way to control radon emissions from heap leach piles after they have completed processing is to expeditiously close them and install a permanent radon barrier.

2. What key comments did we receive on heap leach piles?

Comments submitted on heap leach piles focused on the proposed approach to regulation and the proposed requirement to maintain a 30% moisture content.

Comment: Most commenters on this topic disagreed with our proposal to regulate heap leach piles under Subpart W while they are being processed. These commenters expressed the view that material in the heap leach pile does not become uranium byproduct material or tailings until processing is complete, including a final rinse. As stated by one commenter, “Heap leaching is part of the milling process, and the proposed rules would interfere with such processing operations.” The commenter believes that, in essence, the heap leach

pile is analogous to the conventional mill, which we have not previously proposed to regulate under Subpart W.

Further, several of these commenters stated that heap leach piles will immediately enter into closure upon the cessation of processing, so there is no period when they are “operating” simply as uranium byproduct material or tailings management units. As a result, they see no time at which Subpart W can apply to heap leach piles.

Some commenters raised the distinction between “close in place” piles and “on-off” piles. Commenters explain that the latter operations involve the removal of the processed heap and placement in a conventional impoundment. In this case, the commenters agree that the uranium byproduct material or tailings from the heap, and the impoundment into which it is placed, would be subject to Subpart W.

Response: The final rule does not include requirements related to heap leach piles undergoing processing. We acknowledge the comments that indicate that uranium byproduct material or tailings is generated once processing begins. To ensure that heap leach piles are regulated consistent with other units subject to Subpart W, we conclude that the heap leach pile is, for purposes of Subpart W, more appropriately considered part of the milling process than as an impoundment whose function is to manage uranium byproduct material or tailings. In other words, while the pile may *contain* uranium byproduct material or tailings, the pile itself *is* the ore from which uranium is being extracted, and does not become a waste until that process is completed. The rule does, however, cover the other impoundments used to manage the uranium byproduct material or tailings associated with the heap leaching operation.

We appreciate the commenter’s description of the “on-off” heap leach piles and agree that if a processed heap is removed and placed in a conventional impoundment, that impoundment is subject to Subpart W.

We emphasize the importance of closing piles “as expeditiously as practicable considering technological feasibility” once processing concludes. Industry commenters provided assurances that there would be no untoward delay in beginning the closure process. We encourage NRC to ensure that this is the case. Closure is a more comprehensive system to assure that emissions are minimized for the long term. Once processing has ended, the

heap leach pile serves only as a uranium byproduct material or tailings management structure. Such a pile will be subject to Subpart W if the operator has not informed regulators that it is being managed under an approved reclamation plan. As set forth in the final rule, in such a situation, the phased disposal restrictions will apply (no more than two such piles at any time, with area no greater than 40 acres each). Heap leach piles subject to Subpart W must also comply with the construction requirements at 40 CFR 192.32(a)(1). Timely closure of heap leach piles will be better for public health than maintaining piles in an interim state in which they fall under Subpart W.

Comment: Some comments supported our proposed approach, and recommended that we establish an emissions standard and monitoring requirements for heap leach piles. These commenters agree that, because uranium byproduct material or tailings is generated within the heap leach pile at the time processing begins, the pile serves to manage that material during the operation of the facility. These commenters believe this function brings it under the scope of Subpart W. These commenters also take a more expansive view, and believe the EPA is obligated under the CAA to address the entire process at heap leach facilities in the final rule. In this approach, Subpart W would apply to ore stockpiles, ore crushing and heaps that are awaiting processing, as well as to the heap until placement of the final cover. One commenter further recommends that open-air heap leaching not be approved, when leaching can be conducted more safely and with lower emissions inside a designed enclosure.

Response: As stated in the response to the previous comment, Subpart W will not regulate heap leach piles while they are being processed (*i.e.*, during the heap leach pile’s operational life). We proposed to apply certain management practices to heap leach piles, but did not propose to establish a radon emission standard and monitoring requirements. Regarding the extension of Subpart W to ores and other similar materials, when the EPA initially promulgated Subpart W in 1986, we identified radon as the radionuclide released to air that presented the highest risk at uranium recovery facilities and determined that units managing uranium byproduct material or tailings were the most significant source of radon emissions (51 FR 34056). Since 1986 and re-promulgation in 1989, Subpart W has only regulated units that manage uranium byproduct material or tailings

¹⁷ EPA-HQ-OAR-2008-0218-0144, -0162, -0169, -0170.

at uranium recovery facilities. 40 CFR 61.250. Other potential emission points in these facilities were not previously the subject of Subpart W regulation and were not assessed for the 1989 rulemaking. The EPA's CAA section 112(q) review of Subpart W was limited to the existing standard. Because Subpart W did not regulate other potential emission points, the EPA did not include any other potential emission points in its CAA section 112(q) review. In this final rule, the EPA continues to regulate the management of uranium byproduct material or tailings from conventional mills, from in situ leach facilities and from heap leach piles.

Comment: A significant number of commenters raised objections to the proposed requirement that heap leach piles be maintained at 30% moisture content as a means to limit radon emissions. Calculations submitted by numerous commenters have shown that to maintain a 30% moisture content across the heap leach pile would require the pile to be almost submerged. The commenters broadly agreed that this is an unrealistic goal that could severely undermine the stability of the pile. Further, it would result in a significantly greater hydraulic head, which raises the risk of liner failure. Several commenters also consider the monitoring requirement to be difficult to implement. As with the proposal to maintain one meter of liquid in non-conventional impoundments, concern was also expressed regarding the source of the water. Commenters suggested that a simpler water balance, which would involve calculations of the amount of liquid entering and leaving the pile, would be a more implementable method of estimating moisture content.

Response: Recognizing the difficulties associated with maintaining a 30% moisture content across the heap leach pile, the final rule does not include a requirement related to the moisture content of heap leach piles. That being said, keeping the pile wet or covered will help reduce radon emissions. We encourage operators as well as the NRC and NRC Agreement States to consider methods that can be applied during the operational life of the heap leach pile.

E. GACT for Non-Conventional Impoundments

1. How did we address non-conventional impoundments in the proposed and final rules?

The purpose of non-conventional impoundments, also known as evaporation or holding ponds, is to manage liquids generated during and after uranium processing operations. We

proposed to require one meter of liquid to remain in the impoundment at all times (79 FR 25411). The liquid cover was proposed as a management practice that would limit radon emissions from the uranium byproduct material or tailings.

The Subpart W regulation as promulgated in 1989 did not clearly distinguish between conventional tailings impoundments and those operating as ponds (*i.e.*, those defined as "non-conventional impoundments" in this final rule). The proposed regulation intended to clarify this distinction.

For non-conventional impoundments, the proposed rule allowed for an unlimited number of units to be operating, with no size limitation, but required that a depth of one meter of liquid be kept above any precipitated solids (uranium byproduct material or tailings). The use of the word "liquid" is important here. Typically, operators divert process water to evaporation or holding ponds, where it may be recycled, treated, evaporated, or disposed by injection. Thus, it is likely that the liquid entering the impoundment will contain uranium byproduct material or tailings in solution or suspension. Some portion of this uranium byproduct material or tailings will settle out into sediments. In our proposal we did not specify that the one meter of liquid covering a non-conventional impoundment be fresh water; however, we did refer to "water" in the preamble, and the comments demonstrate that there has been some confusion about this point.

Various commenters described the cost of locating fresh water in the semi-arid and arid western portions of the United States in order to meet the one meter requirement. Other comments focused on the limitations in operational flexibility that a fresh water cover would create by changing the chemistry of a stream that is often recycled back into the extraction process, or noted that this requirement would require re-design of impoundments.

We recognize that this requirement could result in the need to use large volumes of water that may not be readily available in the arid to semi-arid areas in which most uranium recovery facilities operate. Even for facilities that maintain large volumes of process water in ponds, there would likely be some demand for fresh water as a supplement to maintain the required liquid level. Further, maintaining this level of liquid cover would result in placing significantly more hydraulic head on the liner systems for the impoundments, which is counter to existing state and

federal regulations and guidelines for operating these systems, as well as a concern to the Agency that the liner would be more susceptible to failure.

In light of these comments, we took a closer look at the proposed requirement. The best indicator of potential Rn-222 emissions during the impoundment's operating period is the concentration of Ra-226 in the liquid and sediment. The BID to support the 1989 rulemaking indicates that the Ra-226 concentrations in conventional uranium byproduct material or tailings is as much as an order of magnitude higher than evaporation pond sediments at the same uranium recovery facility (1989 BID Volume 2, Risk Assessments, EPA/520/1-89-006-1, Table 9-2, Docket No. EPA-HQ-OAR-2008-0218). We have recognized that keeping uranium byproduct material or tailings in conventional impoundments wet helps to limit radon emissions. Moreover, this management practice is used throughout the industry, even in arid regions, and can thus be considered "generally available." We have further recognized that the difference between uranium byproduct material or tailings that are saturated and those covered with one meter of liquid is negligible (79 FR 25398). Therefore, the final rule's requirement that solids remain saturated achieves the same goal as the proposed standard of maintaining a one-meter liquid cover.

Commenters also expressed concern over Rn-222 emissions resulting from Ra-226 dissolved in the liquid present in non-conventional impoundments, as opposed to solid materials in the bottom of the impoundment. A number of commenters questioned our conclusion that radon emissions from uranium byproduct material or tailings in non-conventional impoundments could be greatly reduced by keeping the solids saturated, and reduced to nearly zero by maintaining a liquid cover. The BID shows in Figure 12 that 100% saturated soil reduces radon emanation by nearly 95% compared to dry material, while one meter of liquid provides a further reduction of about 93%, or an overall reduction of greater than 99% (BID Equation 5.1).¹⁸ In either case, radon emissions from non-conventional impoundments would be controlled to levels that represent limited risk to public health. However, commenters argued that actual data on the liquid contents of non-conventional impoundments (primarily from the

¹⁸ See also "Risk Assessment Revision for 40 CFR part 61 Subpart W: Task 5—Radon Emissions from Evaporation Ponds," S. Cohen & Associates, November 2010, Docket No. EPA-HQ-OAR-2008-0218-0123.

White Mesa mill), when evaluated using a correlation in the updated risk assessment, showed radon emissions well in excess of 20 pCi/m²-sec.

We carefully evaluated the data and emissions analyses submitted by commenters. We determined that the data cited by the commenters did not support their conclusions. We conclude that our analysis in the proposal was correct regarding the characteristics of non-conventional impoundments and the radon attenuation that could be achieved. See Section IV.E.2 for more detail on this issue.

To summarize, we received comments that raise concerns regarding the economic and technical feasibility, as well as the practical effect, of specifying a liquid level for non-conventional impoundments. We further confirmed that keeping the sediments in a non-conventional impoundment at 100% saturation is nearly as effective as maintaining one meter of water (liquid) cover (Figure 12 in the BID for the final rule). The cost and logistics of maintaining a one-meter liquid cover in arid regions also favor maintaining saturation, especially given that saturation effectively controls emissions and will limit economic impacts.

We evaluated management practices in use at non-conventional impoundments in the industry that could achieve the goal of limiting radon-222 emissions from these units. These units are designed to hold liquid, and typically any uranium byproduct material or tailings contained in these impoundments is covered by liquid. Maintaining a liquid cover over the uranium byproduct material or tailings would effectively control radon and is a practice that is generally available to owners and operators of non-conventional impoundments. Therefore, we have revised the proposed rule language to indicate that the solids in a non-conventional impoundment must remain saturated at all times. In this final rule, we are establishing this condition, along with the liner requirements in 40 CFR 192.32(a)(1), as GACT-based standards for non-conventional impoundments. As noted above, this will reduce radon emissions by approximately 95% compared to dry conditions. We recognize that operators may still have to add water at times to ensure that the uranium byproduct material or tailings remain saturated, particularly during standby or high-evaporation periods. However, we anticipate that the need for additional water will be much less than would be necessary to maintain one meter of liquid. Because these impoundments are separately required to comply with the

requirements at 40 CFR 192.32(a)(1), we concluded that such a management practice is generally available and contributes to the control of radon emissions as described more fully in Section IV.A.2.

The final rule requires that visual evidence of saturation must be recorded and maintained by the owner/operator of the non-conventional impoundment, which we anticipate can be obtained using a smartphone or a digital camera during the routine daily inspections required by NRC regulations. Written observations must be recorded daily, with digital photographs to be taken at least weekly. Photographs including embedded metadata must be uploaded to the Subpart W Impoundment Photographic Reporting (SWIPR) Web site maintained by the EPA on at least a monthly basis, beginning on the effective date of this final rule.¹⁹ Until that time, and subsequently should the SWIPR site be unavailable, digital photographs must be maintained by the facility owner/operator and provided to the EPA or authorized State upon request. Should the operator determine that the liquid has fallen to a level that exposes solid materials, the operator must correct the situation within one week, or other such time as specified by the EPA or the authorized State. This provides flexibility if the operator needs to take the impoundment out of service for a longer period to address the situation, such as to repair the liner. Photographs must be taken that show conditions before and after the liquid level is adjusted to verify that appropriate corrective actions have been taken. There is no limit on the size or number of non-conventional impoundments.

2. What key comments did we receive on non-conventional impoundments?

We received a variety of comments related to non-conventional impoundments. Many were related to the proposed requirement to maintain one meter of liquid in the impoundment. Others related to the potential for radon emissions from liquids in the impoundments, and whether those risks were properly characterized.

Comment: Many commenters opposed the proposed requirement to maintain one meter of liquid in the impoundment. Commenters primarily cited cost and the logistical difficulty of obtaining and transporting water as

making this proposed requirement overly burdensome, particularly in the arid West. A few commenters noted that impoundments that had already been approved and operating were not constructed with a depth that could accommodate an additional meter of water, potentially necessitating costly renovation. Other commenters noted that this requirement would have effects on the facility operation, where it is necessary to manage evaporative or holding capacity, and to control the characteristics of liquids that may be recycled through the process. The additional stress on the impoundment liner was also raised.

Some commenters questioned the need for this requirement, and noted statements in previous rulemakings that the difference between saturation and one meter of water is negligible. Commenters further argued that non-conventional impoundments present a small risk in any case. A few commenters suggested that a better approach would be to require that solid materials in the impoundment remain saturated, with no solids visible above the liquid level.

Response: We recognize the concerns raised regarding maintaining one meter of liquid in non-conventional impoundments. Because we determined that radon emissions can be controlled if the solids in non-conventional impoundment remain saturated, the final rule does not include a requirement to maintain one meter of liquid in the impoundments. Instead, the final rule adopts the approach suggested by the commenters. Solid materials in the impoundment must remain saturated, with no solids visible above the liquid level. This will achieve a reduction of roughly 95% compared to emissions from dry material. Saturation must be documented by written and visual records, with digital photographs taken on at least a weekly basis. We disagree that the non-conventional impoundments present such a small risk that they need not be regulated under Subpart W.

Comment: Commenters find difficulties in measuring compliance with the proposed one meter liquid requirement. One commenter believes direct measurements will be difficult because of the density of sediments and may present health and safety risks to workers. The commenter suggests that calculations based on mass and liquid balances would be more effective. Another commenter makes a similar suggestion, that the one meter requirement be replaced with a calculation to take into account site-specific factors and give operators

¹⁹ SWIPR is accessed through the EPA's Central Data Exchange (CDX) (<https://cdx.epa.gov>). Information submitted to SWIPR is available to the public after review.

greater flexibility. A third commenter sees problems with the slope of the impoundment and the distance that must be observed, and notes that past experience suggests that measuring devices (such as pressure transducers) will need frequent maintenance and calibration. The commenter prefers to have a simple permanent indicator allowing visual confirmation, rather than measurement.

Response: We appreciate these comments and thoughtful suggestions. The final rule does not include a requirement to maintain one meter of liquid in the impoundments. Instead, the final rule requires that solid materials in the impoundment must remain saturated, with no solids visible above the liquid level. Although we proposed a one meter liquid cover, comments and further evaluation persuaded us that keeping solids saturated controls emissions nearly as effectively as maintaining a one-meter liquid cover. As explained in Section IV.E.1, we have recognized that keeping uranium byproduct material or tailings wet helps to limit radon emissions. We have further recognized that the difference between uranium byproduct material or tailings that are saturated and those covered with one meter of liquid is negligible. See Section IV.E.1 and 79 FR 25398.

Comment: Some commenters argue that the potential for radon emissions from non-conventional (liquid) impoundments has been greatly understated. They state that the general position taken by regulatory agencies (including the EPA) and industry that these impoundments represent a negligible source of radon compared to the solids in conventional impoundments is not supported by data. In particular, the commenters believe that radium in solution or suspension in the liquids has been overlooked as a potential source of radon, compared to solids or sediments in the bottom of the non-conventional impoundments. Commenters cited data from the 2013

and 2014 “Annual Tailings System Wastewater Sampling Report” submitted by Energy Fuels to the State of Utah to support this contention. Using radium data from liquid samples collected from Cells 1, 3, 4 and 4A at the White Mesa Mill and a correlation to radon flux from liquids in the EPA’s risk assessment to support the rulemaking (the “Task 5” report, Docket No. EPA–HQ–OAR–2008–0218–0123), the commenters calculate radon fluxes well in excess of 20 pCi/m²-sec (up to 2,317 pCi/m²-sec from Cell 1 in 2014). The commenters further note a significant increase in the radium measurements for three of the four impoundments from 2013 to 2014, likely attributable to evaporation and concentration of the radium in solution (Cell 3 showed a significant increase from 2012 to 2013, but dropped in 2014). They conclude that the risk to public health associated with radon emissions from non-conventional impoundments is much greater than the EPA has acknowledged.

Response: The EPA disagrees that the data provided by commenters support their conclusion that the liquids have been underestimated as a source of radon. First, the laboratory analyses included in the sampling report refer to “Total Alpha Radium” (or “Gross Radium Alpha”) and specify the analytical method as EPA Method 900.1.²⁰ This method cannot distinguish between different alpha-emitting isotopes of radium, which are all chemically identical. In addition to Ra-226, the isotope of concern that decays to form Rn-222, the sample may also contain Ra-224 (a decay product of Thorium-232) and Ra-223 (a decay product of Uranium-235). Because of the vast difference in their decay rates,²¹ Ra-224 and Ra-223 need be present in much smaller amounts (by mass) to have the same activity as Ra-226. For example, one gram of Ra-226 will have the same activity as about 6.25 micrograms (6.25 x 10⁻⁶ grams) of Ra-224. It is known that the White Mesa Mill has processed materials containing

Th-232, which makes it likely that Ra-224 is present in some amount. Given these sources of uncertainty, these results cannot definitively represent Ra-226 concentrations. Other sources of uncertainty could include interference from barium present in the liquid sample, as Method 900.1 relies upon precipitation with barium sulfate to separate the radium. Moreover, while Method 900.1 can essentially separate uranium from the sample, it is less effective at separating other alpha-emitting radionuclides, such as isotopes of thorium. Thus, some small amounts of uranium and thorium could solubilize and “carryover” into the precipitated sample, which would also affect the analysis. Given the numerous uncertainties associated with the data relied upon by the commenters, these data cannot reliably serve as a surrogate for Ra-226. Without specific isotopic analyses, which were not performed on the samples presented in the 2013 and 2014 reports, the actual Ra-226 concentrations cannot be determined.

The 2015 annual wastewater sampling report for White Mesa²² contains additional information to clarify this situation. Samples taken on two separate occasions from each of the cells (compared to the single sampling conducted in previous years) were analyzed not only for total alpha radium, but also for the isotope Ra-226, using EPA Method 903.1 (“Prescribed Procedures for Measurement of Radioactivity in Drinking Water,” Docket No. EPA–HQ–OAR–2008–0218). These results confirm that total alpha radium is not the correct basis for calculations of radon emissions. Table 4 below shows the 2015 results for Cell 1, compared to the 2013 and 2014 results that were cited by the commenters. Cell 1 has been in use since 1981, and has only been used to manage liquids (*i.e.*, no solids from the mill have been placed in it). It consistently shows among the highest levels of total alpha radium.

TABLE 4—MONITORING RESULTS FROM CELL 1 AT THE WHITE MESA MILL

	Total alpha radium (pCi/L)	Ra-226 (pCi/L)
2013	32,700	Not analyzed.

²⁰ “Prescribed Procedures for Measurement of Radioactivity in Drinking Water,” EPA–600/4–80–032, August 1980, Docket No. EPA–HQ–OAR–2008–0218.

²¹ Radium-226 has a half-life of 1,600 years, while Radium-224 and -223 have half-lives of 3.66 days and 11.43 days, respectively. EPA Method 900.1 has been used by drinking water systems to show compliance with the regulatory standard of 5 pCi/

L for combined Ra-226 and Ra-228, which is well below the activity found in effluents from uranium processing. Ra-228 is a pre-cursor of Ra-224 that decays by beta emission and has a half-life of 5.75 years. If the result is below 5 pCi/L using Method 900.1, there is no need for additional analysis. Half-life is the amount of time for one-half of the radionuclide to decay. Further, although Ra-223 and Ra-224 decay to form Rn-219 and Rn-220 (also

known as “thoron”), respectively, these isotopes of radon are also very short-lived (half-lives less than one minute each) and therefore are not considered to be of concern for exposures to the public.

²² Environmental reports for the White Mesa Mill are available from the Utah Department of Environmental Quality at <http://www.deq.utah.gov/businesses/E/energyfuels/whitemesamill.htm>.

TABLE 4—MONITORING RESULTS FROM CELL 1 AT THE WHITE MESA MILL—Continued

	Total alpha radium (pCi/L)	Ra-226 (pCi/L)
2014	331,000	Not analyzed.
2015 Sample 1	73,800	829.
2015 Sample 2	735,000	1,110.

Source: "2015 Annual Tailings System Wastewater Sampling Report," Energy Fuels.

The Ra-226 concentrations found in 2015 are consistent with historical data, also included in the sampling reports. For the period 1980–2003, the maximum concentration of Ra-226 recorded is 1,690 pCi/L, based on sampling from Cell 1, Cell 2, and Cell 3 (it is not specified which cell recorded the maximum concentration). Table 6 of the Task 5 report estimates that, based upon site-specific conditions at the White Mesa Mill, a Ra-226 concentration of 1,000 pCi/L in impoundment liquids would result in a radon flux of approximately 7 pCi/m²-sec. Using this correlation, the average radon flux from Cell 1 in 2015 would be slightly less than 7 pCi/m²-sec. The highest level of Ra-226 in 2015 from the other impoundments was 772 pCi/L in Cell 4A, which translates to a radon flux of about 5.4 pCi/m²-sec. Further, based on the maximum Ra-226 concentration recorded from 1980–2003, the calculated radon flux would be roughly 11.8 pCi/m²-sec. These results indicate that the radon flux from Ra-226 suspended or dissolved in liquids in the non-conventional impoundments at White Mesa is controlled to a level that is within the range that the EPA determined to be acceptable during the development of Subpart W, without taking additional measures.

These results are also consistent with information reported for liquid impoundments at ISL facilities (see Tables 7, 8 and 9 of the Task 5 report). They also suggest that the noteworthy fluctuations in recent years may not be directly attributable to the radium content of the liquids, but may result from the analytical method used. "Total" or "gross" analytical methods are generally considered screening tools whose results are more susceptible to other influences. Energy Fuels states that the individual isotopic analyses "show that the increasing gross alpha results are being caused by matrix interference due to the nature of the tailings solution and are not representative of gross alpha from radium concentrations in the solution" (Energy Fuels, 2015 annual wastewater sampling report, page 15). Similar fluctuations occurred for all the

impoundments (although, as noted earlier, Cell 3 showed a significant increase in 2013, with a decrease in 2014).

As an additional source of information, the facility's 2015 "Semi-Annual Effluent Monitoring Report" (July through December) provides radon monitoring data from air monitoring stations posted around the impoundments. The facility resumed monitoring for radon in 2013 and the data presented in Attachment J of the report show that emissions have been within the limits calculated to correspond to a 25 mrem annual dose for continuous exposure at each monitoring station. These limits serve as As Low As Reasonably Achievable (ALARA) goals for the facility.

In most cases, results are well below that level. The highest annual result (four consecutive quarters) can be seen for Station BHV-4, which is located directly south of the impoundments but still within the White Mesa facility boundary. A person located at this point during 2015 would have incurred a dose of approximately 16 mrem²³ (average quarterly results of roughly 0.31 pCi/L, compared to a calculated limit of 0.5 pCi/L). The single highest quarterly reading is listed at Station BHV-6, which is to the southeast of the impoundments at the facility boundary. The reading for the fourth quarter of 2013 is approximately 88% of the calculated limit (0.73 compared to 0.83, translating to a quarterly dose of about 5.5 mrem at that location). However, readings for the previous two quarters were recorded as zero and readings for the next quarters were significantly lower as well. There is fluctuation in these results as well, which depends to some extent on wind direction, but overall the results indicate that radon from the impoundments is not a significant public health concern.

Both the sampling data from the non-conventional impoundment cells and the radon data from the air monitoring stations at the White Mesa Mill support the EPA's conclusion that emissions

from the liquids in non-conventional impoundments represent a limited source of radon and does not support commenters' argument to the contrary.

Comment: Some commenters request clarification that Subpart W should not apply to impoundments that only contain water that has been treated to meet effluent limits. The commenters see this as having no regulatory benefit, but a potential additional cost to operators who must meet the more stringent requirements in 40 CFR 192.32(a)(1). Commenters also suggest we define a threshold level of radium or uranium content below which liquids no longer must be managed as uranium byproduct material or tailings.

Response: The purpose of Subpart W is to control radon emissions from sources containing uranium byproduct material or tailings at uranium recovery facilities. The EPA agrees that if an impoundment does not contain uranium byproduct material or tailings, it is not subject to the requirements of Subpart W. The EPA is not defining a concentration or level of radium or uranium at which treated liquids would no longer be considered uranium byproduct material or tailings. Instead, such impoundments can be identified and their status can be addressed during the construction application review under 40 CFR part 61, subpart A.

Subpart W also does not apply to impoundments constructed for the purpose of managing liquids generated by closure or remediation activities, when they are used solely for that purpose. Impoundments that do not contain uranium byproduct material or tailings resulting directly from uranium recovery operations are not considered to be non-conventional impoundments as defined in Subpart W.

However, non-conventional impoundments remain subject to the requirements of Subpart W until they enter final closure pursuant to an approved reclamation plan for that impoundment, even if at some point in their operational life they are used for the purpose of managing liquids from closure or remediation activities. EPA recognizes that non-conventional impoundments that are subject to

²³ Corresponding to an annual risk of fatal cancer of less than 1×10^{-5} . See Section 4 of the BID.

Subpart W may subsequently transition to a use that supports facility closure or site remediation (e.g., when an ISL wellfield enters into the groundwater restoration phase, and is no longer recovering uranium). Some parties may argue that a non-conventional impoundment's receipt of waste associated with facility closure or site remediation appears analogous to the ability of licensees to obtain a license amendment and have a reclamation plan which provides for placement of remediation wastes in conventional impoundments during the closure process. Using this analogy, some may contend that non-conventional impoundments should not be subject to Subpart W when receiving such wastes. However, such a non-conventional impoundment could later be used to manage liquids from uranium recovery operations at the next wellfield. To ensure that non-conventional impoundments that receive uranium byproduct material and tailings are managed in accordance with Subpart W, and to promote clarity and consistency with the promulgated regulations, Subpart W applies to non-conventional impoundments during the entire operating life of an impoundment which receives, or has received, uranium byproduct material or tailings directly from active uranium recovery operations. Changing a non-conventional impoundment's Subpart W applicability based on the primary use of the impoundment at any particular time during its operational life would cause unnecessary confusion and would be inconsistent with the regulations.

Operationally, this should not represent a burden to licensees. If the impoundment is being used to manage liquids from closure or remediation activities, it should remain in compliance with the requirement to retain sufficient liquid to cover solid materials in the impoundment. Further, because there is no restriction on the number of such impoundments that may be operating at one time, the licensee will not face the same pressure to begin closure as applies to conventional impoundments using the phased disposal approach.

Comment: A commenter finds the discussion of non-conventional impoundments confusing. The commenter believes we have inconsistently and inaccurately described the purpose of these impoundments, the nature of the materials in them, and our regulatory approach. The commenter wishes us to clarify that the liquids are not held in the impoundments for the purpose of

covering uranium byproduct material or tailings, but the liquid in fact contains (or is) uranium byproduct material or tailings. The commenter questions how the liquid can be used to control radon emissions, when the liquid is itself in need of control, and requests that we consider that liquids high in radium content may actually cause an increase in emissions.

Response: The purpose of non-conventional impoundments (evaporation or holding ponds) is to receive liquids generated by the uranium processing operation. Uranium byproduct material or tailings may be suspended or dissolved in these liquids. Some portion of the material will precipitate out and settle on the bottom of the impoundment. In some sense, the liquid itself is uranium byproduct material or tailings because it is a waste from the concentration or extraction process. The definition of "non-conventional" impoundment accurately conveys the concept that these impoundments "contain uranium byproduct material or tailings suspended in and/or covered by liquids." As noted in the previous comment response, impoundments containing only treated water and impoundments constructed for the purpose of managing liquids from closure or remediation activities are not non-conventional impoundments as defined by Subpart W, because they do not contain uranium byproduct material or tailings resulting directly from active uranium recovery operations.

While radium contained in the liquid will contribute to radon emissions, those emissions will be attenuated to some degree by the liquid in which it is contained. Further, liquid on top of solid materials will effectively limit radon emissions from those solids reaching the air, even if the liquid itself contains radium. While higher concentrations of radium in the liquid will generate more radon, concentrations in non-conventional impoundments have not been seen to reach levels of concern. See the response to the earlier comment in this section.

Comment: Many commenters expressed opinions related to limiting the size of impoundments. Some commenters believe Subpart W should contain limits on the size of non-conventional impoundments. The commenters believe that larger impoundments are more likely to fail and limits must be imposed to minimize the potential for ground water contamination. One commenter also believes the number of impoundments should be limited. Another commenter

does not believe we have adequately supported our conclusion that the requirements of 40 CFR 192.32(a)(1) will provide protection against extreme weather events and may be subject to greater turbulence. Regarding our reference to an impoundment of 80 acres, one commenter wishes us to clarify that no actual impoundment has been as large as 80 acres, but this size has been used only for modeling purposes. Another disputes our statement that it is reasonable to assume that such impoundments will not exceed 80 acres in area, simply because one never has.

Response: We have chosen not to limit the size of non-conventional impoundments because they are not as significant a source of radon emissions and can be readily controlled by maintaining saturation of solid materials, but also because they provide operational flexibility to uranium recovery facilities that may need to manage, on a temporary basis, large volumes of water that can then be recycled into the process. Regarding the maximum size of such impoundments, we referred to 80 acres as a "reasonable maximum approximation" for estimating cost, clearly noting that it is "the largest size we have seen" (79 FR 25401).

Comment: A commenter states that the current and proposed rules do not actually contain any measures to control releases of impoundment contents to the surface or subsurface during extreme weather events. The commenter asserts that the EPA has not provided any data to support the conclusion that the requirements of 40 CFR 264.221 will prevent dispersion of contents in severe events. The commenter expresses concern that generally available technologies do not exist that could prevent dispersion of contents or failure of the impoundment in a severe event such as a tornado or hurricane.

Response: As discussed in the proposal, we believe the design and engineering requirements for impoundments in 40 CFR 264.221, referenced in 40 CFR 192.32(a)(1), provide a sound basis for protection against reasonably foreseeable weather events. The provisions related to avoiding overtopping (essentially, spillage or dispersion) from "normal or abnormal operations," "wind and wave action," or "rainfall," as well as the requirement to maintain integrity and prevent massive failure of the dikes, lay a foundation for addressing the commenter's concerns. To satisfy these conditions, design of impoundments at any specific site would likely take into account regional climate and the

magnitude of events such as 100- or 500-year precipitation, or the likelihood of tornados or hurricanes.

F. Definitions, References and Conforming Editorial Revisions

1. How did we address definitions, reference and conforming editorial revisions in the proposed and final rules?

a. Definition of “Operation” and “Final Closure”

We proposed a relatively minor change to the definition of “operation” (79 FR 25404). Under Subpart W as promulgated in 1989, an impoundment was in operation when new tailings were being emplaced, from the day that tailings are first placed in the impoundment until the day that final closure begins. There has been some confusion over this definition. We proposed to amend the definition of “operation” in the Subpart W definitions at 40 CFR 61.251 to replace the reference to “new” tailings with the broader term “uranium byproduct material or tailings” at 79 FR 25405.

We received comments from across the spectrum of stakeholders who disliked this definition. Commenters from industry said we did not take into account the period between cessation of placement of uranium byproduct material or tailings into an impoundment and physical closure with an approved closure plan. This period can sometimes last for years while the uranium byproduct material or tailings are dewatered to an extent that heavy machinery can be used to emplace the final closure radon barrier. Also, the impoundment(s) are often used for dismantling the facility, for disposal of other liners, etc. Extending the operational period and Subpart W jurisdiction during the entire closure period could result in a milling facility having two operating impoundments in the closure process and no ability to operate a third impoundment to receive uranium byproduct material or tailings from operations. Other commenters claimed that operators were taking advantage of the existing definition by claiming that an impoundment is “in closure” but taking no concrete action to implement a closure plan or apply a final cover.

We do not intend to extend the jurisdiction of Subpart W to include the period during which closure activities are being conducted. The proposal was intended to clarify that an impoundment remains “operating” until it enters closure, even if it is not receiving newly-generated uranium byproduct material or tailings from

facility processing (79 FR 25405). Further, we note that the definition in Subpart W is consistent with those in 40 CFR 192.31 and 10 CFR part 40, Appendix A, which were in fact derived from Subpart W. Thus, we find this concern to be misplaced. The final rule adopts the definition of “operation” as it was proposed.

We did not propose to include a definition of “closure”; however, we realize that a lack of clarity on the concept of closure, what it involves and when it begins has affected the understanding of Subpart W. In particular, the use of the term “final closure” in the definition of “operation” does not, by itself, provide sufficient clarity on the end of operation. As described earlier, we received a number of comments making suggestions or raising concerns on this point. As noted above, the definition of “operation” in Subpart W served as the basis for the definitions later adopted in 40 CFR part 192 and 10 CFR part 40, Appendix A. Further, both 40 CFR part 192 and 10 CFR part 40, Appendix A adopted definitions and requirements related to closure that address some aspects of the comments we received related to Subpart W. The more appropriate action is to retain the definition of “operation” and clarify the meaning of final closure in a separate definition. Therefore, the final rule incorporates a new definition of “final closure” at 40 CFR 61.251(n).

We emphasize two aspects of this new definition that we believe will help address concerns regarding the timeliness and predictability of closure activities. First, impoundments or heap leach piles will remain subject to Subpart W until the owner or operator provides written notice that the impoundment is entering final closure. Second is the reference to the reclamation plan for the impoundment or heap leach pile. We have heard some comments, specifically related to the Cotter mill, that the facility should still be subject to Subpart W because it has never had an approved reclamation or closure plan; however, the facility no longer has an operating license under which it would conduct activities subject to the requirements of Subpart W.

The reference to a reclamation plan in the definition of “final closure” does not affect that Subpart W only applies to operational units and does not cover units that are in closure. Rather, it makes clear our expectation, also found in 40 CFR part 192 and 10 CFR part 40, Appendix A, that the NRC or the Agreement State require and approve such a plan. It also establishes that notice to the NRC or the Agreement

State and an approved reclamation plan are necessary prerequisites for determining that the impoundment in question is no longer subject to the requirements of Subpart W. The final rule is adopting the terminology employed in NRC regulations. In 10 CFR part 40, Appendix A, NRC identifies a reclamation plan as applicable to individual impoundments, while the closure plan is a more comprehensive document that addresses all aspects of facility closure and decommissioning, including any necessary site remediation. A reclamation plan prepared and approved in accordance with NRC requirements in 10 CFR part 40, Appendix A, is considered a reclamation plan for purposes of Subpart W. The reclamation plan may be incorporated into the larger facility closure plan.

A number of commenters expressed concern that the issue of delayed closure would have been addressed by 40 CFR part 61, subpart T (40 CFR 61.220–226), which required that impoundments that are no longer accepting tailings be brought into compliance (*i.e.*, covered) within two years, or in accordance with an approved compliance agreement if it is not feasible to complete closure within two years. In accordance with a 1991 Memorandum of Understanding (MOU), the EPA and the NRC amended 40 CFR part 192 and 10 CFR part 40, Appendix A, respectively, to incorporate provisions related to the timing and requirements of activities conducted during the closure period. The EPA subsequently rescinded subpart T in 1994, finding that the NRC regulatory program protected public health with an ample margin of safety to the same level as would implementation of subpart T (59 FR 36280, July 15, 1994). The commenters correctly noted that in that action the EPA retained the authority to reinstate subpart T should we determine that the NRC was not implementing it as we intended. The Agency has no plans to reinstate subpart T at this time, but takes this opportunity to emphasize that closure of impoundments should be conducted expeditiously, taking only the time that is truly necessary to dewater or otherwise prepare the uranium byproduct material or tailings before application of interim and final covers.

b. Liner Requirements in 40 CFR 192.32(a)(1)

We proposed specific provisions for conventional impoundments, non-conventional impoundments and heap leach piles to explicitly convey that any impoundment at a uranium recovery

facility that contains uranium byproduct materials or tailings would be subject to the Subpart W liner requirements. The 1986 and 1989 versions of Subpart W included a reference to 40 CFR 192.32(a); 40 CFR 192.32(a) incorporates the surface impoundment design and construction requirements of hazardous waste surface impoundments regulated under the Resource Conservation and Recovery Act (RCRA), found at 40 CFR 264.221. Those requirements state that the impoundment shall be designed, constructed and installed to prevent any migration of wastes out of the impoundment to the adjacent subsurface soil or ground water or surface water at any time during the active life of the impoundment. Briefly, 40 CFR 264.221(c) requires that, for new impoundments constructed after January 29, 1992,²⁴ the liner system must include:

1. A top liner designed and constructed of materials (e.g., a geomembrane) to prevent the migration of hazardous constituents into the liner during the active life of the unit.

2. A composite bottom liner consisting of at least two components. The upper component must be designed and constructed of materials (e.g., a geomembrane) to prevent the migration of hazardous constituents into this component during the active life of the unit. The lower component must be designed and constructed of materials to minimize the migration of hazardous constituents if a breach in the upper component were to occur. The lower component must be constructed of at least three feet of compacted soil material with a hydraulic conductivity of no more than 1×10^{-7} cm/sec.

3. A leachate collection and removal system between the liners, which acts as a leak detection system. This system must be capable of detecting, collecting and removing hazardous constituents at the earliest practicable time through all areas of the top liner likely to be exposed to the waste or liquids in the impoundment.

There are other requirements for the design and operation of the impoundment, and these include construction specifications, slope requirements, sump requirements and liquid removal requirements. As part of the proposed rule, we examined these provisions to help determine whether Subpart W adequately addresses extreme weather events. We determined

²⁴ 57 FR 3487, January 29, 1992. These specifications also apply to lateral expansions of existing surface impoundment units or replacements of existing surface impoundment units beginning construction or reuse after July 29, 1992. At the time of the 1986 and 1989 Subpart W rulemakings, double liners and leachate collection systems were specified for new impoundments, but the requirements did not contain this level of detail. The requirement for double liners was promulgated on July 15, 1985 (50 FR 28747).

that the requirements in 40 CFR 264.221 satisfactorily address such events.

The proposal did not adopt a new approach. Instead, it carried forward the approach adopted in the 1989 rulemaking. That rulemaking included § 61.252(c), which broadly required all impoundments, including those in existence prior to the promulgation of 40 CFR part 192, to comply with the requirements of 40 CFR 192.32(a). The 1986 rulemaking had not applied the requirements of 40 CFR 192.32(a) to impoundments in existence when the 1986 rule was promulgated, as these impoundments were anticipated to cease accepting uranium byproduct material or tailings by the end of 1992 (51 FR 34066). The 1989 rulemaking lifted this restriction as well as the exemption from the requirements of 40 CFR 192.32(a) (54 FR 51680).

We did not propose to remove the liner requirements or request comment on whether they should be retained. We proposed to refer only to 40 CFR 192.32(a)(1) because § 192.32(a) includes provisions that extend well beyond the design and construction of impoundments, such as ground water monitoring systems and closure requirements. These aspects do not fall under the purview of Subpart W, and they are removed in this action.

This final rule incorporates the revised reference to 40 CFR 192.32(a)(1) for all impoundments that contain uranium byproduct material or tailings and establishes this requirement as an element of GACT-based standards for conventional impoundments, non-conventional impoundments, and heap leach piles. The provision in the 1989 rule that extended this requirement to conventional impoundments in existence as of December 15, 1989 is moved to § 61.252(a)(1), which addresses those impoundments.

We received a comment suggesting that we explicitly cite 40 CFR 264.221(c) as the criteria that all impoundments are required to meet. This provision was not incorporated into regulation until 1985 (50 FR 28747). Adopting the commenter's approach would require impoundments constructed before 1985 to upgrade or close, which we did not propose to require. Those older impoundments are required to comply with the provisions of 40 CFR 264.221 that are applicable to them. The commenter's approach would also eliminate consideration of § 264.221(d), which allows for an alternative design or operating practices if "such design and operating practices, together with location characteristics" would prevent migration of hazardous constituents and allow detection of leaks at least as

effectively as the requirements of § 264.221(c). It is not appropriate to eliminate this flexibility, particularly for sites that may employ improved liner materials or have exceptional natural characteristics that lend themselves to such a demonstration.

c. Eliminating "As Determined by the Nuclear Regulatory Commission"

As described in the preceding section, Subpart W as promulgated in 1989 required impoundments to be constructed in accordance with the requirements cited in 40 CFR 192.32(a). This provision also included the phrase "as determined by the Nuclear Regulatory Commission."

As described in the preceding section, 40 CFR 192.32(a) also contains provisions related to ground water protection and closure activities, which are not within the scope of Subpart W. It is appropriate that the NRC be the sole regulatory agency for implementing and enforcing these provisions. We proposed to eliminate the phrase "as determined by the Nuclear Regulatory Commission" from Subpart W to clarify that EPA is an approval authority for Subpart W, but specifically for the impoundment engineering and construction requirements in 40 CFR 192.32(a)(1).

We received a number of comments from industry objecting to this change on the grounds that it would create dual regulation with NRC, thus leading to inefficiencies and the potential for one agency to approve an application while the other denied it. We disagree with these commenters, as described in detail in the next section. The final rule eliminates the phrase "as determined by the Nuclear Regulatory Commission" from 40 CFR 61.252(a)(2)(i) and (ii).

2. What key comments did we receive on definitions, references and conforming editorial revisions?

We received a number of comments related to the issue of operation and closure, either to extend the jurisdiction of Subpart W or to limit it. Commenters also expressed views on the liner requirements and their relation to groundwater protection or older impoundments. In connection with the liner requirements, a number of commenters disagreed with the proposal to eliminate the phrase "as determined by the Nuclear Regulatory Commission," suggesting that it will create dual regulation and exceeds our rulemaking authority. Although we did not propose to revise it, we also received some comment related to the definition of "uranium byproduct material or tailings."

Comment: A number of commenters advocated that the scope of Subpart W be extended to include all activities undertaken to achieve final closure of the impoundment (see also the next comment in this section). As defined in Subpart W, “operation” ends “the day that final closure begins” (40 CFR 61.251(e)). Many of the commenters would like this definition extended and explicitly stated that Subpart W should apply until the final cover is installed on the impoundment (or, for non-conventional impoundments, until the impoundment is removed, if that is the closure approach).

Response: Subpart W has never addressed remediation or reclamation activities undertaken to close the impoundment or the site and EPA did not propose to expand the scope of the rule to cover such activities. Comments on whether the separate regulations that apply during closure and until the final cover is installed are sufficient or whether additional regulations are needed to cover activities during that time period are beyond the scope of this section 112(q) review of Subpart W and thus EPA has no obligation to respond. However, a goal of this rulemaking was to provide clarity regarding when the management of uranium byproduct material or tailings is no longer subject to Subpart W. The final rule specifies that Subpart W no longer applies at the beginning of closure and further defines when closure begins. For informational purposes only, EPA discusses below some of the regulations that apply during the closure period. EPA did not reopen or accept comment on any aspects of these regulations.

In 1989, in conjunction with the promulgation of Subpart W, the EPA promulgated 40 CFR part 61, subpart T (40 CFR 261.220–226) to address the closure period and final disposal for conventional tailings impoundments (54 FR 51682). Subpart T required closure of impoundments to be complete within two years after ceasing operations.

In 1991, by Memorandum of Understanding (MOU) with the NRC, the two agencies agreed to take action to clarify the timing for closure of impoundments and processing sites. As part of this agreement, the EPA amended 40 CFR part 192 (58 FR 60341, November 15, 1993) and rescinded subpart T (59 FR 36302, July 15, 1994). The NRC subsequently amended 10 CFR part 40, Appendix A, consistent with the EPA’s amended 40 CFR part 192 (59 FR 28220, June 1, 1994). The MOU included the goal that all sites could be closed and in compliance with radon emission standards by 1997 or within seven years of the date on which

existing operations cease and standby sites enter disposal status. The MOU did not address Subpart W because Subpart W does not apply during closure.

The MOU and subsequent regulatory actions created a more comprehensive and coordinated framework for managing uranium processing wastes. Further, a settlement agreement with stakeholders provided additional detail to the MOU that, in part, allowed the EPA to make a finding under the CAA that the NRC’s regulatory program protected public health with an ample margin of safety. This supported the Agency’s decision to rescind subpart T.

In their respective rulemakings, the agencies essentially adopted the Subpart W definition of “operation” and included provisions related to closure that would allow certain activities related to waste management during the closure process. Among these were provisions that would allow wastes to be placed in impoundments that were also either in closure or had completed closure (final cover). These authorizations would not change the status of the impoundment or site, as we explained in our rulemaking to amend 40 CFR part 192: “Even if a portion of a site is authorized to remain accessible for disposal of byproduct materials during the closure process or after placement of a permanent radon barrier consistent with the Settlement Agreement, as described above, this will not cause a nonoperational uranium mill tailings disposal site to revert to an operational site as defined by 40 CFR 192.31(q)” (58 FR 60348, November 15, 1993).

Similarly, the NRC addressed this point in its 1993 proposed rule to amend 10 CFR part 40, Appendix A in response to a comment from an NRC Agreement State:

[Agreement State] Comment. The word “portion” should be deleted from paragraph (3) of Criterion 6A.

[NRC] Response. This provision allows limited disposal during closure as an exception to the definition of *operation*. If the whole impoundment is involved in waste disposal and no reclamation activities are proceeding, the impoundment would be considered operational and continue to be under appropriate requirements for operation. Note, one site may have both an operational impoundment and a non-operational impoundment with the applicable regulations applying to each (58 FR 58659, November 3, 1993, emphasis in original).

The final rule includes the definition of “operation” as it was proposed, which makes it fully consistent with the definitions in 40 CFR part 192 and 10 CFR part 40, Appendix A. We are also adopting a definition of “final closure”

that clarifies that Subpart W does not apply to impoundments that are being managed under an approved reclamation plan for that impoundment or the facility closure plan.

Comment: Several commenters stated that the current regulatory scheme allows an unacceptable period during closure activities when impoundments are not being monitored or otherwise managed to limit radon emissions. They further argue that closure is not being conducted in a manner that will lead to timely installation of a final cover or removal of an evaporation or holding pond. They cite periods of decades during which tailings are being “dewatered” or impoundments are used to deposit wastes from decommissioning activities, while the drying-out of impoundments allows increased radon emissions. Commenters attribute this in some part to the Agency’s rescission of subpart T, which called for installation of final covers on conventional tailings impoundments within two years of the cessation of operations. One commenter notes that an impoundment undergoing closure will be required to demonstrate compliance with the 20 pCi/m²-sec radon emissions standard only if it requests extension of the milestones in the closure plan, where it may not have been required to monitor previously under Subpart W.

Response: The EPA did not propose to extend the jurisdiction of Subpart W beyond the operational phase, nor did we request comment on regulations that are applicable to closure activities. We are under no obligation to respond to such comments. However, one purpose of this rulemaking was to clarify at what point Subpart W no longer applies to the management of uranium byproduct material or tailings. The final rule specifies that Subpart W no longer applies at the beginning of closure and further defines when closure begins. The following response is provided in the interest of further clarifying this issue.

As described in the response to the previous comment, the EPA and the NRC entered into an MOU in 1991, after industry efforts to stay the implementation of subpart T, due, in part, to the fact that the requirement to complete closure of impoundments was unrealistically stringent. As part of the MOU, the EPA rescinded subpart T and modified its UMTRCA standards at 40 CFR 192.32 to address activities conducted during closure, including allowing placement of decommissioning wastes in non-operating impoundments. The EPA and the NRC agreed that such activities can, for the most part, be

conducted and a final cover installed within seven years of the end of operations. Similar timeframes should be possible for non-conventional impoundments, which are likely to be removed altogether. We note that both 40 CFR 192.32(a)(3) and 40 CFR part 40, Appendix A were modified and require that closure take place “as expeditiously as practicable considering technological feasibility.” They further state that such placement of wastes during closure will not be approved if it would cause delays in emplacement of the final radon barrier to meet the disposal requirements. The MOU did not address Subpart W because Subpart W does not apply during closure.

The Agency has no plans to reinstate subpart T, although EPA is not precluded from doing so (40 CFR 261.226). Nor is the final rule extending the scope of Subpart W to cover closure activities. While this does leave a period of time when conventional and non-conventional impoundments are more likely to have increased radon emissions because they are not managed as they would be during operations, such a period is necessary to facilitate final closure activities. However, “dewatering” tailings for decades, particularly in the arid West, is certainly not consistent with the seven-year period envisioned by both the EPA and the NRC. Most conventional tailings are emplaced using the phased disposal method. To avoid extended dewatering periods, sites may consider using the continuous disposal method, in which tailings are dewatered before emplacement and immediately covered. Regardless of the method of emplacement, we emphasize the importance of timely closure in achieving the safe end state of these sites, and encourage the NRC and NRC Agreement States to give appropriate attention to controlling radon emissions during closure activities.

Comment: Some commenters expressed concern that impoundments are not being closed in accordance with closure plans, because the plans do not exist, milestones are absent or unclear, or milestones are not being enforced. One commenter states that the EPA should not consider an impoundment in closure until such plans are incorporated into the facility license. Another commenter recommends that we amend 40 CFR part 192 to include a provision that the EPA will verify the existence of a closure plan. Several commenters offer specific comments related to the White Mesa and Cotter sites and what they perceive as a lack of closure plans.

Response: Activities related to closure or closure plans are beyond the scope of this rulemaking and the EPA is under no obligation to respond to comments on that topic. However, one purpose of this rulemaking was to clarify at what point Subpart W no longer applies to the management of uranium byproduct material or tailings. This final rule specifies that an approved reclamation plan is a prerequisite for entering closure, thereby removing a unit managing uranium byproduct material or tailings from the jurisdiction of Subpart W. The response below is provided in the interest of clarity in conveying the provisions of the final rule. The EPA does not require, review, approve or enforce reclamation or closure plans.

As noted by one commenter, closure plans with milestones are required under 40 CFR part 192 and 10 CFR part 40, Appendix A. Closure plan requirements, closure activities and revisions to part 192 are not within the scope of this Subpart W rulemaking. The EPA typically does not see closure plans when reviewing construction applications under 40 CFR part 61, subpart A. The NRC or the Agreement State is responsible for enforcement of reclamation or closure plans. The Cotter site ceased operations several years ago, no longer has an operating license and is therefore no longer subject to the requirements of Subpart W. The site is currently a Superfund site and is conducting activities under a decommissioning license from the State of Colorado.

The final rule includes a definition of “final closure” that specifies notification that the impoundment in question is being managed according to the requirements and milestones in the approved reclamation plan. This should provide clarity when determining whether an impoundment is in closure, and whether Subpart W still applies.

Comment: A few commenters took the opposite view of that addressed earlier in this section. These commenters wish us to clarify that the period of operations for either a conventional or non-conventional impoundment only extends to the management of uranium byproduct material or tailings produced by the concentration or extraction of ore processed primarily for its source material content (which may include the commercial management of such wastes produced at other facilities), and not to the management of wastes (byproduct material or otherwise) generated during closure or decommissioning activities.

Response: The final rule clarifies that Subpart W does not apply during

closure activities, and further defines when final closure begins. As described above in this section, this is essentially the position agreed to in the 1991 MOU between the EPA and the NRC. Both 40 CFR 192.32(a)(3) and 10 CFR part 40 Appendix A, Criterion 6(A) provide for the use of impoundments while they are undergoing closure. However, impoundments that are used to manage uranium byproduct material or tailings generated during closure or remediation activities, while remaining open to manage operational wastes, would continue to fall under Subpart W until they formally enter the closure process and implement the approved reclamation plan for that impoundment. The definition of “final closure” adopted in the final rule makes clear that Subpart W does not apply to impoundments that are being managed under an approved reclamation plan.

In addition to the use of an impoundment for wastes generated during closure or remediation activities, NRC regulations also provide for waste from other sources to be emplaced in the impoundment during the closure process (10 CFR part 40, Appendix A, Criterion 6(A)(3)). Approval of such emplacement requires a license amendment and must not delay complete closure of the impoundment. Subpart W does not apply to such authorized emplacements while the impoundment is undergoing closure because the unit is subject to an approved reclamation plan and, therefore, no longer operating. Depending on the terms of the license amendment, authorized emplacements at impoundments may include waste from ISL sites, which are not expected to construct permanent impoundments, thereby facilitating the overall goal of limiting the number of small disposal sites. Authorization to allow emplacement of waste from other sources during the closure process must be reflected in both the facility license and the applicable reclamation plan.

Comment: One commenter disagreed with comments described earlier and pointed out that maintaining impoundments under Subpart W jurisdiction while they are undergoing closure may cause facilities to be out of compliance with the restriction on the number of conventional impoundments. The commenter posits that this situation could arise if a facility opened a new conventional impoundment for operational uranium byproduct material or tailings, while having another one in operation and one in closure (or multiple impoundments in closure). To avoid compliance issues, the commenter explained that facilities may have to

defer opening new impoundments, which could lead to temporary shutdown of the facility's processing operations if there is no outlet for the wastes. The commenter specifically notes that non-conventional impoundments may continue in operation when conventional impoundments are in closure.

Response: We did not propose to extend the scope of Subpart W to apply during closure activities and thus did not open this issue as part of our review under CAA section 112(q). Also, we are neither finalizing such an extension of applicability, nor limiting the number of non-conventional impoundments that may be in operation at any one time.

Comment: Several commenters stated that definitions in or proposed for Subpart W are inconsistent with the NRC's definitions in 10 CFR part 40 (and Appendix A). For example, two commenters state that "[t]he definition of *Operation* conflicts with existing regulations, specifically those in 10 CFR part 40 Appendix A following the rescission of 40 CFR part 61 Subpart T." These commenters also suggest that we look to the Appendix A definition of "closure" and they note that the closure period is tied to the "end of milling operations" in Criterion 6.

One commenter requests clarification of the term "day that final closure begins," which the commenter believes has never been adequately explained. Another commenter requests clarification on the steps that must take place for closure to begin. Commenters also stated that we did not include non-conventional impoundments in the definition of operation.

Response: It is important to make the distinction between closure of an impoundment and closure of a facility. Subpart W applies to impoundments that are operating. An individual impoundment may enter and complete the closure process, thus removing it from Subpart W jurisdiction, while other impoundments and the facility continue to operate. When the facility (site) itself enters the closure process, and is no longer operating (and generating uranium byproduct material or tailings), impoundments will also be managed according to the overall site closure plan. Tying Subpart W to the "end of milling operations" in NRC regulations, as suggested by the two commenters, would essentially preclude the closure of individual impoundments until overall site closure begins. This is likely contrary to the commenters' intentions. We also note that the NRC definition of "closure" cited by these commenters clearly refers to activities undertaken to close the entire site and

is not directed specifically at impoundment closure.

Additionally, commenters have misinterpreted our proposal. The Agency does not intend to apply Subpart W to impoundments that have entered the closure process. The proposed modification of the definition of "operation," which we are adopting in the final rule, clarifies that impoundments that have not yet entered closure remain subject to Subpart W, even if the material they are receiving is not newly-generated uranium byproduct material or tailings ("new tailings" in the original). This also makes the definition more consistent with those in 40 CFR part 192 and 10 CFR part 40, Appendix A. See the proposed rule at 79 FR 25405, May 2, 2014. To further clarify this situation, the final rule includes a definition of "final closure" specifying that closure begins upon written notification that the impoundment is being managed according to the requirements and milestones in the approved reclamation plan for that impoundment.

This definition of "final closure" adopts a suggestion provided by one commenter. The commenter proposed tying "closure period" to a written notification from the licensee that the impoundment is no longer being used for emplacement of tailings or for evaporative or holding purposes, and is also no longer on standby for such purposes. The commenter suggests that it would be useful to explicitly address both conventional and non-conventional impoundments in the definitions, as there may be situations where non-conventional impoundments continue to operate when conventional impoundments are in closure. We are also adopting this suggestion in the definition of "final closure."

Adding this language should eliminate some uncertainty regarding impoundment status. This uncertainty is reflected in a statement by the same commenter regarding the White Mesa Mill. In providing information about the different impoundments, the commenter notes that ". . . Cell 3 *could be considered* to have already commenced the closure process" (emphasis added). The written notification requirement will help eliminate such ambiguous situations. There should be no question as to whether an impoundment is undergoing closure, and similarly no ambiguity regarding the applicability of Subpart W.

Regarding the perceived conflicts with NRC regulations, we do not see such a conflict, and note that the definition of "operation" in existing and proposed Subpart W is substantively

identical to and served as the basis for that in 10 CFR part 40, Appendix A (we note the NRC's statement in its proposal that "the definition of operations is in conformance with the definition of 'operational' in the proposed EPA amendment to [40 CFR part 192] subpart D and in 40 CFR part 61, subpart W" (58 FR 58659, November 3, 1993)). The commenters did not suggest that the NRC's definition is in conflict with its own regulations. Further, the same definition is used in 40 CFR 192.31(p). As noted above, we are also adding a definition of "final closure" in the final rule. This will provide additional clarity as to what steps the operator must take to remove an impoundment from the jurisdiction of Subpart W while remaining consistent with the definitions in 10 CFR part 40 and 40 CFR part 192. The definition of final closure explicitly addresses conventional impoundments, non-conventional impoundments and heap leach piles.

The phrase "day that final closure begins" was included in the original promulgation of Subpart W in 1986 (51 FR 34056, September 14, 1986). "Final closure" is a term defined under RCRA hazardous waste regulations in 40 CFR 260.10. "Final closure" in that context refers to the closure of all hazardous waste management units at a site, and is distinguished from "partial closure," which refers to closure of individual units. However, as the term is used in Subpart W, and as it is being adopted in the final rule, it refers to individual impoundments, not the entire site (so is more like "partial closure" in the RCRA context). Subpart W differs in this respect from 40 CFR part 192 and 10 CFR part 40, Appendix A, which are both also concerned with closure of the overall site. We also note that, as described earlier, the definition of "operations" in Subpart W served as the basis for corresponding definitions in 40 CFR part 192 and 10 CFR part 40, Appendix A, and this phrasing has also been adopted in and provides consistency with those regulations. We did not propose to change it and we are not finalizing any changes.

Comment: The State of Utah commented on the status of liners at two of the facilities regulated by the State under its Subpart W delegation. The conventional impoundment at the Shootaring Canyon Mill was constructed in 1981 and "was not required to be constructed in accordance with" the requirements of 40 CFR 192.32(a). However, the State will require the liner to be upgraded if the mill goes back into production. The Shootaring Canyon Mill operated for

only a short period and has been in standby for nearly 35 years. The State also addresses Cell 1 at the White Mesa Mill, which is a non-conventional impoundment also constructed in 1981. The State has not considered this impoundment to be subject to Subpart W and believes that EPA must conduct a cost-benefit analysis if the liner is required to be upgraded.

Response: Comments indicate that some stakeholders have not always clearly understood the true scope of the 1989 Subpart W rulemaking. The 1989 rulemaking revised the approach taken in 1986, which required impoundments existing at that time to cease operations by December 31, 1992 unless they could receive an exemption or extension (51 FR 34066). These impoundments were not required by Subpart W to meet the requirements of 40 CFR 192.32(a). The 1989 rulemaking lifted the operating restriction on older impoundments, but also removed the exemption from the requirements of 40 CFR 192.32(a) (54 FR 51680). This provision, promulgated as 40 CFR 61.252(c), explicitly addressed the exemption for impoundments constructed prior to the promulgation of 40 CFR part 192 and established that all impoundments used to manage uranium byproduct material or tailings became subject to the liner requirements in 40 CFR 192.32(a) when the 1989 rule became effective, regardless of when they were constructed. These liner requirements have remained in place because CAA section 112(q) explicitly retains standards that were in effect before the date of enactment of the CAA Amendments of 1990, unless and until the EPA revises them.

The two impoundments identified by the State of Utah are both required to comply with the liner requirements in 40 CFR 192.32(a)(1), and by extension 40 CFR 264.221. The standby status of the Shootaring Canyon Mill makes no difference in this regard. We understand that some stakeholders did not view the 1989 rulemaking as applicable to liquid (non-conventional) impoundments. This final rule clarifies that non-conventional impoundments did fall under the 1989 rule and are also subject to the requirements in 40 CFR 192.32(a)(1). We note that Denison Mines, the previous owner of the White Mesa Mill, stated in its response to the EPA's section 114 request for information that Cell 1 meets the requirements of 40 CFR 264.221(a).

Comment: Many commenters objected to the proposal to eliminate the phrase "as determined by the Nuclear Regulatory Commission" from provisions related to review of the impoundment construction requirements in 40 CFR 192.32(a)(1).

Commenters in general argued that eliminating the phrase "as determined by the Nuclear Regulatory Commission" would result in unnecessary dual regulation if both the EPA and the NRC need to review and approve construction applications, with limited if any benefit. One commenter suggests this will have significant cost implications that were not considered during the rulemaking. Another commenter questions how disagreements between the agencies will be resolved, and suggests that appeals will be "inappropriately complicated".

A number of these commenters asserted that our proposal was contrary to the legal framework established by Congress for management of byproduct material as defined in Section 11e.(2) of the AEA. Commenters cite to the framework in Section 275 of the AEA, which directs the EPA to establish standards for management of byproduct material and which gives the NRC sole authority over implementation and enforcement of the EPA's standards through its licensing process (one commenter cites Title 42 of the United States Code, Section 2022(d) rather than Section 275 of the AEA). Several commenters refer specifically to that section's statement that "no permit issued by the Administrator is required . . . for the processing, possession, transfer, or disposal of byproduct material, as defined in section 11e.(2) to this subsection." Another commenter suggests that the EPA is attempting to expand its role by improperly assuming or duplicating the NRC's responsibilities.

One commenter does not make these specific statutory references, but more generally criticizes the EPA for "grossly inefficient, dual regulation" that is "inconsistent with efficient regulatory practices" and goes against previous efforts by the two agencies to avoid such situations, as illustrated by the EPA's rescission of 40 CFR part 61, subparts I and T. The commenter suggests that Subpart W could also be rescinded, and notes that the EPA's separate rulemaking related to 40 CFR part 192 may be used to incorporate elements of Subpart W as needed.

We also received some comments in support of the proposal to remove the phrase "as determined by the Nuclear Regulatory Commission." One commenter believes this is a welcome clarification that the EPA is administering the NESHAP program. Another commenter notes that it is not unusual for an industry to be regulated under more than one statute or agency. A third commenter points out that this situation has existed for several

decades. A fourth commenter agrees and cites the EPA approvals under 40 CFR part 61, subpart A, as well as the division of responsibilities at the state level in Utah as they relate to the White Mesa Mill.

Response: The EPA disagrees that the change will be burdensome to licensees or create additional barriers to regulatory approval. We proposed this change to be consistent with the proposal to narrow the reference to the impoundment engineering and construction requirements. As explained in the preamble to the proposed rule, the requirements at 40 CFR 61.252(b) and (c) required compliance with 40 CFR 192.32(a) (79 FR 25406). However, we focus the Subpart W requirements on the impoundment design and construction requirements found specifically at 40 CFR 192.32(a)(1). The remainder of 40 CFR 192.32(a) goes beyond this limited scope by including requirements for ground-water detection monitoring systems and closure of operating impoundments. These other requirements, along with all of the part 192 standards, are implemented and enforced by the NRC through its licensing requirements for uranium recovery facilities at 10 CFR part 40, Appendix A. It is appropriate for compliance with those provisions to be solely determined by the NRC. However, when referenced in Subpart W, the requirements in 40 CFR 192.32(a)(1) would also be implemented and enforced by the EPA as the regulatory authority administering Subpart W under its CAA authority. Therefore, we revised 40 CFR 61.252(b) and (c) to specifically define which portions of 40 CFR 192.32(a) are applicable to Subpart W. Section 61.252(b) is re-numbered as 61.252(a)(2) and section 61.252(c) is incorporated into 61.252(a)(1) in the final rule.

The comments confirm that there is a misimpression that this reference to the NRC precluded the EPA from reviewing applications for compliance with 40 CFR 192.32(a)(1) in its pre-construction and modifications reviews under 40 CFR 61.07 and 61.08. That is an incorrect interpretation of the 1989 rule. To the contrary, in promulgating the 1989 rule, we stated "Mill operators will not be allowed to build any new mill tailings impoundment which does not meet this work practice standard. EPA will receive information on the construction of new impoundments through the requirements for EPA to approve of new construction under 40 CFR part 61, subpart A" (54 FR 51682). The referenced "work practice standard" includes the requirement for

conformance with 40 CFR 192.32(a). We are eliminating the reference to the NRC to clarify that the EPA is an approval authority for the impoundment engineering and construction provisions in 40 CFR 192.32(a)(1). This change will have no effect on the licensing requirements of the NRC or its regulatory authority under UMTRCA to implement the part 192 standards through its licenses.

Commenters' references to AEA Section 275 as limiting our authority are incorrect. The commenters have overlooked a salient point, which is that the Subpart W rulemaking is being undertaken pursuant to our CAA authority, not under the AEA. Another relevant provision in Section 275, 275e (42 U.S.C. 2022(e)), states: "Nothing in this Act applicable to byproduct material, as defined in section 11e.(2) of this Act, shall affect the authority of the Administrator under the Clean Air Act of 1970, as amended, or the Federal Water Pollution Control Act, as amended." The Federal Water Pollution Control Act is also known as the Clean Water Act.

Further, commenters who cited the prohibition on EPA permitting neglected to note the context for this provision and the specificity of the language regarding the standards of general application to be developed by the EPA. AEA section 275b.(2) reads as follows: "Such generally applicable standards promulgated pursuant to this subsection for nonradiological hazards shall provide for the protection of human health and the environment consistent with the standards required under subtitle C of the Solid Waste Disposal Act, as amended, which are applicable to such hazards: *Provided, however,* That no permit issued by the Administrator is required under this Act or the Solid Waste Disposal Act, as amended, for the processing, possession, transfer, or disposal of byproduct material, as defined in section 11e.(2) to this subsection" (emphasis in original). Thus, Congress required the EPA's standards to be consistent with standards applicable to nonradiological hazardous waste (subtitle C of the Solid Waste Disposal Act, better known as the Resource Conservation and Recovery Act, or RCRA) in lieu of the Agency exercising permitting authority under either the AEA or RCRA. The EPA is not contravening this restriction by exercising regulatory authority under the CAA. Responses to other comments on our legal authorities for this action may be found in Section IV.A.2.

Regarding the view of appropriate and efficient regulation, our action will not

have such far-reaching consequences. The EPA and the NRC have not examined the prospect of rescinding Subpart W. As with the rescission of 40 CFR part 61, subparts I and T, and in accordance with CAA section 112(d)(9), the EPA would need to determine that the NRC's regulatory program will protect public health with an ample margin of safety. The EPA's separate rulemaking under 40 CFR part 192 specifically addresses ground water protection at ISL facilities.

Comment: Several commenters addressed the definition of "uranium byproduct material or tailings" in Subpart W. Commenters generally raised the distinction between "tailings" and "byproduct material" under the AEA as germane to the scope of this rulemaking. One commenter suggests that the historical focus on conventional mill tailings impoundments (or "piles") is linked to the CAA, and that we are impermissibly re-defining non-tailings byproduct material as "tailings" as a means to address them under the CAA. Another commenter noted the following in reference to the AEA definition: "All tailings are byproduct material, but not all byproduct materials are tailings." A third commenter asks for clarification on how restoration fluids may be considered byproduct material. Several commenters suggested that we adopt the NRC's definition in 10 CFR 40.4 as a means to improve clarity and consistency.

Another commenter raised a question regarding wastes at uranium recovery facilities that are not derived from ores. The commenter stated that such wastes may derive from "alternate feed" materials that contain sufficient uranium to make processing worthwhile (e.g., tailings from other mineral extraction operations), or could include wastes placed directly into conventional impoundments because they are physically or chemically similar to the material already being managed.

Response: Although we received suggestions to adopt the AEA's and the NRC's definition of byproduct material, we did not propose to revise the definition of uranium byproduct material or tailings. CAA section 112(q) explicitly retains standards such as Subpart W that were in effect before the date of enactment of the CAA Amendments of 1990, so the existing definition of uranium byproduct material or tailings remains unless or until the EPA revises it. Because we did not propose to revise the definition of uranium byproduct material or tailings, we did not open it for comment. The EPA first defined the term "uranium byproduct material or tailings" in 1986

and has generally used the term "tailings" in Subpart W for simplicity. This rulemaking clarifies the scope of the EPA's term "uranium byproduct material or tailings" and provides reassurance that it is not in conflict with NRC's definitions. The following discussion is provided for informational purposes to further clarify this issue.

We note that the EPA has clear authority to promulgate definitions under the CAA as it deems appropriate and is not limited to the AEA's definition of "byproduct material" or the NRC's definition in 10 CFR 40.4. The EPA's definition identifies the scope of material covered by the Subpart W regulations and does not preempt the NRC's AEA authority. See Section IV.A.2 for more discussion of legal authorities as they relate to this issue.

The definition of "uranium byproduct material or tailings" in Subpart W, as it was promulgated in 1989 and not modified by this rule, establishes that Subpart W broadly addresses radon emissions from operating structures used to manage wastes produced during and following the concentration or extraction of uranium from ore processed primarily for its source material content. The EPA acknowledges that the definition of "uranium byproduct material or tailings," as originally promulgated in 1989, may not wholly conform with the common understanding of "tailings." However, the scope and applicability of Subpart W is determined by the regulatory definition of "uranium byproduct material or tailings," not the common understanding of tailings. Subpart W applies to the structures at uranium recovery facilities that are used to manage or contain "uranium byproduct material or tailings" during and following the processing of uranium ores. Common names for these structures may include, but are not limited to, impoundments, tailings impoundments, tailings piles, evaporation or holding ponds, and heap leach piles. However, the name itself is not important for determining whether Subpart W requirements apply to that structure; rather, applicability is based on what these structures contain. To clarify any potential confusion created by the Subpart W definition, any references to "uranium byproduct material" or "tailings" are now references to "uranium byproduct material or tailings." These changes reaffirm the scope of Subpart W and are not substantive.

The defined scope of materials subject to Subpart W becomes more meaningful when one considers the current

dominance of ISL in uranium recovery. At these sites, where conventional impoundments are not present, non-conventional impoundments managing uranium byproduct material or tailings are the most significant potential source of radon during operations. Although we do not generally expect non-conventional impoundments to be as large a source of potential emissions as conventional impoundments, non-conventional impoundments manage uranium byproduct material or tailings and emit or have the potential to emit sufficient radon that it is appropriate for the EPA to address them under Subpart W.

The designation of restoration fluids as uranium byproduct material or tailings is consistent with the approach taken by the NRC. See Staff Requirements Memorandum—SECY-99-013, “Recommendation on Ways to Improve the Efficiency of NRC Regulation at *In Situ* Leach Uranium Recovery Facilities,” July 26, 2000.

It is not necessary for us to explicitly address waste not resulting from the concentration or extraction of ores because Subpart W applies to impoundments, both conventional and non-conventional, that are used to manage uranium byproduct material or tailings. Such impoundments that also contain non-ore wastes continue to be subject to Subpart W. It is unlikely that an operator would construct impoundments for the sole purpose of managing wastes that do not derive from the processing of ores. As explained in Section IV.E.2, the purpose of Subpart W is to control radon emissions from sources containing uranium byproduct material or tailings at uranium recovery facilities. If an impoundment does not contain uranium byproduct material or tailings, it is not subject to the requirements of Subpart W. If construction of such impoundments is

planned, they can be identified and their status can be addressed during the construction application review under subpart A.

Comment: Commenters requested clarification regarding whether liquids in impoundments *contain* byproduct material or *are* byproduct material. One commenter asked us to clarify that solids *and* liquids in impoundments are byproduct material.

Response: Subpart W applies to conventional and non-conventional impoundments to the extent they are used to manage uranium byproduct material or tailings, with the primary concern being the potential to emit radon. The uranium byproduct material or tailings may be in solution or suspension in liquids that are discharged to these impoundments, or in sediments after settling out from the liquids.

V. Summary of Environmental, Cost and Economic Impacts

As discussed earlier, uranium recovery activities are carried out at several different types of facilities. We are revising Subpart W based on how uranium recovery facilities manage uranium byproduct materials during and after the processing of uranium ore at their particular facility. As discussed in Sections III and IV, we are establishing GACT-based requirements for three types of affected sources at uranium recovery facilities: (1) Conventional impoundments; (2) non-conventional impoundments; and (3) heap leach piles.

For purposes of analyzing the impacts of the final rule, we assumed that approximately five conventional milling facilities, 50 ISL facilities (although this is only a projection since only 12 are fully licensed) and one heap leach facility, each with at least one regulated impoundment, are subject to the final

Subpart W. The following sections present our estimates of the final rule’s air quality, cost and economic impacts. For more information, please refer to the Economic Impact Analysis (EIA) report that is included in the public docket for this final rule (EPA-HQ-OAR-2008-0218).

A. What are the air quality impacts?

The requirements in this final rule should eliminate or reduce radon emissions at all three types of affected sources. The GACT-based standards being established by this action are based on control technologies and management practices that have been used at uranium recovery facilities for the past twenty or more years. These standards will minimize the amount of radon that is released to the air by keeping the impoundments wet or covered with soil and/or by limiting the area of exposed uranium byproduct material or tailings.

B. What are the cost and economic impacts?

Table 5 presents a summary of the unit cost (per pound of U₃O₈) for implementing each GACT-based standard at each of the three types of uranium recovery facilities. Because the requirements for liners are not attributable to Subpart W, but are required by other regulations, the only costs attributable to this rulemaking are related to maintaining liquids in non-conventional impoundments. In addition to presenting the GACT costs individually, Table 5 presents the total unit cost to implement all relevant GACT-based standards at each type of facility. For example, the table shows that conventional mills will have both conventional impoundments and non-conventional impoundments, and will also be required to maintain saturation in the non-conventional impoundments.

TABLE 5—FINAL GACT STANDARDS COSTS PER POUND OF U₃O₈

	Unit cost (\$/lb U ₃ O ₈)		
	Conventional mills	ISL facilities	Heap leach
GACT—Double Liners for Conventional Impoundments *	\$1.04	.....	.....
GACT—Double Liners for Non-conventional Impoundments *	1.04	\$3.07	\$0.22
GACT—Maintaining Non-conventional Impoundment Sediments 100% Saturated	0.015	0.026	0.0013
GACT—Liners for Heap Leach Piles * .....	.....	.....	2.01
GACTs—Total for All Four	2.09	3.09	2.24
Baseline Facility Costs** (EIA Section 6.2)	55.18	51.31	45.06
Baseline Facility Costs***	51.56	52.49	46.08

* Liners required by 40 CFR part 192.

** Based on Price of U₃O₈ at \$55/lb.

*** Based on Price of U₃O₈ at \$65/lb (used in proposed rule).

A reference facility for each type of uranium recovery facility is developed and described in Section 6.2 of the EIA, including the base cost estimate to construct and operate each of the three types of reference facilities. For comparison purposes, the unit cost (per pound of U_3O_8) of the three uranium recovery reference facilities is presented at the bottom of Table 5. In developing the baseline cost, it was assumed that the price of U_3O_8 is \$55 per pound. At that price, baseline facility costs increase somewhat for the conventional mill because the cost of financing (*i.e.*, interest) also increases as revenues are lower. The baseline cost for a conventional mill actually exceeds the \$55/lb, which suggests that the mill cannot operate profitably. Baseline costs at \$65 per pound, which was used to support the proposed rule, are also shown for comparison. This illustrates the sensitivity of facility cost to market price, which is more significant than the cost of implementing the GACT-based standards.

Based on the information in Table 5, the four GACT-based standards represent about 4%, 6%, and 5% of the baseline cost (per pound of U_3O_8) at conventional, ISL, and heap leach uranium recovery facilities, respectively. The baseline costs were estimated using recently published cost data for actual uranium recovery facilities. For the model conventional mill, we used data from the recently licensed new mill at the Piñon Ridge project in Colorado. For the model ISL facility, we used data from two proposed new facilities: (1) The Centennial Uranium project in Colorado; and (2) the Dewey-Burdock project in South Dakota. The Centennial project is expected to have a 14- to 15-year production period, which is a long duration for an ISL facility, while the Dewey-Burdock project is expected to have a shorter production period of about 9 years, which is more representative of ISL facilities. For the heap leach facility, we used data from the proposed Sheep Mountain project in Wyoming.

Baseline costs for conventional impoundment liner construction²⁵ will

²⁵ These liner systems (conventional, non-conventional and heap leach piles) are already required by 40 CFR 192.32(a)(1), which, as explained above, are requirements promulgated by the EPA under UMTRCA that are incorporated into NRC regulations and implemented and enforced by the NRC through its licensing requirements. Therefore, we are not placing any additional liner requirements on facilities or requiring them to incur any additional costs to build their conventional or non-conventional impoundments or heap leach piles above and beyond what an owner or operator of these impoundments must already incur to

remain the same, since the final rule does not impose additional requirements. Liners meeting the requirements at 40 CFR 192.32(a)(1) are already mandated by other regulations and were mandated by the 1989 rule and, therefore, are built into the baseline cost estimate. As a result, there are no costs (or benefits) resulting from the inclusion of these requirements in the final rule.

The average cost to construct one of these impoundments is \$13.8 million. We estimate that this cost is less than 2% of the total baseline costs to construct and operate a conventional mill, per pound of U_3O_8 produced.

We have estimated that for an average 80-acre non-conventional impoundment the average cost of construction of an impoundment is \$24.7 million. Requiring impoundments to comply with the liner requirements in 40 CFR 192.32(a)(1) will contain the uranium byproduct material and reduce the potential for ground water contamination. The only economic impact attributable to the final rule is the cost of complying with the new requirement to maintain liquids such that solids in the non-conventional impoundments are not visible above the liquid level during operation and standby. As explained in Section IV.B.3. of this preamble, as long as solid materials are maintained in a saturated state in the non-conventional impoundments the effective radon emissions from the ponds are reduced by approximately 95%. In order to maintain a liquid surface above the sediments within a pond, it is necessary to replace the water that is evaporated from the pond. Depending on the source of water chosen, we estimate that this requirement will cost owners or operators of non-conventional impoundments between \$2,909 and \$37,527 per year.²⁶ This value also varies according to the size of the non-conventional impoundment, up to 80 acres, and the location of the impoundment. Evaporation rates vary by geographic location. The requirement to maintain a liquid surface above solid materials in the ponds is estimated to

obtain an NRC license. Therefore, there are no projected costs (or benefits) beyond the baseline resulting from the inclusion of these requirements in Subpart W.

²⁶ These figures are higher than those estimated for the proposed rule. We received information during the comment period that resulted in an increase in the estimated cost of obtaining makeup water, so the final rule requirement of 100% saturation is still lower than the proposed requirement to maintain one meter of liquid, using the same base water costs.

cost less than \$0.03 per pound of uranium produced.

Designing and constructing heap leach piles to meet the requirements at 40 CFR 192.32(a)(1) will minimize the potential for leakage of uranium enriched lixiviant into the ground water. Specifically, this will require that a double liner, with drainage collection capabilities, be provided under heap leach piles. Baseline costs for heap leach pile liner construction will remain the same, since the final rule does not impose additional requirements. Liners meeting the requirements at 40 CFR 192.32(a)(1) are already mandated by other regulations and, therefore, built into the baseline cost estimate. Therefore there are consequently no costs (or benefits) resulting from the inclusion of these requirements in Subpart W. Baseline costs for construction will be essentially the same as for conventional impoundments. Since the liner systems are equivalent to the systems used for conventional and non-conventional impoundments, we have been able to estimate the average costs associated with the construction of heap leach pile impoundments that meet the liner requirements we are proposing, and compare them to the costs associated with the total production of uranium produced by the facility. The average cost of constructing such an impoundment is estimated to be approximately \$12.6 million. The costs of constructing this type of liner system are less than 5% of the estimated total baseline costs of a heap leach facility.

In summary, we estimate that for conventional impoundments there will be no additional costs incurred through this proposed rule. For non-conventional impoundments we estimate that the additional costs incurred by this proposed rule will be to maintain a layer of liquid above solid materials in each non-conventional impoundment, and we have estimated those costs between approximately \$2,909 and \$37,527 per year, which represents less than \$0.03 per pound of U_3O_8 produced. For heap leach piles, no additional costs will be incurred.

C. What are the non-air environmental impacts?

Water quality will be maintained by implementation of this final rule. This final rule does contain requirements (by reference) related to water discharges and spill containment. In fact, the liner requirements cross referenced at 40 CFR 192.32(a)(1) will significantly decrease the possibility of contaminated liquids leaking from impoundments into ground water (which can be a

significant source of drinking water). Section 192.32(a)(1) includes a cross-reference to the surface impoundment design and construction requirements of hazardous waste surface impoundments regulated under RCRA, found at 40 CFR 264.221. Those requirements state that the impoundment shall be designed, constructed and installed to prevent any migration of wastes out of the impoundment to the adjacent subsurface soil or ground water or surface water at any time during the active life of the impoundment. There are other requirements in 40 CFR 264.221 for the design and operation of the impoundment, and these include construction specifications, slope requirements, sump and liquid removal requirements. These liner systems for conventional and non-conventional impoundments and heap leach piles are already required by 40 CFR 192.32(a)(1), which, as explained above, are requirements promulgated by the EPA under UMTRCA that are incorporated into NRC regulations and implemented and enforced by the NRC through their licensing requirements. Therefore, we are not placing any additional liner requirements on facilities or requiring them to incur any additional costs to build their conventional or non-conventional impoundments or heap leach piles above and beyond what an owner or operator of these impoundments must already incur to obtain an NRC license.

Including a double liner in the design of all onsite impoundments that would contain uranium byproduct material or tailings will reduce the potential for groundwater contamination. Although the amount of the potential reduction is not quantifiable, it is important to take this into consideration due to the significant use of ground water as a source of drinking water.

VI. Statutory and Executive Order Reviews

Additional information about these statutes and Executive Orders can be found at <http://www2.epa.gov/laws-regulations/laws-and-executive-orders>.

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

This action is a significant regulatory action that was submitted to OMB for review. The Executive Order (E.O.) defines “significant regulatory action” as one that is likely to result in a rule that may “raise novel legal or policy issues arising out of legal mandates, the President’s priorities, or the principles set forth in the Executive Order.” Any

changes made in response to OMB recommendations have been documented in the docket for this action. The EPA prepared an economic analysis of the potential costs and benefits associated with this action. This analysis, “Technical and Regulatory Support to Develop a Rulemaking to Modify the NESHAP Subpart W Standard for Radon Emissions from Operating Mill Tailings (Background Information Document and Economic Impact Analysis),” Docket No. EPA-HQ-OAR-2008-0218, is available in the docket and summarized in Section V of this preamble. This action is not a significant economic action.

B. Paperwork Reduction Act (PRA)

The information collection requirements in this rule have been submitted for approval to OMB under the PRA. The Information Collection Request (ICR) document prepared by the EPA has been assigned EPA ICR number 2464.02. You can find a copy of the ICR in the docket for this rule, and it is briefly summarized here. The information collection requirements are not enforceable until OMB approves them.

The information to be collected for the rule is based on the requirements of the CAA. Section 114 authorizes the Administrator of the EPA to require any person who owns or operates any emission source or who is subject to any requirements of the Act to:

- Establish and maintain records
- Make reports, install, use, and maintain monitoring equipment or method
- Sample emissions in accordance with EPA-prescribed locations, intervals and methods
- Provide information as may be requested

EPA’s regional offices use the information collected to ensure that public health continues to be protected from the hazards of radionuclides by compliance with health based standards and/or GACT.

The rule requires the owner or operator of a uranium recovery facility to maintain records that confirm that the conventional impoundment(s), non-conventional impoundment(s) and heap leach pile(s) meet the requirements in § 192.32(a)(1). Included in these records are the results of liner compatibility tests and documentation that a layer of liquid above solid materials has been maintained in non-conventional impoundments. This documentation should be sufficient to allow an independent auditor (such as an EPA

inspector) to verify the accuracy of the determination made concerning the facility’s compliance with the standard. These records must be kept at the mill or facility for the operational life of the facility and, upon request, be made available for inspection by the Administrator, or his/her authorized representative. The rule requires the owners or operators of operating non-conventional impoundments to submit digital photographs taken during the compliance inspections required in section 61.252(b). The recordkeeping requirements require only the specific information needed to determine compliance. We have taken this step to minimize the reporting requirements for small business facilities.

The annual monitoring and recordkeeping burden to affected sources for this collection (averaged over the first three years after the effective date of the final rule) is estimated to be 6,693 hours with a total annual cost of \$336,950 for the requirements related to documenting the liquid level in non-conventional impoundments, and a one-time expenditure of 460 hours and \$32,890 to maintain records of impoundment design and construction. This estimate includes a total capital and start-up cost component annualized over the facility’s expected useful life and a purchase of services component. We estimate that this total burden will be spread over 23 facilities that will be required to keep records.

Burden is defined at 5 CFR 1320.3(b). An agency may not conduct or sponsor, and a person is not required to respond to, a collection of information unless it displays a currently valid OMB control number. The OMB control numbers for EPA’s regulations in 40 CFR are listed in 40 CFR part 9. When OMB approves this ICR, the Agency will announce that approval in the **Federal Register** and publish a technical amendment to 40 CFR part 9 to display the OMB control number for the approved information collection activities contained in this final rule.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. The small entities subject to the requirements of this action are small businesses whose company has less than 250 employees and is primarily engaged in leaching or beneficiation of uranium, radium or vanadium ores as defined by NAICS code 212291.

The EPA has determined that small entities subject to the requirements of

this action are approximately 18 uranium recovery facilities that are currently operating or plan to operate in the future. The Agency has determined that the ten small businesses that own these facilities may experience an impact of less than 1% of total annual production costs, or less than \$0.03 per pound of uranium produced. Details of this analysis are presented in Section 6 of the BID/EIA prepared to support this rulemaking (Docket No. EPA-HQ-OAR-2008-0218).

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. The final rule imposes no enforceable duty on any state, local or tribal governments or the private sector. Thus, this rule is not subject to the requirements of sections 202 or 205 of UMRA.

This rule is also not subject to the requirements of section 203 of UMRA because it contains no regulatory requirements that might significantly or uniquely affect small governments because it contains no requirements that apply to such governments nor does it impose obligations upon them.

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. None of the facilities subject to this action are owned and operated by State governments and nothing in the final rule will supersede State regulations. Thus, E.O. 13132 does not apply to this final rule.

F. Executive Order 13175: Consultation and Coordination With Indian Tribal Governments

This action does not have tribal implications, as specified in Executive Order 13175. The action imposes requirements on owners and operators of specified area sources and not tribal governments. Thus, Executive Order 13175 does not apply to this action.

The EPA notes, however, that several tribes or tribal groups expressed interest in this rulemaking due to the proximity of some of the facilities regulated under Subpart W to tribal lands. Consistent with the EPA Policy on Consultation and Coordination with Indian Tribes, the EPA consulted with tribal officials

of the Ute Mountain Ute Tribe during development of this action. A summary of that consultation is provided in Docket No. EPA-HQ-OAR-2008-0218-0120.

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

This action is not subject to Executive Order 13045 because it is not economically significant as defined in Executive Order 12866. This action's health and risk assessments are contained in Section IV.B.2 of this preamble and in the Background Information Document prepared to support this action (Docket No. EPA-HQ-OAR-2008-0218). The updated risk assessment described in Section IV.B.2 incorporated the risk coefficients from Federal Guidance Report (FGR) No. 13, "Cancer Risk Coefficients for Environmental Exposure to Radionuclides," which includes age-averaged factors to convert radionuclide exposure (intake) to health risk. FGR 13 was developed subsequent to the risk assessment conducted to support the 1989 rulemaking, which relied upon factors applicable to adults. FGR 13 is undergoing revision.

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

This action is not a "significant energy action" because it is not likely to have a significant adverse effect on the supply, distribution, or use of energy. This final rule will not adversely affect productivity, competition, or prices in the energy sector.

I. National Technology Transfer and Advancement Act (NTTAA)

This rulemaking does not involve technical standards. The rule retains requirements for radon monitoring using Method 115 that were promulgated in 1989.

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

The EPA believes that this action does not have disproportionately high and adverse human health or environmental effects on minority populations, low-income populations and/or indigenous peoples, as specified in Executive Order 12898 (59 FR 7629, February 16, 1994). The documentation for this decision is contained in Section IV.B.2 of this preamble and the Background Information Document prepared to

support this action (Docket No. EPA-HQ-OAR-2008-0218).

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each House of the Congress and to the Comptroller General of the United States. This action is not a "major rule" as defined by 5 U.S.C. 804(2).

List of Subjects in 40 CFR Part 61

Environmental protection, Air pollution control, Hazardous substances, Radon, Tailings, Byproduct, Uranium, Reporting and recordkeeping requirements.

Dated: December 20, 2016.

Gina McCarthy,
Administrator.

For the reasons stated in the preamble, the Environmental Protection Agency amends title 40, Chapter I of the Code of Federal Regulations as follows:

PART 61—NATIONAL EMISSIONS STANDARDS FOR HAZARDOUS AIR POLLUTANTS

■ 1. The authority citation for part 61 continues to read as follows:

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

Subpart W—National Emission Standards for Radon Emissions From Operating Mill Tailings

■ 2. Section 61.251 is amended by revising paragraphs (b) through (f) and adding paragraphs (h) through (o) to read as follows:

§ 61.251 Definitions.

* * * * *

(b) *Continuous disposal* means a method of uranium byproduct material or tailings management and disposal in which uranium byproduct material or tailings are dewatered by mechanical methods immediately after generation. The dried uranium byproduct material or tailings are then placed in trenches or other disposal areas and immediately covered to limit emissions consistent with applicable Federal standards.

(c) *Dewatered* means to remove the water from recently produced uranium byproduct material or tailings by mechanical or evaporative methods such that the water content of the uranium byproduct material or tailings does not exceed 30 percent by weight.

(d) *Existing conventional impoundment* means any conventional uranium byproduct material or tailings impoundment which is licensed to accept additional uranium byproduct material or tailings and is in existence on December 15, 1989.

(e) *Operation*. Operation means that an impoundment is being used for the continued placement of uranium byproduct material or tailings or is in standby status for such placement. An impoundment is in operation from the day that uranium byproduct material or tailings are first placed in the impoundment until the day that final closure begins.

(f) *Phased disposal* means a method of uranium byproduct material or tailings management and disposal which uses lined impoundments which are filled and then immediately dried and covered to meet all applicable Federal standards.

* * * * *

(h) *Conventional impoundment*. A conventional impoundment is a permanent structure located at any uranium recovery facility which contains mostly solid uranium byproduct material or tailings from the extraction of uranium from uranium ore. These impoundments are left in place at facility closure.

(i) *Non-conventional impoundment*. A non-conventional impoundment is used for managing liquids from uranium recovery operations and contains uranium byproduct material or tailings suspended in and/or covered by liquids. These structures are commonly known as holding ponds or evaporation ponds and can be located at any uranium recovery facility. They are typically not permanent structures unless they transition to become used as conventional impoundments. Impoundments constructed for the purpose of managing liquids from closure or remediation activities (e.g., contaminated groundwater), and which are used solely for that purpose, are not subject to the requirements of this subpart.

(j) *Heap leach pile*. A heap leach pile is a pile of uranium ore placed on an engineered structure and stacked so as to allow uranium to be dissolved and removed by leaching liquids.

(k) *Standby*. Standby means the period of time that an impoundment is not accepting uranium byproduct material or tailings but has not yet entered final closure.

(l) *Uranium recovery facility*. A uranium recovery facility means a facility licensed by the NRC or an NRC Agreement State to manage uranium byproduct material or tailings during and following the processing of uranium ores. Common names for these facilities are a conventional uranium mill, an in-situ leach (or recovery) facility and a heap leach facility or pile.

(m) *Heap leach pile operational life*. The operational life of a heap leach pile

means the time period from the first time that lixiviant is placed on the heap leach pile until the time the final rinse is completed.

(n) *Final closure* means the period during which an impoundment or heap leach pile is being managed in accordance with the milestones and requirements in an approved reclamation plan. Final closure for the impoundment or heap leach pile begins when the owner or operator provides written notice to the Administrator and to the Nuclear Regulatory Commission or applicable NRC Agreement State that:

(1) A conventional impoundment is no longer receiving uranium byproduct material or tailings, is no longer on standby for such receipt and is being managed under an approved reclamation plan for that impoundment or facility closure plan; or

(2) A non-conventional impoundment is no longer required for evaporation or holding purposes, is no longer on standby for such purposes and is being managed under an approved reclamation plan for that impoundment or facility closure plan; or

(3) A heap leach pile has concluded its operational life and is being managed under an approved reclamation plan for that pile or facility closure plan.

(o) *Reclamation plan* means the plan detailing activities and milestones to accomplish reclamation of impoundments or piles containing uranium byproduct material or tailings. Activities and milestones to be addressed include, but are not limited to, dewatering and contouring of conventional impoundments and heap leach piles, and removal and disposal of non-conventional impoundments. A reclamation plan prepared and approved in accordance with 10 CFR part 40, Appendix A is considered a reclamation plan in this subpart.

■ 3. Section 61.252 is revised to read as follows:

§ 61.252 Standard.

(a) Each owner or operator of a conventional impoundment shall comply with the following requirements:

(1) Radon-222 emissions to the ambient air from an existing conventional impoundment shall not exceed 20 pCi/(m²-sec) (1.9 pCi/(ft²-sec)) of radon-222 and all owners or operators shall comply with the provisions of 40 CFR 192.32(a)(1) in the operation of the impoundment notwithstanding the exemption for existing impoundments in 40 CFR 192.32(a)(1).

(2) After December 15, 1989, no new conventional impoundment may be

built unless it is designed, constructed and operated to meet one of the two following management practices:

(i) Phased disposal in lined impoundments that are no more than 40 acres in area and comply with the requirements of 40 CFR 192.32(a)(1). The owner or operator shall have no more than two conventional impoundments, including existing conventional impoundments, in operation at any one time.

(ii) Continuous disposal such that uranium byproduct material or tailings are dewatered and immediately disposed with no more than 10 acres uncovered at any time and shall comply with the requirements of 40 CFR 192.32(a)(1).

(b) Each owner or operator of a non-conventional impoundment shall comply with the following requirements: Non-conventional impoundments shall meet the requirements of 40 CFR 192.32(a)(1). During operation and until final closure begins, the liquid level in the impoundment shall be maintained so that solid materials in the impoundment are not visible above the liquid surface, verified by daily inspections documented through notations and by digital photographic evidence collected at least weekly. Should inspection reveal that solid materials in the impoundment are visible above the liquid surface, the owner or operator must correct the situation within seven days, or other such time as specified by the Administrator.

(c) Each owner or operator of a heap leach pile shall comply with the following requirements: Heap leach piles that have completed their operating life but have not yet entered final closure shall be managed in compliance with the phased disposal management practice in paragraph (a)(2)(i) of this section. Heap leach piles shall be constructed in lined impoundments that are no more than 40 acres in area and shall comply with the requirements of 40 CFR 192.32(a)(1). The owner or operator shall have no more than two heap leach piles, including existing heap leach piles, subject to this subpart at any one time.

■ 4. Section 61.255 is revised to read as follows:

§ 61.255 Recordkeeping requirements.

(a) The owner or operator of any uranium recovery facility must maintain records that confirm that the conventional impoundment(s), non-conventional impoundment(s) and heap leach pile(s) subject to this subpart at the facility meet the requirements in 40 CFR 192.32(a)(1). These records shall

include, but not be limited to, the results of liner compatibility tests.

(b) The owner or operator of any uranium recovery facility with non-conventional impoundments must maintain written records from daily inspections and other records confirming that any sediments have remained saturated in the non-conventional impoundments at the facility. Periodic digital photographic evidence, with embedded date stamp and other identifying metadata, shall be collected no less frequently than weekly to demonstrate compliance with the requirements of § 61.252(b). Should inspection reveal that a non-conventional impoundment is not in compliance with the requirements of

§ 61.252(b), the owner or operator shall collect photographic evidence before and after the non-compliance is corrected.

(c) The records required in paragraphs (a) and (b) in this section must be kept at the uranium recovery facility for the operational life of the facility and must be made available for inspection by the Administrator, or his authorized representative.

(1) Digital photographs taken to demonstrate compliance with the requirements of § 61.252(c) shall be submitted electronically using the Subpart W Impoundment Photographic Reporting (SWIPR) system that is accessed through EPA's Central Data

Exchange (CDX) (*cdx.epa.gov*) at least monthly.

(i) Owners and operators must also submit information identifying the facility and facility location, the name or other designation of each impoundment, and the date and time of each photograph.

(ii) If the reporting form specific to this subpart is not available in SWIPR, the owner or operator must retain the digital photographs at the facility and provide them to the EPA or authorized State upon request, with the supporting information required in paragraph (c)(1)(i) of this section.

(2) [Reserved]

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or loan programs or the rights and obligations of recipients thereof; or

(4) Raise novel legal or policy issues arising out of legal mandates, the President's priorities, or the principles stated in the Executive order.

This final regulatory action is not a significant regulatory action subject to review by OMB under section 3(f) of Executive Order 12866.

We have also reviewed this final regulatory action under Executive Order 13563, which supplements and explicitly reaffirms the principles, structures, and definitions governing regulatory review established in Executive Order 12866. To the extent permitted by law, Executive Order 13563 requires that an agency—

(1) Propose or adopt regulations only upon a reasoned determination that their benefits justify their costs (recognizing that some benefits and costs are difficult to quantify);

(2) Tailor its regulations to impose the least burden on society, consistent with obtaining regulatory objectives and taking into account—among other things and to the extent practicable—the costs of cumulative regulations;

(3) In choosing among alternative regulatory approaches, select those approaches that maximize net benefits (including potential economic, environmental, public health and safety, and other advantages; distributive impacts; and equity);

(4) To the extent feasible, specify performance objectives, rather than the behavior or manner of compliance a regulated entity must adopt; and

(5) Identify and assess available alternatives to direct regulation, including economic incentives—such as user fees or marketable permits—to encourage the desired behavior, or provide information that enables the public to make choices.

Executive Order 13563 also requires an agency “to use the best available techniques to quantify anticipated present and future benefits and costs as accurately as possible.” The Office of Information and Regulatory Affairs of OMB has emphasized that these techniques may include “identifying changing future compliance costs that might result from technological innovation or anticipated behavioral changes.”

We are issuing these final priorities only on a reasoned determination that their benefits justify their costs. In choosing among alternative regulatory approaches, we selected those approaches that maximize net benefits. Based on the analysis that follows, the Department believes that this regulatory

action is consistent with the principles in Executive Order 13563.

We also have determined that this regulatory action does not unduly interfere with State, local, and tribal governments in the exercise of their governmental functions.

In accordance with both Executive orders, the Department has assessed the potential costs and benefits, both quantitative and qualitative, of this regulatory action. The potential costs are those resulting from statutory requirements and those we have determined as necessary for administering the Department's programs and activities.

The priorities included in this notice would benefit students, parents, educators, administrators, and other stakeholders by improving the quality of State assessment instruments and systems. Priority 1 will yield new, more authentic methods for collecting evidence about what students know and are able to do and provide educators with more individualized, easily integrated assessments that can support competency-based learning and other forms of personalized instruction. Priority 2 will allow for States to score non-multiple choice assessment items more quickly and at a lower cost and ensure that assessments provide timely, actionable feedback to students, parents, and educators. Priority 3 will encourage States to ensure that assessments are of high quality, maximize instructional goals, and have clear purpose and utility. Further, it will encourage States to eliminate unnecessary or redundant tests.

Intergovernmental Review: This program is subject to Executive Order 12372 and the regulations in 34 CFR part 79. One of the objectives of the Executive order is to foster an intergovernmental partnership and a strengthened federalism. The Executive order relies on processes developed by State and local governments for coordination and review of proposed Federal financial assistance.

This document provides early notification of our specific plans and actions for this program.

Accessible Format: Individuals with disabilities can obtain this document in an accessible format (e.g., braille, large print, audiotape, or compact disc) on request to the program contact person listed under **FOR FURTHER INFORMATION CONTACT**.

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Dated: August 1, 2016.

Ann Whalen,

Senior Advisor to the Secretary, Delegated the Duties of Assistant, Secretary for Elementary and Secondary Education.

[FR Doc. 2016–18530 Filed 8–5–16; 8:45 am]

BILLING CODE 4000–01–P

ENVIRONMENTAL PROTECTION AGENCY

[EPA–HQ–OAR–2009–0234; FRL–9950–31–OAR]

40 CFR Parts 60 and 63

Reconsideration on the Mercury and Air Toxics Standards (MATS) and the Utility New Source Performance Standards Startup and Shutdown Provisions; Final Action

AGENCY: Environmental Protection Agency (EPA).

ACTION: Notice of final action denying petitions for reconsideration.

SUMMARY: The U.S. Environmental Protection Agency (EPA) is providing notice that it has responded to two petitions for reconsideration of the final rule titled “Reconsideration of Certain Startup/Shutdown Issues: National Emission Standards for Hazardous Air Pollutants (NESHAP) From Coal- and Oil-Fired Electric Utility Steam Generating Units and Standards of Performance (NSPS) for Fossil-Fuel-Fired Electric Utility, Industrial-Commercial-Institutional, and Small Industrial-Commercial-Institutional Steam Generating Units,” published in the **Federal Register** on November 19, 2014. The Administrator denied the requests for reconsideration in separate letters to the petitioners. The letters and a document providing a full explanation of the agency's rationale for each denial is in the docket for these rules.

DATES: August 8, 2016.

FOR FURTHER INFORMATION CONTACT: Mr. Jim Eddinger, Sector Policies and Programs Division (D243-01), Office of Air Quality Planning and Standards, Environmental Protection Agency, Research Triangle Park, North Carolina 27711; telephone number: (919) 541-5426; fax number: (919) 541-5450; email address: eddinge.jim@epa.gov.

SUPPLEMENTARY INFORMATION:

I. How can I get copies of this document and other related information?

This **Federal Register** document, the petitions for reconsideration, the letters denying the petitions for reconsideration, and the document titled “Denial of Petitions for Reconsideration of Certain Startup/Shutdown Issues: MATS” (Reconsideration Response Document) are available in the dockets the EPA established under Docket ID No. EPA-HQ-OAR-2009-0234. The Reconsideration Response Document is available in the MATS docket by conducting a search of the title “Denial of Petitions for Reconsideration of Certain Startup/Shutdown Issues: MATS.” All documents in the dockets are listed on the www.regulations.gov Web site. Although listed in the index, some information is not publicly available, *e.g.*, confidential business information or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy form. Publicly available docket materials are available either electronically through www.regulations.gov or in hard copy at the EPA Docket Center (EPA/DC), Room 3334, EPA WJC West Building, 1301 Constitution Ave. NW., Washington, DC. The Public Reading Room is open from 8:30 a.m. to 4:30 p.m., Monday through Friday, excluding legal holidays. The telephone number for the Public Reading Room is (202) 566-1744 and the telephone number for the Air Docket is (202) 566-1742. This **Federal Register** document and the Reconsideration Response Document denying the petitions can also be found on the EPA’s Web site at <https://www.epa.gov/mats>.

II. Judicial Review

Section 307(b)(1) of the Clean Air Act (CAA) indicates which Federal Courts of Appeals have venue for petitions for review of final EPA actions. This section provides, in part, that the petitions for review must be filed in the United States Court of Appeals for the District of Columbia Circuit if: (i) The agency action consists of “nationally applicable

regulations promulgated, or final action taken, by the Administrator,” or (ii) such actions are locally or regionally applicable, if “such action is based on a determination of nationwide scope or effect and if in taking such action the Administrator finds and publishes that such action is based on such a determination.”

The EPA’s actions denying the petitions for reconsideration are nationally applicable because the underlying rules—the “National Emission Standards for Hazardous Air Pollutants (NESHAP) From Coal- and Oil-Fired Electric Utility Steam Generating Units and Standards of Performance (NSPS) for Fossil-Fuel-Fired Electric Utility, Industrial-Commercial-Institutional, and Small Industrial-Commercial-Institutional Steam Generating Units,” are nationally applicable. Thus, any petitions for review of the EPA’s decisions denying petitioners’ requests for reconsideration must be filed in the United States Court of Appeals for the District of Columbia Circuit by October 7, 2016.

III. Description of Action

On February 16, 2012, pursuant to sections 111 and 112 of the CAA, the EPA published the final rules titled “National Emission Standards for Hazardous Air Pollutants From Coal- and Oil-Fired Electric Utility Steam Generating Units and Standards of Performance for Fossil-Fuel-Fired Electric Utility, Industrial-Commercial-Institutional, and Small Industrial-Commercial-Institutional Steam Generating Units” (77 FR 9304). The NESHAP issued pursuant to CAA section 112 is referred to as the Mercury and Air Toxics Standards (MATS), and the NSPS rule issued pursuant to CAA section 111 is referred to as the Utility NSPS. Following promulgation of the final rules, the Administrator received petitions for reconsideration of numerous provisions of both MATS and the Utility NSPS pursuant to CAA section 307(d)(7)(B). The EPA received 20 petitions for reconsideration of the MATS rule and 3 petitions for reconsideration of the Utility NSPS.

On November 30, 2012, the EPA issued a proposed rule reconsidering certain new source limits in MATS, the requirements applicable during periods of startup and shutdown for MATS and the Utility NSPS (for the particulate matter standard only), certain definitional and monitoring issues in the Utility NSPS, and additional technical corrections to both MATS and the Utility NSPS (77 FR 71323). On April 24, 2013, the EPA issued the final action on reconsideration of the new

source MATS, the definitional and monitoring provisions in the Utility NSPS, and the technical corrections in both rules (78 FR 24073). The EPA issued the final action on reconsideration of the startup and shutdown provisions in the MATS and Utility NSPS on November 19, 2014 (79 FR 68777).

The EPA received two petitions for reconsideration of the November 19, 2014, final action on reconsideration of the startup and shutdown provisions in the MATS rule. One petition was submitted by the Environmental Integrity Project, the Chesapeake Climate Action Network, and the Sierra Club, and the other was submitted by the Utility Air Regulatory Group.

CAA section 307(d)(7)(B) states that “[o]nly an objection to a rule or procedure which was raised with reasonable specificity during the period for public comment (including any public hearing) may be raised during judicial review. If the person raising an objection can demonstrate to the Administrator that it was impracticable to raise such objection within such time or if the grounds for such objection arose after the period for public comment (but within the time specified for judicial review) and if such objection is of central relevance to the outcome of the rule, the Administrator shall convene a proceeding for reconsideration of the rule and provide the same procedural rights as would have been afforded had the information been available at the time the rule was proposed.”

The EPA carefully reviewed the petitions for reconsideration and evaluated all issues raised to determine if they meet the CAA section 307(d)(7)(B) criteria for reconsideration. In separate letters to the petitioners, the EPA Administrator, Gina McCarthy, denied the petitions for reconsideration. The letters were accompanied by a separate Reconsideration Response Document that articulates in detail the rationale for the EPA’s final responses. These documents are all available in the docket for this action.

Dated: July 29, 2016.

Gina McCarthy,
Administrator.

[FR Doc. 2016-18684 Filed 8-5-16; 8:45 am]

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Environmental Protection Agency

40 CFR Parts 51, 60, 61, *et al.*

Revisions to Test Methods, Performance Specifications, and Testing
Regulations for Air Emission Sources; Final Rule

ENVIRONMENTAL PROTECTION AGENCY**40 CFR Parts 51, 60, 61, and 63**

[EPA-HQ-OAR-2014-0292; FRL-9950-57-OAR]

RIN 2060-AS34

Revisions to Test Methods, Performance Specifications, and Testing Regulations for Air Emission Sources**AGENCY:** Environmental Protection Agency (EPA).**ACTION:** Final rule.

SUMMARY: This action promulgates technical and editorial corrections and revisions to regulations related to source testing of emissions. We have made corrections and updates to testing provisions, and added newly approved alternatives to existing testing regulations. These revisions will improve the quality of data and provide flexibility in the use of approved alternative procedures. The revisions do not impose any new substantive requirements on source owners or operators.

DATES: The final rule is effective on October 31, 2016. The incorporation by reference materials listed in the rule are approved by the Director of the Federal Register as of October 31, 2016.

ADDRESSES: The EPA has established a docket for this action under Docket ID No. EPA-HQ-OAR-2014-0292. All documents in the docket are listed on the <http://www.regulations.gov> Web site. Although listed in the index, some information is not publicly available, e.g., confidential business information or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, is not placed on the Internet and will be publicly available only in hard copy. Publicly available docket materials are available electronically through <http://www.regulations.gov>.

FOR FURTHER INFORMATION CONTACT: Ms. Lula H. Melton, Office of Air Quality Planning and Standards, Air Quality Assessment Division (E143-02), Environmental Protection Agency, Research Triangle Park, NC 27711; telephone number: (919) 541-2910; fax number: (919) 541-0516; email address: melton.lula@epa.gov.

SUPPLEMENTARY INFORMATION: The supplementary information in this preamble is organized as follows:

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I. General Information*A. Does this action apply to me ?*

The revisions promulgated in this final rule apply to a large number of industries that are already subject to the current provisions of 40 Code of Federal Regulations (CFR) parts 51, 60, 61, and 63. For example, Performance Specification 4A applies to municipal waste combustors and hazardous waste incinerators. We did not list all of the specific affected industries or their North American Industry Classification System (NAICS) codes herein since there are many affected sources. If you have any questions regarding the applicability of this action to a particular entity, consult either the air permitting authority for the entity or your EPA Regional representative as listed in 40 CFR 63.13.

B. What action is the Agency taking?

We are promulgating technical and editorial corrections and revisions to regulations related to source testing of emissions. More specifically, we are correcting typographical and technical errors, updating obsolete testing procedures, adding approved testing alternatives, and clarifying testing requirements.

C. Judicial Review

Under section 307(b)(1) of the Clean Air Act (CAA), judicial review of this final rule is available by filing a petition for review in the United States Court of Appeals for the District of Columbia Circuit by October 31, 2016. Under section 307(d)(7)(B) of the CAA, only an objection to this final rule that was raised with reasonable specificity during the period for public comment can be raised during judicial review. Moreover, under section 307(b)(2) of the CAA, the requirements that are the subject of this final rule may not be challenged later in civil or criminal proceedings brought by the EPA to enforce these requirements.

II. Background

The revisions to test methods, performance specifications, and testing regulations were proposed in the **Federal Register** on September 8, 2015 (80 FR 54146). The public comment period ended December 9, 2015, and 42 comment letters were received from the public. Changes were made to this final rule based on the public comments.

III. Summary of Amendments

A. Appendix M of Part 51

In paragraph (4)(a) of appendix M to part 51, Methods 30A and 30B are added to the list of methods not requiring the use of audit samples.

B. Method 201A of Appendix M of Part 51

In Method 201A, the constant in equation 9 is corrected from 0.07657 to 0.007657.

C. Method 202 of Appendix M of Part 51

In Method 202, section 3.8 is added to incorporate ASTM E617–13 by reference. The first sentence in section 8.5.4.3 is revised by adding “back half of the filterable PM filter holder.” Also, in section 8.5.4.3, sentences inadvertently omitted in the proposed rule are re-inserted. In section 9.10, the erroneous statement “You must purge the assembled train as described in sections 8.5.3.2 and 8.5.3.3.” is corrected to reference section 8.5.3. Sections 10.3 and 10.4 are added to require calibration of the field balance used to weigh impingers and to require a multipoint calibration of the analytical balance. In section 10.3, the proposed language is revised to allow the use of a Class 6 tolerance weight (or better) in lieu of the proposed Class 3 (or better) tolerance weight for checking the field balance accuracy because the calibration weight does not need to be any better than one-half of the tolerance for the measurement. Sections 11.2.2.1, 11.2.2.2, 11.2.2.3, 11.2.2.4 and figure 7 are re-inserted.

D. Appendix P of Part 51

In appendix P of part 51, section 3.3, the erroneous reference to section 2.1 of Performance Specification 2 of appendix B of part 60 is corrected to section 6.1. Also, in section 3.3, the reference to the National Bureau of Standards is changed to the National Institute of Standards and Technology. In section 5.1.3, the erroneous reference to paragraph 4.1.4 is changed to reflect the correct reference to paragraphs 3.1.4 and 3.1.5.

E. General Provisions (Subpart A) of Part 60

In the General Provisions of part 60, section 60.8(f) is revised to require the reporting of specific emissions test data in test reports. These data elements are required regardless of whether the report is submitted electronically or in paper format. Note that revisions are made to the data elements (that were listed in the proposed rule) to provide clarity and to more appropriately define and limit the extent of elements reported for each test method included in a test report. These modifications ensure that emissions test reporting includes all data necessary to assess and assure the quality of the reported emissions data and that the reported information appropriately describes and identifies the specific unit covered by the emissions test report. Section 60.17(g) is revised to add ASTM D6911–15 to the list of incorporations by reference.

F. Standards of Performance for Stationary Spark Ignition Internal Combustion Engines (Subpart JJJJ) of Part 60

We received a request for a public hearing on this rule. We held a hearing in Research Triangle Park, North Carolina on October 8, 2015. All comments received at that hearing were related to our proposed revisions to subpart JJJJ, and a transcript of that hearing is available in the rule docket [EPA–HQ–OAR–2014–0292]. We also received a substantial number of comments from the public, both supportive of and in opposition to the revisions that we proposed.

At issue is the use of specific methodologies in a manner allowing a tester to speciate the volatile organic compounds (VOC) in the emissions and, from those speciated measurements, calculate a total VOC emissions rate using Fourier Transform Infrared Spectroscopy (FTIR using Method 320 or ASTM D6348–03) or Method 18, a measurement methodology that makes use of a combination of capture and analytical approaches. We proposed to remove Method 320 and ASTM D6348–03 as options for measuring VOC emissions under subpart JJJJ due to the lack of a consistent, demonstrable, and validated approach to measuring total VOC emissions. This decision was primarily due to the lack of a discrete list of compounds identified as those constituting the total VOC for the sources affected by subpart JJJJ. We proposed to eliminate the option to use these measurement approaches and leave Method 25A itself, a total

hydrocarbon measurement approach, as the sole means of determining compliance with the total VOC emissions limits in the rule. We are concerned that implementation of Methods 320, ASTM D6348–03, and Method 18 does not provide proper and consistent quality assurance (QA) for compliance demonstration with total VOC measurement as required under subpart JJJJ.

Several commenters stated that prohibiting the use of FTIR to measure VOC and leaving Method 25A as the sole means of demonstrating compliance would result in an increased cost to industry. The commenters reasoned that this would decrease the number of tests that could be conducted in a single day because Method 25A requires more time to set up and run. We did not find compelling support for this argument. A properly conducted emissions test using FTIR technology and Method 320 or ASTM D6348–03 takes several hours to conduct, including time for equipment setup including the same sampling probe and heated sample transport line requirements as Method 25A, warmup which takes the same amount of time as Method 25A, conducting appropriate calibration and spiking data quality assessments very similar in duration to the required Method 25A calibration, actual source sampling time to span three 1-hour periods, leak tests, and post-test QA procedures common to each method. While it is possible to conduct two such test runs in a single 12- to 14-hour day, it is likewise possible to conduct two such test runs with Method 25A in that same time frame.

Several commenters also remarked that using FTIR is less complex, easier, and quicker than using Method 25A, but we do not find this argument sufficiently compelling to reverse our proposed revisions. We understand that while an experienced spectroscopist can operate an FTIR with relative ease as compared to a novice, the process of quality assuring emissions data measured by FTIR in accordance with Method 320 or ASTM D6348–03 is not a trivial matter. Calibration checks and matrix spiking of target compounds, including the “most difficult to recover” compound (as required by Method 320), is both challenging and time consuming due to the need to rule out interferences that may be caused by the emissions gas matrix while working to individually quantify each VOC in that matrix. In summation, we do not agree that the use of FTIR for quantification of total VOC is quick, easy or less expensive to

conduct when compared with the use of Method 25A.

Several commenters provided information to the docket, and others stated individually during the public hearing that they have provided a list of VOC to the docket, or have compiled a list of VOC or recommend that EPA address the FTIR measurement issue through the agency providing a list of VOC that make up 95 percent of the emissions from natural gas-fired spark ignition (SI) engines. We agree with commenters that a list of VOC could be developed; however, we recognize that the list must represent total VOC (all the VOC that could be emitted from SI engines affected by subpart JJJJ), as that is the compliance requirement stated in the rule. We have not stated that 95 percent of the VOC emissions are the target goal for such a list. In a memo to the docket of this rule (Technical memorandum dated September 28, 2015, to Docket ID No. EPA-HQ-OAR-2014-0292 titled, "Proposal to remove Methods 18, 320, and ASTM D6348-03 as Acceptable Methods for Measuring Total VOC Under 40 CFR 60, Subpart JJJJ"), we state that we are actively seeking sufficient documentation to create a complete list of VOC to support a speciated hydrocarbon measurement approach such as FTIR and/or Method 18. We received data from commenters that moves us toward compiling such a list, but we did not receive sufficient demonstration that all VOC were represented in that list. Additionally, while we received information on VOC present in well-operated and controlled engines, the data does not include VOC that may be present largely during, or only during, poor performance periods and could, thereby, serve as key indicators of engines that are not well-operated, well-controlled, or in compliance with the applicable standard. Therefore, we remain unable to define a complete list of VOC that would need to be quantified by a speciated measurement approach to demonstrate that total VOC were measured during a compliance test. Even so, we are swayed by arguments such as those made in support of speciated measurement approaches, specifically their ability to account for methane and ethane as separate quantifiable emissions.

Two commenters remarked that they do not believe that Method 25A is able to produce accurate total VOC values because there is an inherent issue with the "difference or subtraction" method when applied to compressed natural gas (CNG)-based emissions. We reviewed the data provided by the commenters in this respect and did not arrive at the

same conclusion. Our review shows that the commenters appear to double-count some of the emissions in arriving at their results and do not present compelling evidence that demonstrates the ability of a hydrocarbon cutter to remove all ethane from the measured gas.

Two commenters stated that FTIR can measure real-time non-methane, non-ethane VOC. We agree that this speciated approach is capable of providing emissions data for methane, ethane, and other VOC in near-real-time.

One commenter recommended that we allow FTIR methods since FTIR is the only technology that can provide a mass emissions rate and since FTIR does not have a zero drift nor calibration drift problem like Method 25A. Subpart JJJJ requires the calculation of a mass emissions rate on a propane basis and Method 25A, calibrated with propane and using the molecular weight of propane (44.01 lb/lb-mol) for mass emissions calculations, is quite capable of providing a mass emissions rate appropriate for determination of compliance with the VOC standards in subpart JJJJ. In regard to zero drift, Method 25A has QA and quality control (QC) criteria to limit the acceptance of data where instrument drift is excessive.

Three commenters noted that we did not provide supporting data for proposing to disallow FTIR methods that have been allowed under subpart JJJJ for the past 7 years. We submitted a supporting memo to the docket (Technical memorandum dated September 28, 2015, to Docket ID No. EPA-HQ-OAR-2014-0292 titled, "Proposal to Remove EPA Methods 18, 320, and ASTM D6348-03 as Acceptable Methods for Measuring Total VOC Under 40 CFR 60, Subpart JJJJ") that provides the reasoning and justification for our proposal.

One commenter recommended that changes to subpart JJJJ test methods be proposed as a separate rulemaking under subpart JJJJ. We believe that we have the authority to make necessary or otherwise appropriate changes to a specific test procedure or pollutant measurement requirement in a rule through this periodic rulemaking.

One commenter agreed with our proposed position that FTIR should not be used to measure total VOC, but remarked that Method 18 should continue to be allowed since it allows direct measurement of VOC constituents using gas chromatography and does not rely on differential methods or require multiple test methods. We found the latter arguments and reasoning to be persuasive and compelling. Method 18 does contain provisions to screen and

calibrate for VOC present in the emissions and thereby measure total VOC from a specific source. While this can be a complex and sometimes tedious undertaking, we recognize that it is an appropriate approach to measure total VOC from a specific source and are modifying the final rule language to reflect that this is allowable.

Two additional commenters agreed with our proposed position that the current FTIR methodologies are not adequately measuring total VOC. One of the commenters remarked that testers do not provide adequate total VOC results. The other commenter recommended only allowing FTIR if the QA is complete and accurate and if all VOC are proven to be accounted for. We are swayed by this commenter's support for complete QA/QC of data and stipulation that all VOC are proven to be accounted for. Although we do not currently possess sufficient data to compile a complete list of VOCs expected to be emitted from SI engines, we believe that where data with complete QA/QC are available, we may acquire sufficient data over time.

This action finalizes requirements to clarify the conduct of QA/QC procedures and report the QA/QC data with the emissions measurement data when applying Method 320 and ASTM D6348-03. We will revisit this decision and make a subsequent determination of the appropriateness for the use of Method 320 and/or ASTM-D6348 during the first risk and technology review evaluation for this sector.

In Table 2 of subpart JJJJ, the allowances to use Method 320 and ASTM D6348-03 are retained. The language requiring the reporting of specific QA/QC data when these test methods are used has been added to paragraph 60.4245(d).

The typographical error in the proposed Table 2 of subpart JJJJ is corrected; "methane cutter" is replaced with "hydrocarbon cutter" in paragraph (5) of section c.

G. Method 1 of Appendix A-1 of Part 60

In Method 1, section 11.2.1.2, the word "instances" is changed to "distances" in the second sentence, and the last two sentences in this section (inadvertently omitted in the proposed rule) are re-inserted. The second figure labeled Figure 1-2 is deleted because two figures labeled Figure 1-2 were inadvertently included.

H. Method 2 of Appendix A-1 of Part 60

In Method 2, instructions are given for conducting S-type pitot calibrations. Currently, the same equipment is commonly used for both Methods 2 and

2G (same S-type pitot), but the calibration procedure is slightly different in each method. Other key pieces that enhance the QA/QC of the calibrations are added to Method 2, and the amount of blockage allowed is reduced to improve calibration accuracy. To address these issues, changes are made to sections 6.7, 10.1.2.3, 10.1.3.4, 10.1.3.7, and 10.1.4.1.3 of Method 2. Sentences in section 6.7 (inadvertently omitted in the proposed rule) are re-inserted. In section 10.1.4.3, the erroneous reference to section 10.1.4.4 is corrected to section 12.4.4. The portion of Figure 2–10 labeled (b) is deleted because it is erroneous, and the label (a) is removed from the figure.

I. Method 2G of Appendix A–2 of Part 60

In Method 2G, instructions are given for conducting S-type pitot calibrations. Currently, the same equipment is commonly used for both Methods 2 and 2G (same S-type pitot), but the calibration procedure is slightly different in each method. Other key pieces that enhance the QA/QC of the calibrations are added to the method, and the amount of blockage allowed is reduced to tighten up calibration accuracy. Changes are made to sections 6.11.1, 6.11.2, 10.6.6, and 10.6.8 of Method 2G to address these issues. In section 10.6.6, the proposed language regarding recording rotational speed is revised based on a public comment.

J. Method 3C of Appendix A–2 of Part 60

In Method 3C, section 6.3 is revised to add subsections (6.3.1, 6.3.2, 6.3.3, 6.3.4, and 6.3.5) that clarify the requirements necessary to check analyzer linearity.

K. Method 4 of Appendix A–3 of Part 60

In Method 4, section 10.3 (Field Balance) is added to require calibration of the balance used to weigh impingers. In section 10.3, the proposed language is revised to allow the use of a Class 6 tolerance weight (or better) in lieu of the proposed Class 3 (or better) tolerance weight for checking the field balance accuracy because the calibration weight does not need to be any better than one-half of the tolerance for the measurement. Section 12.2.5, which gives another option for calculating the approximate moisture content, is added. Section 16.4 is revised to clarify that a fuel sample must be taken and analyzed to develop F-factors required by the alternative procedure. Also, in section 16.4, percent relative humidity is inadvertently defined as “calibrated

hydrometer acceptable”; the word “hydrometer” is replaced with “hygrometer.”

L. Method 5 of Appendix A–3 of Part 60

In Method 5, we erroneously finalized the reference to the Isostack metering system in 79 FR 11228. Therefore, this reference from section 6.1.1.9 is removed. Broadly applicable test method determinations or letters of assessments, regarding whether specific alternative metering equipment meets the specifications of the method as was our intent in the “Summary of Comments and Responses on Revisions to Test Methods and Testing Regulations” (EPA–HQ–OAR–2010–0114–0045), will continue to be issued. In section 6.1.1.9, the parenthetical phrase “(rechecked at least one point after each test)” is removed since the requirements for temperature sensors are given in section 10.5 of Method 5. The phrase “after ensuring that all joints have been wiped clean of silicone grease” is removed from section 8.7.6.2.5. Sections 10.7 and 10.8 are added to require calibration of the balance used to weigh impingers and to require a multipoint calibration of the analytical balance. In section 10.7, the proposed language is revised to allow the use of a Class 6 tolerance weight (or better) in lieu of the proposed Class 3 (or better) tolerance weight for checking the field balance accuracy because the calibration weight does not need to be any better than one-half of the tolerance for the measurement. In section 10.8, the proposed language is revised to “Audit the balance each day it is used for gravimetric measurements by weighing at least one ASTM E617–13 Class 2 tolerance (or better) calibration weight that corresponds to 50 to 150 percent of the weight of one filter or between 1 g and 5 g.”

M. Method 5H of Appendix A–3 of Part 60

In Method 5H, sections 10.4 and 10.5 are added to require calibration of the field balance used to weigh impingers and to require a multipoint calibration of the analytical balance. In section 10.4, the proposed language is revised to allow the use of a Class 6 tolerance weight (or better) in lieu of the proposed Class 3 (or better) tolerance weight for checking the field balance accuracy because the calibration weight does not need to be any better than one-half of the tolerance for the measurement. In section 10.5, the proposed language is revised to “Audit the balance each day it is used for gravimetric measurements by weighing at least one ASTM E617–13 Class 2 tolerance (or better)

calibration weight that corresponds to 50 to 150 percent of the weight of one filter or between 1 g and 5 g.”

N. Method 5I of Appendix A–3 of Part 60

In Method 5I, sections 10.1 and 10.2 are added to require calibration of the field balance used to weigh impingers and to require a multipoint calibration of the analytical balance. In section 10.1, the proposed language is revised to allow the use of a Class 6 tolerance weight (or better) in lieu of the proposed Class 3 (or better) tolerance weight for checking the field balance accuracy because the calibration weight does not need to be any more accurate than one-half of the tolerance for the measurement. In section 10.2, the proposed language is revised to “Audit the balance each day it is used for gravimetric measurements by weighing at least one ASTM E617–13 Class 2 tolerance (or better) calibration weight that corresponds to 50 to 150 percent of the weight of one filter or between 1 g and 5 g.”

O. Method 6C of Appendix A–4 of Part 60

In Method 6C, the language detailing the methodology for performing interference checks in section 8.3 is revised to clarify and streamline the procedure. While we continue to believe that quenching can be an issue for fluorescence analyzers, the language regarding quenching that was promulgated on February 27, 2014, has raised many questions and is being removed. It is our opinion that the interference check, if done properly, using sulfur dioxide (SO₂) and both levels of carbon dioxide (CO₂) as specified in Table 7E–3 of Method 7E, will evaluate effects due to quenching. We will continue to evaluate data as it becomes available and propose additional language, as needed. However, if you believe that quenching is an issue, we recommend that you repeat the interference check using the CO₂ values specified in Table 7E–3 and an SO₂ value similar to your measured stack emissions.

P. Method 7E of Appendix A–4 of Part 60

In Method 7E, section 8.1.2, the requirements/specifications for the 3-point sampling line are revised to be consistent with Performance Specification 2; the new requirement is 0.4, 1.2, and 2.0 meters.

The language in section 8.2.7 regarding quenching that was promulgated on February 27, 2014, has raised many questions, and is being

removed at this time. It is our opinion that the interference check, if done properly, using the gas levels specified in Table 7E-3 of Method 7E, will evaluate analyzer bias. We will continue to evaluate data as it becomes available and propose additional language in the future as needed. However, if you feel that analyzer bias is an issue, we recommend that you repeat the interference check using calibration gas values similar to your measured stack emissions. The language in section 8.2.7 requiring that the interference check be performed periodically or after major repairs has also been removed to be consistent with the language found in section 8.2.7 (2), which states "This interference test is valid for the life of the instrument unless major analytical components (e.g., the detector) are replaced with different model parts."

The word "equations" is replaced with "equation" in the sentence in section 12.8 that reads "If desired, calculate the total NO_x concentration with a correction for converter efficiency using equation 7E-8."

We requested and received comments on the stratification test in Method 7E. We will consider the comments and propose changes in a future rulemaking.

Q. Method 10 of Appendix A-4 of Part 60

In Method 10, sections 6.2.5 and 8.4.2 are revised, and section 6.2.6 is added to clarify the types of sample tanks allowed for integrated sampling.

R. Methods 10A and 10B of Appendix A-4 of Part 60

Methods 10A and 10B are revised to allow the use of sample tanks as an alternative to flexible bags for sample collection.

S. Method 15 of Appendix A-5 of Part 60

In Method 15, section 8.3.2 is revised to clarify the calibrations that represent partial calibration.

T. Method 16C of Appendix A-6 of Part 60

In Method 16C, section 12.2, equation 16C-1 is revised to replace C_v (manufacturer certified concentration of a calibration gas in ppmv SO₂) in the denominator with CS (calibration span in ppmv). The definition of CS is added to the nomenclature in section 12.1, and the definition of C_v is retained in the nomenclature in section 12.1 because C_v is in the numerator of equation 16C-1.

U. Method 18 of Appendix A-6 of Part 60

In Method 18, section 8.2.1.5.2.3 is removed because the General Provisions to Part 60 already include a requirement to analyze two field audit samples as described in section 9.2.

V. Method 25C of Appendix A-7 of Part 60

In Method 25C, section 9.1 is corrected to reference section 8.4.2 instead of section 8.4.1. Section 11.2 is deleted because the audit sample analysis is now covered under the General Provisions to Part 60. The nomenclature is revised in section 12.1, and equation 25C-2 is revised in section 12.3. Sections 12.4, 12.5, 12.5.1, and 12.5.2 are added to incorporate equations to correct sample concentrations for ambient air dilution. In section 12.5.2, the reference to equation 25C-4 is corrected to 25C-5.

W. Method 26 of Appendix A-8 of Part 60

In Method 26, section 13.3 is revised to indicate the correct method detection limit; the equivalent English unit for the metric quantity is added.

X. Method 26A of Appendix A-8 of Part 60

In Method 26A, language regarding minimizing chloride interferences is added to section 4.3. Also in section 4.3, the first sentence (inadvertently omitted in the proposed rule) is re-inserted.

Sections 6.1.7 and 8.1.5 are not changed in this final rule. The language in the proposed rule that revised the required probe and filter temperature requirements in sections 6.1.7 and 8.1.5 to allow a lower probe and filter temperature was an error.

In section 8.1.6, the typographical error, ". . . between 120 and 134 °C (248 and 275 °F . . .)", is corrected to ". . . between 120 and 134 °C (248 and 273 °F . . .)".

Y. Method 29 of Appendix A-8 of Part 60

In Method 29, section 8.2.9.3 is revised to require rinsing impingers containing permanganate with hydrogen chloride (HCl) to ensure consistency with the application of Method 29 across various stationary source categories and because there is evidence that HCl is needed to release the mercury (Hg) bound in the precipitate from the permanganate. Sections 10.4 and 10.5 are added to require calibration of the field balance used to weigh impingers and to require a multipoint calibration of the analytical balance. In section 10.4, the proposed language is

revised to allow the use of a Class 6 tolerance weight (or better) in lieu of the proposed Class 3 (or better) tolerance weight for checking the field balance accuracy because the calibration weight does not need to be any better than one-half of the tolerance for the measurement.

Z. Method 30A of Appendix A-8 of Part 60

In Method 30A, the heading of section 8.1 is changed from "Sample Point Selection" to "Selection of Sampling Sites and Sampling Points."

AA. Method 30B of Appendix A-8 of Part 60

In Method 30B, the heading of section 8.1 is changed from "Sample Point Selection" to "Selection of Sampling Sites and Sampling Points." In section 8.3.3.8, the reference to ASTM WK223 is changed to ASTM D6911-15, and the last two sentences in this section (inadvertently omitted in the proposed rule) are re-inserted.

BB. Appendix B to Part 60—Performance Specifications

In the index to appendix B to part 60, Performance Specification 16—Specifications and Test Procedures for Predictive Emission Monitoring Systems in Stationary Sources is added.

CC. Performance Specification 1 of Appendix B of Part 60

In Performance Specification 1, paragraph 8.1(2)(i) is revised in order to not limit the location of a continuous opacity monitoring system (COMS) to a point at least four duct diameters downstream and two duct diameters upstream from a control device or flow disturbance. Paragraph 8.1(2)(i) refers to paragraphs 8.1(2)(ii) and 8.1(2)(iii) for additional options.

DD. Performance Specification 2 of Appendix B of Part 60

In Performance Specification 2, the definition of span value is revised in section 3.11. The sentence, "For spans less than 500 ppm, the span value may either be rounded upward to the next highest multiple of 10 ppm, or to the next highest multiple of 100 ppm such that the equivalent emissions concentration is not less than 30 percent of the selected span value.", is added to section 3.11. Also, in section 6.1.1, the data recorder language is revised. In section 6.1.2, the term "high-level" is changed to "span" to be consistent with the definition of span value discussed above. In section 16.3.2, the characters "|dverbar" are replaced with \bar{d} which is the average difference between

responses and the concentration/ responses. In section 18, Table 2–2 is detached from Figure 2–1, and the figure is clearly labeled as “Calibration Drift Determination.”

EE. Performance Specification 3 of Appendix B of Part 60

In Performance Specification 3, section 13.2 is revised to clarify how to calculate relative accuracy. The absolute value symbol is added to the proposed definition of absolute value of the mean of the differences.

FF. Performance Specification 4A of Appendix B of Part 60

In Performance Specification 4A, the response time test procedure in sections 8.3 and 8.3.1 is revised. In section 8.3.1, the next to the last sentence is reworded to “Repeat the entire procedure until you have three sets of data to determine the mean upscale and downscale response times.” Also, the proposed response time requirement in section 13.3 is revised to 240 seconds.

GG. Performance Specification 11 of Appendix B of Part 60

In Performance Specification 11, equations 11–1 and 11–2 are revised in section 12.1, and the response range is used in lieu of the upscale value in section 13.1. In section 12.1, the sentence in paragraph (3) that was inadvertently omitted is re-inserted.

HH. Performance Specification 15 of Appendix B of Part 60

In Performance Specification 15, the statement, “An audit sample is obtained from the Administrator,” is deleted from paragraph 9.1.2. Also, in Performance Specification 15, reserved sections 14.0 and 15.0 are added.

II. Performance Specification 16 of Appendix B of Part 60

In Performance Specification 16, Table 16–1 is changed to be consistent with conventional statistical applications; the values listed in the column labelled $n - 1$ (known as degrees of freedom) are corrected to coincide with standard t-tables, and the footnote is clarified. Section 12.2.3 is revised for selection of $n - 1$ degrees of freedom.

JJ. Procedure 2 of Appendix F of Part 60

In Procedure 2, equations 2–2 and 2–3 in section 12.0 are revised to correctly define the denominator when calculating calibration drift. Also, equation 2–4 in section 12.0 is revised to correctly define the denominator when calculating accuracy. The proposed equation 2–4 is revised to:

$$\text{Accuracy} = \frac{|V_M - V_R|}{V_R} \times 100$$

KK. General Provisions (Subpart A) of Part 61

Section 61.13(e)(1)(i) of the General Provisions of Part 61 is revised to add Methods 30A and 30B to the list of methods not requiring the use of audit samples.

LL. Method 107 of Appendix B of Part 61

In Method 107, the term “Geon” is deleted from the heading in section 11.7.3.

MM. General Provisions (Subpart A) of Part 63

In the General Provisions of Part 63, section 63.7(c)(2)(iii)(A) is revised to add Methods 30A and 30B to the list of methods not requiring the use of audit samples.

Section 63.7(g)(2) is revised to require the reporting of specific emissions test data in test reports. These data elements are required regardless of whether the report is submitted electronically or in paper format. Revisions are made to the list of proposed data elements to provide clarity and to more appropriately define and limit the extent of elements reported for each test method included in a test report. These modifications ensure that emissions test reporting includes all data necessary to assess and assure the quality of the reported emissions data and that the reported information appropriately describes and identifies the specific unit covered by the emissions test report.

NN. Method 320 of Appendix A of Part 63

In Method 320, sections 13.1, 13.4, and 13.4.1 are revised to indicate the correct Method 301 reference.

IV. Public Comments on the Proposed Rule

Forty-two comment letters were received on the proposed rule. The public comments and the agency’s responses are summarized in the Summary of Comments and Responses document located in the docket for this rule. See the ADDRESSES section of this preamble.

V. 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 (E.O.) 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).

B. Paperwork Reduction Act (PRA)

This action does not impose an information collection burden under the PRA. This action does not add information collection requirements; it makes corrections and updates to existing testing methodology. In addition, this action clarifies performance testing requirements.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities under the RFA. In making this determination, the impact of concern is any significant adverse economic impact on small entities. An agency may certify that a rule will not have a significant economic impact on a substantial number of small entities if the rule relieves regulatory burden, has no net burden or otherwise has a positive economic effect on the small entities subject to the rule. This action will not impose emission measurement requirements beyond those specified in the current regulations, nor does it change any emission standard. We have, therefore, concluded that this action will have no net regulatory burden for all directly regulated small entities.

D. Unfunded Mandates Reform Act (UMRA)

This action does not contain any unfunded mandate as described in UMRA, 2 U.S.C. 1531–1538, and does not significantly or uniquely affect small governments. The action imposes no enforceable duty on any state, local or tribal governments or the private sector.

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. This action simply corrects and updates existing testing regulations. Thus, Executive Order 13175 does not apply to this action.

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

The EPA interprets Executive Order 13045 as applying only to those regulatory actions that concern environmental health or safety risks that the 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 (NTTAA) and 1 CFR Part 51

This action involves technical standards. The EPA used ASTM D6911–15 for packaging and shipping samples in Method 30B. The ASTM D6911–15 standard provides guidance on the selection of procedures for proper packaging and shipment of environmental samples to the laboratory for analysis to ensure compliance with appropriate regulatory programs and protection of sample integrity during shipment.

The EPA used ASTM E617–13 for laboratory weights and precision mass standards in Methods 4, 5, 5H, 5I, 29, and 202. The ASTM E617–13 standard covers weights and mass standards used in laboratories for specific classes.

The ASTM D6911–15 and ASTM E617–13 standards were developed and adopted by the American Society for Testing and Materials (ASTM). These standards may be obtained from <http://www.astm.org> or from the ASTM at 100 Barr Harbor Drive, P.O. Box C700, West Conshohocken, PA 19428–2959.

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

The EPA believes that this action is not subject to Executive Order 12898 (59 FR 7629, February 16, 1994) because it does not establish an environmental health or safety standard. This action is a technical correction to previously promulgated regulatory actions and does not have an impact on human health or the environment.

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each house of the Congress and to the Comptroller General of the United States. This action is not a “major rule” as defined by 5 U.S.C. 804(2).

List of Subjects

40 CFR Part 51

Environmental protection, Administrative practice and procedure, Air pollution control, Incorporation by reference, Reporting and recordkeeping requirements, Volatile organic compounds.

40 CFR Part 60

Environmental protection, Administrative practice and procedure, Air pollution control, Incorporation by reference, Volatile organic compounds.

40 CFR Parts 61 and 63

Environmental protection, Administrative practice and procedure, Air pollution control, Reporting and recordkeeping requirements.

Dated: August 5, 2016.

Gina McCarthy,
Administrator.

For the reasons stated in the preamble, the Environmental Protection Agency amends title 40, chapter I of the Code of Federal Regulations as follows:

PART 51—REQUIREMENTS FOR PREPARATION, ADOPTION, AND SUBMITTAL OF IMPLEMENTATION PLANS

- 1. The authority citation for part 51 continues to read as follows:

Authority: 23 U.S.C. 101; 42 U.S.C. 7401–7671q.

- 2. Amend appendix M to part 51 as follows:
 - a. Revise section 4.0a.
 - b. Revise section 12.5, equations 8 and 9, in Method 201A.
 - c. In Method 202:
 - i. Add section 3.8.
 - ii. Revise sections 8.5.4.3 and 9.10.
 - iii. Add sections 10.3, 10.4, 11.2.2.1, 11.2.2.2, 11.2.2.3, and 11.2.2.4.
 - iv. Add Figure 7 to section 18.0.

The additions and revisions read as follows:

Appendix M to Part 51—Recommended Test Methods for State Implementation Plans

* * * * *

*4.0 * * **

a. The source owner, operator, or representative of the tested facility shall

obtain an audit sample, if commercially available, from an AASP for each test method used for regulatory compliance purposes. No audit samples are required for the following test methods: Methods 3A and 3C of appendix A–3 of part 60 of this chapter, Methods 6C, 7E, 9, and 10 of appendix A–4 of part 60, Methods 18 and 19 of appendix A–6 of part 60, Methods 20, 22, and 25A of appendix A–7 of part 60, Methods 30A and 30B of appendix A–8 of part 60, and Methods 303, 318, 320, and 321 of appendix A of part 63 of this chapter. If multiple sources at a single facility are tested during a compliance test event, only one audit sample is required for each method used during a compliance test. The compliance authority responsible for the compliance test may waive the requirement to include an audit sample if they believe that an audit sample is not necessary. “Commercially available” means that two or more independent AASPs have blind audit samples available for purchase. If the source owner, operator, or representative cannot find an audit sample for a specific method, the owner, operator, or representative shall consult the EPA Web site at the following URL, <http://www.epa.gov/ttn/emc>, to confirm whether there is a source that can supply an audit sample for that method. If the EPA Web site does not list an available audit sample at least 60 days prior to the beginning of the compliance test, the source owner, operator, or representative shall not be required to include an audit sample as part of the quality assurance program for the compliance test. When ordering an audit sample, the source owner, operator, or representative shall give the sample provider an estimate for the concentration of each pollutant that is emitted by the source or the estimated concentration of each pollutant based on the permitted level and the name, address, and phone number of the compliance authority. The source owner, operator, or representative shall report the results for the audit sample along with a summary of the emissions test results for the audited pollutant to the compliance authority and shall report the results of the audit sample to the AASP. The source owner, operator, or representative shall make both reports at the same time and in the same manner or shall report to the compliance authority first and then report to the AASP. If the method being audited is a method that allows the samples to be analyzed in the field, and the tester plans to analyze the samples in the field, the tester may analyze the audit samples prior to collecting the emission samples provided a representative of the compliance authority is present at the testing site. The tester may request and the compliance authority may grant a waiver to the requirement that a representative of the compliance authority must be present at the testing site during the field analysis of an audit sample. The source owner, operator, or representative may report the results of the audit sample to the compliance authority and then report the results of the audit sample to the AASP prior to collecting any emission samples. The test protocol and final test report shall document whether an audit sample was ordered and

utilized and the pass/fail results as applicable.

* * * * *

Method 201A—Determination of PM₁₀ and PM_{2.5} Emissions From Stationary Sources (Constant Sampling Rate Procedure)

* * * * *

12.5 * * *

For N_{re} less than 3,162:

$$Q_{IV} = 0.0060639 \left[\frac{\mu}{C^{0.4242}} \right] \left[\frac{P_s M_w}{T_s} \right]^{-0.5759} \left[\frac{1}{D_{50}} \right]^{0.8481} \quad (\text{Eq. 8})$$

For N_{re} greater than 3,162:

$$Q_{IV} = 0.007657 \left[\frac{\mu}{C^{0.6205}} \right] \left[\frac{P_s M_w}{T_s} \right]^{-0.3795} \left[\frac{1}{D_{50}} \right]^{0.1241} \quad (\text{Eq. 9})$$

* * * * *

Method 202—Dry Impinger Method for Determining Condensable Particulate Emissions From Stationary Sources

* * * * *

3.8 *ASTM E617-13*. ASTM E617-13 “Standard Specification for Laboratory Weights and Precisions Mass Standards,” approved May 1, 2013, was developed and adopted by the American Society for Testing and Materials (ASTM). The standards cover weights and mass standards used in laboratories for specific classes. The ASTM E617-13 standard has been approved for incorporation by reference by the Director of the Office of the Federal Register in accordance with 5 U.S.C. 552(a) and 1 CFR part 51. The standard may be obtained from <http://www.astm.org> or from the ASTM at 100 Barr Harbor Drive, P.O. Box C700, West Conshohocken, PA 19428-2959. All approved material is available for inspection at EPA WJC West Building, Room 3334, 1301 Constitution Ave. NW., Washington, DC 20460, telephone number 202-566-1744. It is also available for inspection at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202-741-6030 or go to http://www.archives.gov/federal_register/code_of_federal_regulations/ibr_locations.html.

* * * * *

8.5.4.3 *CPM Container #2, Organic rinses*. Follow the water rinses of the back half of the filterable PM filter holder, probe extension, condenser, each impinger, and all of the connecting glassware and front half of the CPM filter with an acetone rinse. Recover the acetone rinse into a clean, leak-proof container labeled with test identification and “CPM Container #2, Organic Rinses.” Then repeat the entire rinse procedure with two rinses of hexane, and save the hexane rinses in the same container as the acetone rinse

(CPM Container #2). Mark the liquid level on the jar.

* * * * *

9.10 *Field Train Recovery Blank*. You must recover a minimum of one field train blank for each source category tested at the facility. You must recover the field train blank after the first or second run of the test. You must assemble the sampling train as it will be used for testing. Prior to the purge, you must add 100 ml of water to the first impinger and record this data on Figure 4. You must purge the assembled train as described in section 8.5.3. You must recover field train blank samples as described in section 8.5.4. From the field sample weight, you will subtract the condensable particulate mass you determine with this blank train or 0.002 g (2.0 mg), whichever is less.

* * * * *

10.3 *Field Balance Calibration Check*. Check the calibration of the balance used to weigh impingers with a weight that is at least 500g or within 50g of a loaded impinger. The weight must be ASTM E617-13 “Standard Specification for Laboratory Weights and Precision Mass Standards” Class 6 (or better). Daily before use, the field balance must measure the weight within $\pm 0.5g$ of the certified mass. If the daily balance calibration check fails, perform corrective measures and repeat the check before using balance.

10.4 *Analytical Balance Calibration*. Perform a multipoint calibration (at least five points spanning the operational range) of the analytical balance before the first use, and semiannually thereafter. The calibration of the analytical balance must be conducted using ASTM E617-13 “Standard Specification for Laboratory Weights and Precision Mass Standards” Class 2 (or better) tolerance weights. Audit the balance each day it is used for gravimetric measurements by weighing at least one ASTM E617-13 Class 2 tolerance (or better) calibration weight that corresponds to 50 to 150 percent of the weight of one filter or between 1g and

5g. If the scale cannot reproduce the value of the calibration weight to within 0.5mg of the certified mass, perform corrective measures, and conduct the multipoint calibration before use.

* * * * *

11.2.2.1 Determine the inorganic fraction weight. Transfer the aqueous fraction from the extraction to a clean 500-ml or smaller beaker. Evaporate to no less than 10 ml liquid on a hot plate or in the oven at 105 °C and allow to dry at room temperature (not to exceed 30 °C (85 °F)). You must ensure that water and volatile acids have completely evaporated before neutralizing nonvolatile acids in the sample. Following evaporation, desiccate the residue for 24 hours in a desiccator containing anhydrous calcium sulfate. Weigh at intervals of at least 6 hours to a constant weight. (See section 3.0 for a definition of constant weight.) Report results to the nearest 0.1 mg on the CPM Work Table (see Figure 6 of section 18) and proceed directly to section 11.2.3. If the residue cannot be weighed to constant weight, re-dissolve the residue in 100 ml of deionized distilled ultra-filtered water that contains 1 ppmw (1 mg/L) residual mass or less and continue to section 11.2.2.2.

11.2.2.2 Use titration to neutralize acid in the sample and remove water of hydration. If used, calibrate the pH meter with the neutral and acid buffer solutions. Then titrate the sample with 0.1N NH₄OH to a pH of 7.0, as indicated by the pH meter or colorimetric indicator. Record the volume of titrant used on the CPM Work Table (see Figure 6 of section 18).

11.2.2.3 Using a hot plate or an oven at 105 °C, evaporate the aqueous phase to approximately 10 ml. Quantitatively transfer the beaker contents to a clean, 50-ml pre-weighed tin and evaporate to dryness at room temperature (not to exceed 30 °C (85 °F)) and pressure in a laboratory hood. Following evaporation, desiccate the residue for 24 hours in a desiccator containing

anhydrous calcium sulfate. Weigh at intervals of at least 6 hours to a constant weight. (See section 3.0 for a definition of constant weight.) Report results to the nearest 0.1 mg on the CPM Work Table (see Figure 6 of section 18).

11.2.2.4 Calculate the correction factor to subtract the NH_4^+ retained in the sample using Equation 1 in section 12.

18.0 Tables, Diagrams, Flowcharts and Validation Data

* * * * *

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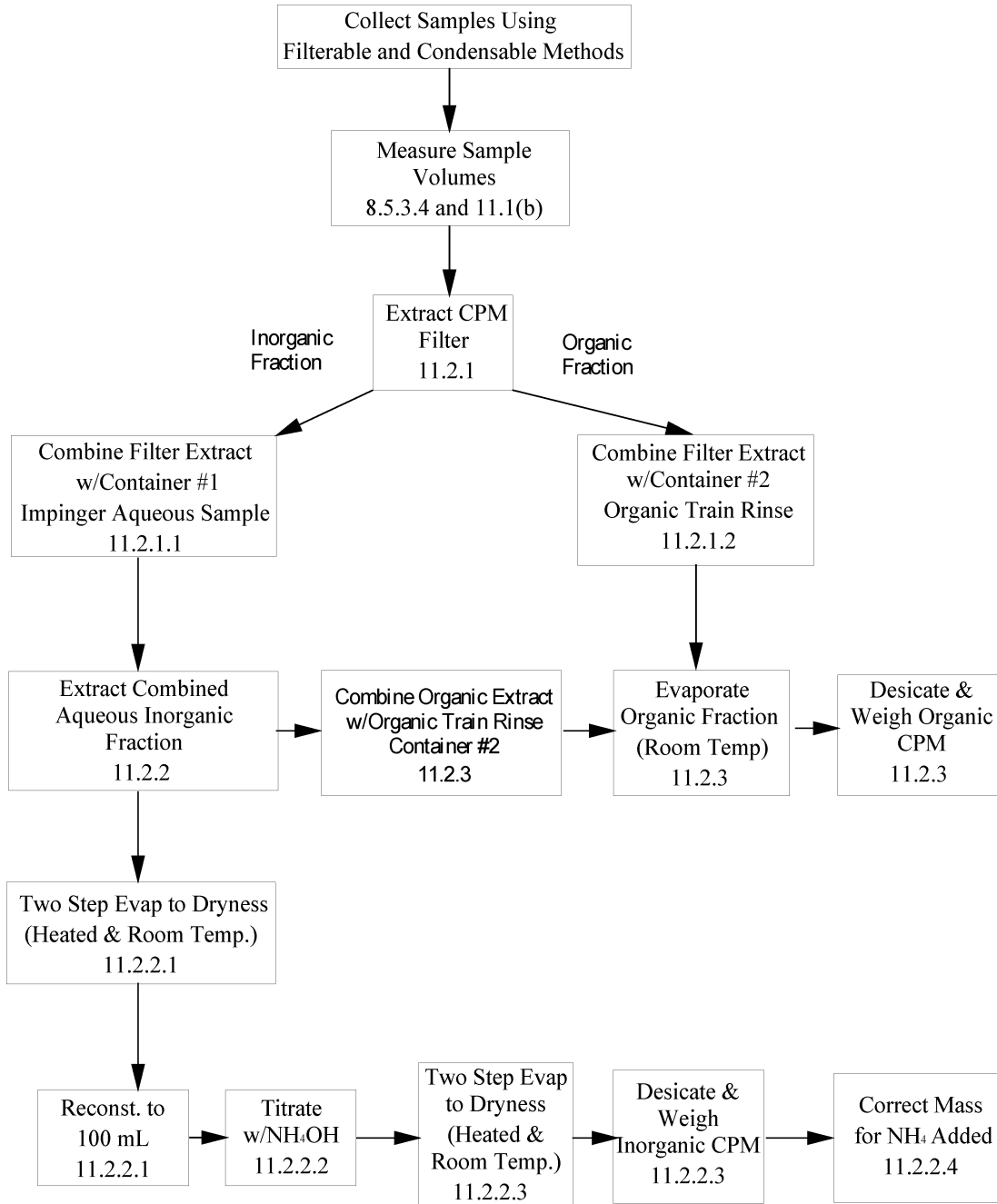


Figure 7. CPM Sample Processing Flow Chart

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■ 3. Revise sections 3.3 and 5.1.3 of appendix P to part 51 to read as follows:

Appendix P to Part 51—Minimum Emission Monitoring Requirements

* * * * *

3.3 Calibration Gases. For nitrogen oxides monitoring systems installed on fossil fuel-

fired steam generators, the pollutant gas used to prepare calibration gas mixtures (section 6.1, Performance Specification 2, appendix B, part 60 of this chapter) shall be nitric oxide (NO). For nitrogen oxides monitoring systems

installed on nitric acid plants, the pollutant gas used to prepare calibration gas mixtures (section 6.1, Performance Specification 2, appendix B, part 60 of this chapter) shall be nitrogen dioxide (NO2). These gases shall also be used for daily checks under paragraph 3.7 of this appendix as applicable. For sulfur dioxide monitoring systems installed on fossil fuel-fired steam generators or sulfuric acid plants, the pollutant gas used to prepare calibration gas mixtures (section 6.1, Performance Specification 2, appendix B, part 60 of this chapter) shall be sulfur dioxide (SO2). Span and zero gases should be traceable to National Bureau of Standards reference gases whenever these reference gases are available. Every 6 months from date of manufacture, span and zero gases shall be reanalyzed by conducting triplicate analyses using the reference methods in appendix A, part 60 of this chapter as follows: for SO2, use Reference Method 6; for nitrogen oxides, use Reference Method 7; and for carbon dioxide or oxygen, use Reference Method 3. The gases may be analyzed at less frequent intervals if longer shelf lives are guaranteed by the manufacturer.

* * * * *

5.1.3 The values used in the equations under paragraph 5.1 are derived as follows:

E = pollutant emission, g/million cal (lb/million BTU),

C = pollutant concentration, g/dscm (lb/dscf), determined by multiplying the average concentration (ppm) for each hourly period by 4.16 x 10^-5 M g/dscm per ppm (2.64 x 10^-9 M lb/dscf per ppm) where M = pollutant molecular weight, g/g-mole (lb/lb-mole). M = 64 for sulfur dioxide and 46 for oxides of nitrogen.

%O2, %CO2 = Oxygen or carbon dioxide volume (expressed as percent) determined with equipment specified under paragraphs 3.1.4 and 3.1.5 of this appendix.

* * * * *

PART 60—STANDARDS OF PERFORMANCE FOR NEW STATIONARY SOURCES

■ 4. The authority citation for part 60 continues to read as follows:

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

■ 5. In § 60.8, revise paragraph (f) to read as follows:

§ 60.8 Performance tests.

* * * * *

(f) Unless otherwise specified in the applicable subpart, each performance test shall consist of three separate runs using the applicable test method.

(1) Each run shall be conducted for the time and under the conditions specified in the applicable standard. For the purpose of determining compliance with an applicable standard, the arithmetic means of results of the three runs shall apply. In the event that a sample is accidentally lost or conditions occur in which one of the three runs must be discontinued because of forced shutdown, failure of an irreplaceable

portion of the sample train, extreme meteorological conditions, or other circumstances, beyond the owner or operator's control, compliance may, upon the Administrator's approval, be determined using the arithmetic mean of the results of the two other runs.

(2) Contents of report (electronic or paper submitted copy). Unless otherwise specified in a relevant standard or test method, or as otherwise approved by the Administrator in writing, the report for a performance test shall include the elements identified in paragraphs (f)(2)(i) through (vi) of this section.

(i) General identification information for the facility including a mailing address, the physical address, the owner or operator or responsible official (where applicable) and his/her email address, and the appropriate Federal Registry System (FRS) number for the facility.

(ii) Purpose of the test including the applicable regulation(s) requiring the test, the pollutant(s) and other parameters being measured, the applicable emission standard and any process parameter component, and a brief process description.

(iii) Description of the emission unit tested including fuel burned, control devices, and vent characteristics; the appropriate source classification code (SCC); the permitted maximum process rate (where applicable); and the sampling location.

(iv) Description of sampling and analysis procedures used and any modifications to standard procedures, quality assurance procedures and results, record of process operating conditions that demonstrate the applicable test conditions are met, and values for any operating parameters for which limits were being set during the test.

(v) Where a test method requires you record or report, the following shall be included: Record of preparation of standards, record of calibrations, raw data sheets for field sampling, raw data sheets for field and laboratory analyses, chain-of-custody documentation, and example calculations for reported results.

(vi) Identification of the company conducting the performance test including the primary office address, telephone number, and the contact for this test program including his/her email address.

* * * * *

■ 6. In § 60.17:

■ a. Revise paragraph (h)(180).

■ b. Redesignate paragraphs (h)(200) through (h)(206) as paragraphs (h)(202) through (h)(208).

■ c. Redesignate paragraphs (h)(190) through (h)(199) as (h)(191) through (h)(200).

■ d. Add new paragraphs (h)(190) and (h)(201).

The additions and revisions read as follows:

§ 60.17 Incorporations by reference.

* * * * *

(h) * * *

(180) ASTM D6348–03, Standard Test Method for Determination of Gaseous Compounds by Extractive Direct Interface Fourier Transform Infrared (FTIR) Spectroscopy, (Approved October 1, 2003), IBR approved for § 60.73a(b), table 7 to subpart III, table 2 to subpart JJJJ, and § 60.4245(d).

* * * * *

(190) ASTM D6911–15, Standard Guide for Packaging and Shipping Environmental Samples for Laboratory Analysis, approved January 15, 2015, IBR approved for appendix A–8: Method 30B.

* * * * *

(201) ASTM E617–13, Standard Specification for Laboratory Weights and Precision Mass Standards, approved May 1, 2013, IBR approved for appendix A–3: Methods 4, 5, 5H, 5I, and appendix A–8: Method 29.

* * * * *

Subpart JJJJ—Standards of Performance for Stationary Spark Ignition Internal Combustion Engines

■ 7. Revise § 60.4245(d) to read as follows:

§ 60.4245 What are my notification, reporting, and recordkeeping requirements if I am an owner or operator of a stationary SI internal combustion engine?

* * * * *

(d) Owners and operators of stationary SI ICE that are subject to performance testing must submit a copy of each performance test as conducted in § 60.4244 within 60 days after the test has been completed. Performance test reports using EPA Method 18, EPA Method 320, or ASTM D6348–03 (incorporated by reference—see 40 CFR 60.17) to measure VOC require reporting of all QA/QC data. For Method 18, report results from sections 8.4 and 11.1.1.4; for Method 320, report results from sections 8.6.2, 9.0, and 13.0; and for ASTM D6348–03 report results of all QA/QC procedures in Annexes 1–7.

* * * * *

■ 8. Revise Table 2 to subpart JJJJ of part 60 to read as follows:

TABLE 2 TO SUBPART JJJJ OF PART 60—REQUIREMENTS FOR PERFORMANCE TESTS

[As stated in § 60.4244, you must comply with the following requirements for performance tests within 10 percent of 100 percent peak (or the highest achievable) load]

For each	Complying with the requirement to	You must	Using	According to the following requirements
1. Stationary SI internal combustion engine demonstrating compliance according to § 60.4244.	a. limit the concentration of NO _x in the stationary SI internal combustion engine exhaust.	<p>i. Select the sampling port location and the number/location of traverse points at the exhaust of the stationary internal combustion engine;</p> <p>ii. Determine the O₂ concentration of the stationary internal combustion engine exhaust at the sampling port location;</p> <p>iii. If necessary, determine the exhaust flowrate of the stationary internal combustion engine exhaust;</p> <p>iv. If necessary, measure moisture content of the stationary internal combustion engine exhaust at the sampling port location; and.</p> <p>v. Measure NO_x at the exhaust of the stationary internal combustion engine; if using a control device, the sampling site must be located at the outlet of the control device.</p>	<p>(1) Method 1 or 1A of 40 CFR part 60, appendix A–1, if measuring flow rate.</p> <p>(2) Method 3, 3A, or 3B^b of 40 CFR part 60, appendix A–2 or ASTM Method D6522–00 (Reapproved 2005)^{a,d}.</p> <p>(3) Method 2 or 2C of 40 CFR part 60, appendix A–1 or Method 19 of 40 CFR part 60, appendix A–7.</p> <p>(4) Method 4 of 40 CFR part 60, appendix A–3, Method 320 of 40 CFR part 63, appendix A^c, or ASTM Method D6348–03^{d,e}.</p> <p>(5) Method 7E of 40 CFR part 60, appendix A–4, ASTM Method D6522–00 (Reapproved 2005)^{a,d}, Method 320 of 40 CFR part 63, appendix A^c, or ASTM Method D6348–03^{d,e}.</p>	<p>(a) Alternatively, for NO_x, O₂, and moisture measurement, ducts ≤6 inches in diameter may be sampled at a single point located at the duct centroid and ducts >6 and ≤12 inches in diameter may be sampled at 3 traverse points located at 16.7, 50.0, and 83.3% of the measurement line ('3-point long line'). If the duct is >12 inches in diameter <i>and</i> the sampling port location meets the two and half-diameter criterion of Section 11.1.1 of Method 1 of 40 CFR part 60, Appendix A, the duct may be sampled at '3-point long line'; otherwise, conduct the stratification testing and select sampling points according to Section 8.1.2 of Method 7E of 40 CFR part 60, Appendix A.</p> <p>(b) Measurements to determine O₂ concentration must be made at the same time as the measurements for NO_x concentration.</p> <p>(c) Measurements to determine moisture must be made at the same time as the measurement for NO_x concentration.</p> <p>(d) Results of this test consist of the average of the three 1-hour or longer runs.</p>
	b. limit the concentration of CO in the stationary SI internal combustion engine exhaust.	<p>i. Select the sampling port location and the number/location of traverse points at the exhaust of the stationary internal combustion engine;</p>	<p>(1) Method 1 or 1A of 40 CFR part 60, appendix A–1, if measuring flow rate.</p>	<p>(a) Alternatively, for CO, O₂, and moisture measurement, ducts ≤6 inches in diameter may be sampled at a single point located at the duct centroid and ducts >6 and ≤12 inches in diameter may be sampled at 3 traverse points located at 16.7, 50.0, and 83.3% of the measurement line ('3-point long line'). If the duct is >12 inches in diameter <i>and</i> the sampling port location meets the two and half-diameter criterion of Section 11.1.1 of Method 1 of 40 CFR part 60, Appendix A, the duct may be sampled at '3-point long line'; otherwise, conduct the stratification testing and select sampling points according to Section 8.1.2 of Method 7E of 40 CFR part 60, Appendix A.</p>

TABLE 2 TO SUBPART JJJJ OF PART 60—REQUIREMENTS FOR PERFORMANCE TESTS—Continued

[As stated in § 60.4244, you must comply with the following requirements for performance tests within 10 percent of 100 percent peak (or the highest achievable) load]

For each	Complying with the requirement to	You must	Using	According to the following requirements
	c. limit the concentration of VOC in the stationary SI internal combustion engine exhaust.	ii. Determine the O ₂ concentration of the stationary internal combustion engine exhaust at the sampling port location;. iii. If necessary, determine the exhaust flowrate of the stationary internal combustion engine exhaust;. iv. If necessary, measure moisture content of the stationary internal combustion engine exhaust at the sampling port location; and. v. Measure CO at the exhaust of the stationary internal combustion engine; if using a control device, the sampling site must be located at the outlet of the control device. i. Select the sampling port location and the number/location of traverse points at the exhaust of the stationary internal combustion engine;. ii. Determine the O ₂ concentration of the stationary internal combustion engine exhaust at the sampling port location;. iii. If necessary, determine the exhaust flowrate of the stationary internal combustion engine exhaust;. iv. If necessary, measure moisture content of the stationary internal combustion engine exhaust at the sampling port location; and.	(2) Method 3, 3A, or 3B ^b of 40 CFR part 60, appendix A–2 or ASTM Method D6522–00 (Reapproved 2005) ^{a,d} . (3) Method 2 or 2C of 40 CFR 60, appendix A–1 or Method 19 of 40 CFR part 60, appendix A–7. (4) Method 4 of 40 CFR part 60, appendix A–3, Method 320 of 40 CFR part 63, appendix A ^c , or ASTM Method D6348–03 ^{d,e} . (5) Method 10 of 40 CFR part 60, appendix A4, ASTM Method D6522–00 (Reapproved 2005) ^{a,d,e} , Method 320 of 40 CFR part 63, appendix A ^e , or ASTM Method D6348–03 ^{d,e} . (1) Method 1 or 1A of 40 CFR part 60, appendix A–1, if measuring flow rate. (2) Method 3, 3A, or 3B ^b of 40 CFR part 60, appendix A–2 or ASTM Method D6522–00 (Reapproved 2005) ^{a,d} . (3) Method 2 or 2C of 40 CFR 60, appendix A–1 or Method 19 of 40 CFR part 60, appendix A–7. (4) Method 4 of 40 CFR part 60, appendix A–3, Method 320 of 40 CFR part 63, appendix A ^c , or ASTM Method D6348–03 ^{d,e} .	(b) Measurements to determine O ₂ concentration must be made at the same time as the measurements for CO concentration. (c) Measurements to determine moisture must be made at the same time as the measurement for CO concentration. (d) Results of this test consist of the average of the three 1-hour or longer runs. (a) Alternatively, for VOC, O ₂ , and moisture measurement, ducts ≤6 inches in diameter may be sampled at a single point located at the duct centroid and ducts >6 and ≤12 inches in diameter may be sampled at 3 traverse points located at 16.7, 50.0, and 83.3% of the measurement line ('3-point long line'). If the duct is >12 inches in diameter <i>and</i> the sampling port location meets the two and half-diameter criterion of Section 11.1.1 of Method 1 of 40 CFR part 60, Appendix A, the duct may be sampled at '3-point long line'; otherwise, conduct the stratification testing and select sampling points according to Section 8.1.2 of Method 7E of 40 CFR part 60, Appendix A. (b) Measurements to determine O ₂ concentration must be made at the same time as the measurements for VOC concentration. (c) Measurements to determine moisture must be made at the same time as the measurement for VOC concentration.

TABLE 2 TO SUBPART JJJJ OF PART 60—REQUIREMENTS FOR PERFORMANCE TESTS—Continued

[As stated in § 60.4244, you must comply with the following requirements for performance tests within 10 percent of 100 percent peak (or the highest achievable) load]

For each	Complying with the requirement to	You must	Using	According to the following requirements
		v. Measure VOC at the exhaust of the stationary internal combustion engine; if using a control device, the sampling site must be located at the outlet of the control device.	(5) Methods 25A and 18 of 40 CFR part 60, appendices A–6 and A–7, Method 25A with the use of a hydrocarbon cutter as described in 40 CFR 1065.265, Method 18 of 40 CFR part 60, appendix A–6 ^c , Method 320 of 40 CFR part 63, appendix A ^c , or ASTM Method D6348–03 ^d .	(d) Results of this test consist of the average of the three 1-hour or longer runs.

^a Also, you may petition the Administrator for approval to use alternative methods for portable analyzer.
^b You may use ASME PTC 19.10–1981, Flue and Exhaust Gas Analyses, for measuring the O₂ content of the exhaust gas as an alternative to EPA Method 3B. AMSE PTC 19.10–1981 incorporated by reference, see 40 CFR 60.17
^c You may use EPA Method 18 of 40 CFR part 60, appendix A–6, provided that you conduct an adequate pre-survey test prior to the emissions test, such as the one described in OTM 11 on EPA’s Web site (<http://www.epa.gov/ttn/emc/prelim/otm11.pdf>).
^d Incorporated by reference; see 40 CFR 60.17.
^e You must meet the requirements in § 60.4245(d).

- 9. In appendix A–1 to part 60:
- a. Revise section 11.2.1.2 in Method 1.
- b. Remove Figure 1–2 in section 17.0 after the table entitled “Table 1–1 Cross-Section Layout for Rectangular Stacks” in Method 1.
- c. Revise sections 6.7, 10.1.2.3, 10.1.3.4, 10.1.3.7, 10.1.4.1.3, 10.1.4.3, and Figure 2–10 in section 17.0 in Method 2.

The revisions read as follows:

Appendix A–1 to Part 60—Test Methods 1 Through 2F

* * * * *

Method 1—Sample and Velocity Traverses for Stationary Sources

* * * * *

11.2.1.2 When the eight- and two-diameter criterion cannot be met, the minimum number of traverse points is determined from Figure 1–1. Before referring to the figure, however, determine the distances from the measurement site to the nearest upstream and downstream disturbances, and divide each distance by the stack diameter or equivalent diameter, to determine the distance in terms of the number of duct diameters. Then, determine from Figure 1–1 the minimum number of traverse points that corresponds:

- (1) To the number of duct diameters upstream; and
- (2) To the number of diameters downstream. Select the higher of the two minimum numbers of traverse points, or a greater value, so that for circular stacks, the number is a multiple of 4, and for rectangular stacks, the number is one of those shown in Table 1–1.

* * * * *

Method 2—Determination of Stack Gas Velocity and Volumetric Flow Rate (Type S Pitot Tube)

* * * * *

6.7 Calibration Pitot Tube. Calibration of the Type S pitot tube requires a standard pitot tube for a reference. When calibration of the Type S pitot tube is necessary (see Section 10.1), a standard pitot tube shall be used for a reference. The standard pitot tube shall, preferably, have a known coefficient, obtained directly from the National Institute of Standards and Technology (NIST), Gaithersburg, MD 20899, (301) 975–2002; or by calibration against another standard pitot tube with a NIST-traceable coefficient. Alternatively, a standard pitot tube designed according to the criteria given in sections 6.7.1 through 6.7.5 below and illustrated in Figure 2–5 (see also References 7, 8, and 17 in section 17.0) may be used. Pitot tubes designed according to these specifications will have baseline coefficients of 0.99 ± 0.01.

10.1.2.3 The flow system shall have the capacity to generate a test-section velocity around 910 m/min (3,000 ft/min). This velocity must be constant with time to guarantee constant and steady flow during the entire period of calibration. A centrifugal fan is recommended for this purpose, as no flow rate adjustment for back pressure of the fan is allowed during the calibration process. Note that Type S pitot tube coefficients obtained by single-velocity calibration at 910 m/min (3,000 ft/min) will generally be valid to ±3 percent for the measurement of velocities above 300 m/min (1,000 ft/min) and to ±6 percent for the measurement of velocities between 180 and 300 m/min (600 and 1,000 ft/min). If a more precise correlation between the pitot tube coefficient (C_p) and velocity is desired, the flow system

should have the capacity to generate at least four distinct, time-invariant test-section velocities covering the velocity range from 180 to 1,500 m/min (600 to 5,000 ft/min), and calibration data shall be taken at regular velocity intervals over this range (see References 9 and 14 in section 17.0 for details).

* * * * *

10.1.3.4 Read Δp_{std}, and record its value in a data table similar to the one shown in Figure 2–9. Remove the standard pitot tube from the duct, and disconnect it from the manometer. Seal the standard entry port. Make no adjustment to the fan speed or other wind tunnel volumetric flow control device between this reading and the corresponding Type S pitot reading.

* * * * *

10.1.3.7 Repeat Steps 10.1.3.3 through 10.1.3.6 until three pairs of Δp readings have been obtained for the A side of the Type S pitot tube, with all the paired observations conducted at a constant fan speed (no changes to fan velocity between observed readings).

* * * * *

10.1.4.1.3 For Type S pitot tube combinations with complete probe assemblies, the calibration point should be located at or near the center of the duct; however, insertion of a probe sheath into a small duct may cause significant cross-sectional area interference and blockage and yield incorrect coefficient values (Reference 9 in section 17.0). Therefore, to minimize the blockage effect, the calibration point may be a few inches off-center if necessary, but no closer to the outer wall of the wind tunnel than 4 inches. The maximum allowable blockage, as determined by a projected-area model of the probe sheath, is 2 percent or less of the duct cross-sectional area (Figure

2–10a). If the pitot and/or probe assembly blocks more than 2 percent of the cross-sectional area at an insertion point only 4 inches inside the wind tunnel, the diameter of the wind tunnel must be increased.

* * * * *

10.1.4.3 For a probe assembly constructed such that its pitot tube is always used in the same orientation, only one side of the pitot tube needs to be calibrated (the side which will face the flow). The pitot tube must still meet the alignment specifications of Figure 2–2 or 2–3, however, and must have an

average deviation (σ) value of 0.01 or less (see section 12.4.4).

* * * * *

17.0 Tables, Diagrams, Flowcharts, and Validation Data

* * * * *

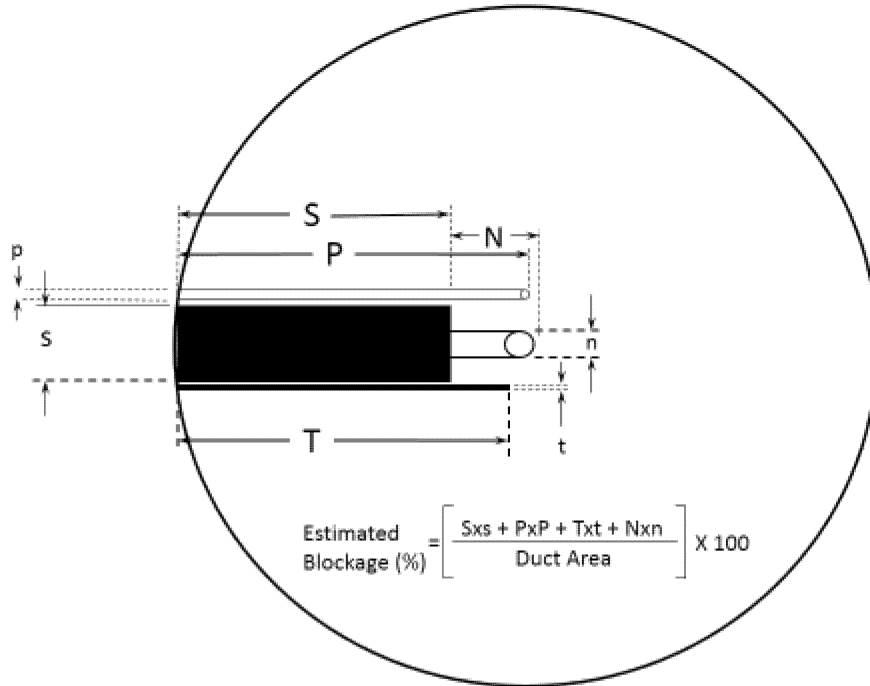


Figure 2-10. Projected-area model for a typical pitot tube assembly.

* * * * *

- 10. In appendix A–2 to part 60:
- a. Revise sections 6.11.1, 6.11.2, 10.6.6, and 10.6.8 in Method 2G.
- b. Revise section 6.3 in Method 3C.
- c. Add sections 6.3.1, 6.3.2, 6.3.3, 6.3.4, and 6.3.5 in Method 3C.

The revisions and additions read as follows:

Appendix A–2 to Part 60—Test Methods 2G Through 3C

* * * * *

Method 2G—Determination of Stack Gas Velocity and Volumetric Flow Rate With Two-Dimensional Probes

* * * * *

6.11.1 Test section cross-sectional area. The flowing gas stream shall be confined within a circular, rectangular, or elliptical duct. The cross-sectional area of the tunnel must be large enough to ensure fully developed flow in the presence of both the calibration pitot tube and the tested probe. The calibration site, or “test section,” of the wind tunnel shall have a minimum diameter of 30.5 cm (12 in.) for circular or elliptical duct cross-sections or a minimum width of 30.5 cm (12 in.) on the shorter side for

rectangular cross-sections. Wind tunnels shall meet the probe blockage provisions of this section and the qualification requirements prescribed in section 10.1. The projected area of the portion of the probe head, shaft, and attached devices inside the wind tunnel during calibration shall represent no more than 2 percent of the cross-sectional area of the tunnel. If the pitot and/or probe assembly blocks more than 2 percent of the cross-sectional area at an insertion point only 4 inches inside the wind tunnel, the diameter of the wind tunnel must be increased.

6.11.2 Velocity range and stability. The wind tunnel should be capable of achieving and maintaining a constant and steady velocity between 6.1 m/sec and 30.5 m/sec (20 ft/sec and 100 ft/sec) for the entire calibration period for each selected calibration velocity. The wind tunnel shall produce fully developed flow patterns that are stable and parallel to the axis of the duct in the test section.

* * * * *

10.6.6 Read the differential pressure from the calibration pitot tube (ΔP_{std}), and record its value. Read the barometric pressure to within ± 2.5 mm Hg (± 0.1 in. Hg) and the temperature in the wind tunnel to within 0.6 °C (1 °F). Record these values on a data form

similar to Table 2G–8. Record the rotational speed of the fan or indicator of wind tunnel velocity control (damper setting, variac rheostat, etc.) and make no adjustment to fan speed or wind tunnel velocity control between this observation and the Type S probe reading.

* * * * *

10.6.8 Take paired differential pressure measurements with the calibration pitot tube and tested probe (according to sections 10.6.6 and 10.6.7). The paired measurements in each replicate can be made either simultaneously (*i.e.*, with both probes in the wind tunnel) or by alternating the measurements of the two probes (*i.e.*, with only one probe at a time in the wind tunnel). Adjustments made to the fan speed or other changes to the system designed to change the air flow velocity of the wind tunnel between observation of the calibration pitot tube (ΔP_{std}) and the Type S pitot tube invalidates the reading and the observation must be repeated.

* * * * *

Method 3C—Determination of Carbon Dioxide, Methane, Nitrogen, and Oxygen From Stationary Sources

* * * * *

6.3 Analyzer Linearity Check and Calibration. Perform this test before sample analysis.

6.3.1 Using the gas mixtures in section 5.1, verify the detector linearity over the range of suspected sample concentrations with at least three concentrations per compound of interest. This initial check may also serve as the initial instrument calibration.

6.3.2 You may extend the use of the analyzer calibration by performing a single-point calibration verification. Calibration verifications shall be performed by triplicate injections of a single-point standard gas. The concentration of the single-point calibration must either be at the midpoint of the calibration curve or at approximately the source emission concentration measured during operation of the analyzer.

6.3.3 Triplicate injections must agree within 5 percent of their mean, and the average calibration verification point must agree within 10 percent of the initial calibration response factor. If these calibration verification criteria are not met, the initial calibration described in section 6.3.1, using at least three concentrations, must be repeated before analysis of samples can continue.

6.3.4 For each instrument calibration, record the carrier and detector flow rates, detector filament and block temperatures,

attenuation factor, injection time, chart speed, sample loop volume, and component concentrations.

6.3.5 Plot a linear regression of the standard concentrations versus area values to obtain the response factor of each compound. Alternatively, response factors of uncorrected component concentrations (wet basis) may be generated using instrumental integration.

Note: Peak height may be used instead of peak area throughout this method.

* * * * *

- 11. In appendix A-3 to part 60:
- a. Add sections 10.3 and 12.2.5 in Method 4.
- b. Revise section 16.4 in Method 4.
- c. Revise sections 6.1.1.9 and 8.7.6.2.5 in Method 5.
- d. Add sections 10.7 and 10.8 in Method 5.
- e. Add sections 10.4 and 10.5 in Method 5H.
- f. Add sections 10.1 and 10.2 in Method 5I.

The revisions and additions read as follows:

Appendix A-3 to Part 60-Test Methods 4 Through 5I

* * * * *

Method 4—Determination of Moisture Content in Stack Gases

* * * * *

10.3 Field Balance Calibration Check. Check the calibration of the balance used to weigh impingers with a weight that is at least 500g or within 50g of a loaded impinger. The weight must be ASTM E617-13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference-see 40 CFR 60.17) Class 6 (or better). Daily, before use, the field balance must measure the weight within ± 0.5g of the certified mass. If the daily balance calibration check fails, perform corrective measures and repeat the check before using balance.

* * * * *

12.2.5 Using F-factors to determine approximate moisture for estimating moisture content where no wet scrubber is being used, for the purpose of determining isokinetic sampling rate settings with no fuel sample, is acceptable using the average F_c or F_d factor from Method 19 (see Method 19, section 12.3.1). If this option is selected, calculate the approximate moisture as follows:

$$B_{ws} = B_H + B_A + B_F$$

Where:

B_A = Mole Fraction of moisture in the ambient air.

$$B_A = \frac{\%RH}{100 * P_{Bar}} * 10^{[6.6912 - (\frac{3144}{T+390.86})]}$$

B_F = Mole fraction of moisture from free water in the fuel.

$$B_F = \left[\frac{0.0036W^2 + 0.075W}{100} \right] \left[\frac{20.9 - O_2}{20.9} \right]$$

B_H = Mole fraction of moisture from the hydrogen in the fuel.

$$B_H = \left[1 - \frac{F_d}{F_w} \right] \frac{(20.9 - O_2)}{20.9}$$

B_{ws} = Mole fraction of moisture in the stack gas.

F_d = Volume of dry combustion components per unit of heat content at 0 percent oxygen, dscf/10⁶.

Btu (scm/). See Table 19-2 in Method 19.

F_w = Volume of wet combustion components per unit of heat content at 0 percent oxygen, wet.

scf/10⁶ Btu (scm/). See Table 19-2 in Method 19.

%RH = Percent relative humidity (calibrated hygrometer acceptable), percent.

P_{Bar} = Barometric pressure, in. Hg.

T = Ambient temperature, °F.

W = Percent free water by weight, percent.

O_2 = Percent oxygen in stack gas, dry basis, percent.

* * * * *

16.4 Using F-factors to determine moisture is an acceptable alternative to Method 4 for a combustion stack not using

a scrubber, and where a fuel sample is taken during the test run and analyzed for development of an F_d factor (see Method 19, section 12.3.2), and where stack O_2 content is measured by Method 3A or 3B during each test run. If this option is selected, calculate the moisture content as follows:

$$B_{ws} = B_H + B_A + B_F$$

Where:

B_A = Mole fraction of moisture in the ambient air.

$$B_A = \frac{\%RH}{100 P_{Bar}} \left[10^{6.6912 - \left(\frac{3144}{T+390.86} \right)} \right]$$

Note: Values of B_A should be between 0.00 and 0.06 with common values being about 0.015.

B_F = Mole fraction of moisture from free water in the fuel.

$$B_F = \left[\frac{0.0036 W^2 + 0.075 W}{100} \right] \left[\frac{20.9 - O_2}{20.9} \right]$$

Note: Free water in fuel is minimal for distillate oil and gases, such as propane and natural gas, so this step may be omitted for those fuels.

B_H = Mole fraction of moisture from the hydrogen in the fuel.

$$B_H = \left(1 - \frac{F_d}{F_w} \right) \frac{(20.9 - O_2)}{20.9}$$

B_{ws} = Mole fraction of moisture in the stack gas.

F_d = Volume of dry combustion components per unit of heat content at 0 percent oxygen, dscf/10⁶ Btu (scm/J). Develop a test specific F_d value using an integrated fuel sample from each test run and Equation 19–13 in section 12.3.2 of Method 19.

F_w = Volume of wet combustion components per unit of heat content at 0 percent oxygen, wet scf/10⁶ Btu (scm/J). Develop a test specific F_w value using an integrated fuel sample from each test run and Equation 19–14 in section 12.3.2 of Method 19.

%RH = Percent relative humidity (calibrated hygrometer acceptable), percent.

P_{Bar} = Barometric pressure, in. Hg.

T = Ambient temperature, °F.

W = Percent free water by weight, percent.

O_2 = Percent oxygen in stack gas, dry basis, percent.

* * * * *

Method 5—Determination of Particulate Matter Emissions From Stationary Sources

* * * * *

6.1.1.9 Metering System. Vacuum gauge, leak-free pump, calibrated temperature sensors, dry gas meter (DGM) capable of measuring volume to within 2 percent, and related equipment, as shown in Figure 5–1. Other metering systems capable of maintaining sampling rates within 10 percent of isokinetic and of determining sample volumes to within 2 percent may be used, subject to the approval of the Administrator. When the metering system is used in conjunction with a pitot tube, the system shall allow periodic checks of isokinetic rates.

* * * * *

8.7.6.2.5 Clean the inside of the front half of the filter holder by rubbing the surfaces with a Nylon bristle brush and rinsing with acetone. Rinse each surface three times or more if needed to remove visible particulate. Make a final rinse of the brush and filter

holder. Carefully rinse out the glass cyclone, also (if applicable). After all acetone washings and particulate matter have been collected in the sample container, tighten the lid on the sample container so that acetone will not leak out when it is shipped to the laboratory. Mark the height of the fluid level to allow determination of whether leakage occurred during transport. Label the container to clearly identify its contents.

* * * * *

10.7 Field Balance Calibration Check. Check the calibration of the balance used to weigh impingers with a weight that is at least 500g or within 50g of a loaded impinger. The weight must be ASTM E617–13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference—see 40 CFR 60.17) Class 6 (or better). Daily before use, the field balance must measure the weight within ±0.5g of the certified mass. If the daily balance calibration check fails, perform corrective measures and repeat the check before using balance.

10.8 Analytical Balance Calibration. Perform a multipoint calibration (at least five points spanning the operational range) of the analytical balance before the first use, and semiannually thereafter. The calibration of the analytical balance must be conducted using ASTM E617–13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference—see 40 CFR 60.17) Class 2 (or better) tolerance weights. Audit the balance each day it is used for gravimetric measurements by weighing at least one ASTM E617–13 Class 2 tolerance (or better) calibration weight that corresponds to 50 to 150 percent of the weight of one filter or between 1g and 5g. If the scale cannot reproduce the value of the calibration weight to within 0.5 mg of the certified mass, perform corrective measures, and conduct the multipoint calibration before use.

* * * * *

Method 5H—Determination of Particulate Matter Emissions From Wood Heaters From a Stack Location

* * * * *

10.4 Field Balance Calibration Check. Check the calibration of the balance used to weigh impingers with a weight that is at least 500g or within 50g of a loaded impinger. The weight must be ASTM E617–13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference—see 40 CFR 60.17) Class 6 (or better). Daily before use, the field balance

must measure the weight within ±0.5g of the certified mass. If the daily balance calibration check fails, perform corrective measures and repeat the check before using balance.

10.5 Analytical Balance Calibration. Perform a multipoint calibration (at least five points spanning the operational range) of the analytical balance before the first use, and semiannually thereafter. The calibration of the analytical balance must be conducted using ASTM E617–13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference—see 40 CFR 60.17) Class 2 (or better) tolerance weights. Audit the balance each day it is used for gravimetric measurements by weighing at least one ASTM E617–13 Class 2 tolerance (or better) calibration weight that corresponds to 50 to 150 percent of the weight of one filter or between 1g and 5g. If the scale cannot reproduce the value of the calibration weight to within 0.5 mg of the certified mass, perform corrective measures, and conduct the multipoint calibration before use.

* * * * *

Method 5I—Determination of Low Level Particulate Matter Emissions From Stationary Sources

* * * * *

10.1 Field Balance Calibration Check. Check the calibration of the balance used to weigh impingers with a weight that is at least 500g or within 50g of a loaded impinger. The weight must be ASTM E617–13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference—see 40 CFR 60.17) Class 6 (or better). Daily, before use, the field balance must measure the weight within ±0.5g of the certified mass. If the daily balance calibration check fails, perform corrective measures and repeat the check before using balance.

10.2 Analytical Balance Calibration. Perform a multipoint calibration (at least five points spanning the operational range) of the analytical balance before the first use, and semiannually thereafter. The calibration of the analytical balance must be conducted using ASTM E617–13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference—see 40 CFR 60.17) Class 2 (or better) tolerance weights. Audit the balance each day it is used for gravimetric measurements by weighing at least one ASTM E617–13 Class 2 tolerance (or better) calibration weight that corresponds to 50 to 150 percent of the weight of one filter or

between 1g and 5g. If the scale cannot reproduce the value of the calibration weight to within 0.5 mg of the certified mass, perform corrective measures and conduct the multipoint calibration before use.

* * * * *

- 12. In appendix A–4 to part 60:
- a. Revise section 8.3 in Method 6C.
- b. Revise sections 8.1.2, 8.2.7, and 12.8 in Method 7E.
- c. Revise sections 6.2.5 and 8.4.2 in Method 10.
- d. Add section 6.2.6 in Method 10.
- e. Revise sections 6.1.6, 6.1.7, 6.1.8, 6.1.9, 6.1.10, 8.1, 8.2.1 and 8.2.3 in Method 10A.
- f. Add section 6.1.11 in Method 10A.
- g. Revise section 6.1 in Method 10B.

The revisions and additions read as follows:

Appendix A–4 to Part 60—Test Methods 6 Through 10B

* * * * *

Method 6C—Determination of Sulfur Dioxide Emissions From Stationary Sources (Instrumental Analyzer Procedure)

* * * * *

8.3 *Interference Check.* You must follow the procedures of section 8.2.7 of Method 7E to conduct an interference check, substituting SO₂ for NO_x as the method pollutant. For dilution-type measurement systems, you must use the alternative interference check procedure in section 16 and a co-located, unmodified Method 6 sampling train.

* * * * *

Method 7E—Determination of Nitrogen Oxides Emissions From Stationary Sources (Instrumental Analyzer Procedure)

* * * * *

8.1.2 *Determination of Stratification.* Perform a stratification test at each test site to determine the appropriate number of sample traverse points. If testing for multiple pollutants or diluents at the same site, a stratification test using only one pollutant or diluent satisfies this requirement. A stratification test is not required for small stacks that are less than 4 inches in diameter.

To test for stratification, use a probe of appropriate length to measure the NO_x (or pollutant of interest) concentration at 12 traverse points located according to Table 1–1 or Table 1–2 of Method 1. Alternatively, you may measure at three points on a line passing through the centroidal area. Space the three points at 16.7, 50.0, and 83.3 percent of the measurement line. Sample for a minimum of twice the system response time (see section 8.2.6) at each traverse point. Calculate the individual point and mean NO_x concentrations. If the concentration at each traverse point differs from the mean concentration for all traverse points by no more than: ±5.0 percent of the mean concentration; or ±0.5 ppm (whichever is less restrictive), the gas stream is considered unstratified, and you may collect samples from a single point that most closely matches the mean. If the 5.0 percent or 0.5 ppm criterion is not met, but the concentration at each traverse point differs from the mean concentration for all traverse points by not more than: ±10.0 percent of the mean concentration; or ±1.0 ppm (whichever is less restrictive), the gas stream is considered to be minimally stratified and you may take samples from three points. Space the three points at 16.7, 50.0, and 83.3 percent of the measurement line. Alternatively, if a 12-point stratification test was performed and the emissions were shown to be minimally stratified (all points within ± 10.0 percent of their mean or within ±1.0 ppm), and if the stack diameter (or equivalent diameter, for a rectangular stack or duct) is greater than 2.4 meters (7.8 ft), then you may use 3-point sampling and locate the three points along the measurement line exhibiting the highest average concentration during the stratification test at 0.4, 1.2 and 2.0 meters from the stack or duct wall. If the gas stream is found to be stratified because the 10.0 percent or 1.0 ppm criterion for a 3-point test is not met, locate 12 traverse points for the test in accordance with Table 1–1 or Table 1–2 of Method 1.

* * * * *

8.2.7 *Interference Check.* Conduct an interference response test of the gas analyzer prior to its initial use in the field. If you have multiple analyzers of the same make and model, you need only perform this

alternative interference check on one analyzer. You may also meet the interference check requirement if the instrument manufacturer performs this or a similar check on an analyzer of the same make and model of the analyzer that you use and provides you with documented results.

(1) You may introduce the appropriate interference test gases (that are potentially encountered during a test; see examples in Table 7E–3) into the analyzer separately or as mixtures. Test the analyzer with the interference gas alone at the highest concentration expected at a test source and again with the interference gas and NO_x at a representative NO_x test concentration. For analyzers measuring NO_x greater than 20 ppm, use a calibration gas with a NO_x concentration of 80 to 100 ppm and set this concentration equal to the calibration span. For analyzers measuring less than 20 ppm NO_x, select an NO concentration for the calibration span that reflects the emission levels at the sources to be tested, and perform the interference check at that level. Measure the total interference response of the analyzer to these gases in ppmv. Record the responses and determine the interference using Table 7E–4. The specification in section 13.4 must be met.

(2) A copy of this data, including the date completed and signed certification, must be available for inspection at the test site and included with each test report. This interference test is valid for the life of the instrument unless major analytical components (e.g., the detector) are replaced with different model parts. If major components are replaced with different model parts, the interference gas check must be repeated before returning the analyzer to service. If major components are replaced, the interference gas check must be repeated before returning the analyzer to service. The tester must ensure that any specific technology, equipment, or procedures that are intended to remove interference effects are operating properly during testing.

* * * * *

12.8 NO₂—NO Conversion Efficiency Correction. If desired, calculate the total NO_x concentration with a correction for converter efficiency using Equation 7E–8.

$$NO_{x\text{Corr}} = NO + \left(\frac{(NO_x - NO)}{Eff_{NO_2}} \times 100 \right) \quad \text{Eq. 7E-8}$$

* * * * *

Method 10—Determination of Carbon Monoxide Emissions From Stationary Sources (Instrumental Analyzer Procedure)

* * * * *

6.2.5 *Flexible Bag.* Tedlar, or equivalent, with a capacity of 60 to 90 liters (2 to 3 ft³). (Verify through the manufacturer that the Tedlar alternative is suitable for CO and make this verified information available for inspection.) Leak-test the bag in the laboratory before using by evacuating with a

pump followed by a dry gas meter. When the evacuation is complete, there should be no flow through the meter.

6.2.6 *Sample Tank.* Stainless steel or aluminum tank equipped with a pressure indicator with a minimum volume of 4 liters.

* * * * *

8.4.2 *Integrated Sampling.* Evacuate the flexible bag or sample tank. Set up the equipment as shown in Figure 10–1 with the bag disconnected. Place the probe in the stack and purge the sampling line. Connect the bag, making sure that all connections are

leak-free. Sample at a rate proportional to the stack velocity. If needed, the CO₂ content of the gas may be determined by using the Method 3 integrated sample procedures, or by weighing an ascarite CO₂ removal tube used and computing CO₂ concentration from the gas volume sampled and the weight gain of the tube. Data may be recorded on a form similar to Table 10–1. If a sample tank is used for sample collection, follow procedures similar to those in sections 8.1.2, 8.2.3, 8.3, and 12.4 of Method 25 as appropriate to

prepare the tank, conduct the sampling, and correct the measured sample concentration.
* * * * *

Method 10A—Determination of Carbon Monoxide Emissions in Certifying Continuous Emission Monitoring Systems at Petroleum Refineries
* * * * *

6.1.6 Flexible Bag. Tedlar, or equivalent, with a capacity of 10 liters (0.35 ft³) and equipped with a sealing quick-connect plug. The bag must be leak-free according to section 8.1. For protection, it is recommended that the bag be enclosed within a rigid container.

6.1.7 Sample Tank. Stainless steel or aluminum tank equipped with a pressure indicator with a minimum volume of 10 liters.

6.1.8 Valves. Stainless-steel needle valve to adjust flow rate, and stainless-steel 3-way valve, or equivalent.

6.1.9 CO₂ Analyzer. Fyrite, or equivalent, to measure CO₂ concentration to within 0.5 percent.

6.1.10 Volume Meter. Dry gas meter, capable of measuring the sample volume under calibration conditions of 300 ml/min (0.01 ft³/min) for 10 minutes.

6.1.11 Pressure Gauge. A water filled U-tube manometer, or equivalent, of about 30 cm (12 in.) to leak-check the flexible bag.
* * * * *

8.1 Sample Bag or Tank Leak-Checks. While a leak-check is required after bag or sample tank use, it should also be done before the bag or sample tank is used for sample collection. The tank should be leak-checked according to the procedure specified in section 8.1.2 of Method 25. The bag should be leak-checked in the inflated and deflated condition according to the following procedure:
* * * * *

8.2.1 Evacuate and leak check the sample bag or tank as specified in section 8.1. Assemble the apparatus as shown in Figure 10A-1. Loosely pack glass wool in the tip of the probe. Place 400 ml of alkaline permanganate solution in the first two impingers and 250 ml in the third. Connect the pump to the third impinger, and follow this with the surge tank, rate meter, and 3-

$$ACE = \frac{C_{Dir} - C_v}{CS} \times 100$$

* * * * *

- 15. In appendix A-7 to part 60:
- a. Revise sections 9.1, 12.1, and 12.3 in Method 25C.
- b. Remove section 11.2 in Method 25C.

way valve. Do not connect the bag or sample tank to the system at this time.
* * * * *

8.2.3 Purge the system with sample gas by inserting the probe into the stack and drawing the sample gas through the system at 300 ml/min ±10 percent for 5 minutes. Connect the evacuated bag or sample tank to the system, record the starting time, and sample at a rate of 300 ml/min for 30 minutes, or until the bag is nearly full, or the sample tank reaches ambient pressure. Record the sampling time, the barometric pressure, and the ambient temperature. Purge the system as described above immediately before each sample.
* * * * *

Method 10B—Determination of Carbon Monoxide Emissions from Stationary Sources
* * * * *

6.1. Sample Collection. Same as in Method 10A, section 6.1 (paragraphs 6.1.1 through 6.1.11).
* * * * *

- 13. Revise section 8.3.2 in Method 15 of appendix A-5 to part 60 to read as follows:

Appendix A-5 to Part 60—Test Methods 11 Through 15A
* * * * *

Method 15—Determination of Hydrogen Sulfide, Carbonyl Sulfide, and Carbon Disulfide Emissions From Stationary Sources
* * * * *

8.3.2 Determination of Calibration Drift. After each run, or after a series of runs made within a 24-hour period, perform a partial recalibration using the procedures in section 10.0. Only H₂S (or other permeant) need be used to recalibrate the GC/FPD analysis system and the dilution system. Partial recalibration may be performed at the midlevel calibration gas concentration or at a concentration measured in the samples but not less than the lowest calibration standard used in the initial calibration. Compare the calibration curves obtained after the runs to the calibration curves obtained under section

- c. Add sections 12.4, 12.5, 12.5.1 and 12.5.2 in Method 25C.
- The revisions and additions read as follows:

Appendix A-7 to Part 60—Test Methods 19 Through 25E
* * * * *

10.3. The calibration drift should not exceed the limits set forth in section 13.4. If the drift exceeds this limit, the intervening run or runs should be considered invalid. As an option, the calibration data set that gives the highest sample values may be chosen by the tester.
* * * * *

- 14. In appendix A-6 to part 60:
- a. Revise sections 12.1 and 12.2 in Method 16C.
- b. Remove section 8.2.1.5.2.3 in Method 18.

The revisions read as follows:

Appendix A-6 to Part 60—Test Methods 16 Through 18
* * * * *

Method 16C—Determination of Total Reduced Sulfur Emissions From Stationary Sources
* * * * *

12.1 Nomenclature.

- ACE = Analyzer calibration error, percent of calibration span.
- CD = Calibration drift, percent.
- C_{Dir} = Measured concentration of a calibration gas (low, mid, or high) when introduced in direct calibration mode, ppmv.
- C_{H2S} = Concentration of the system performance check gas, ppmv H₂S.
- C_S = Measured concentration of the system performance gas when introduced in system calibration mode, ppmv H₂S.
- C_V = Manufacturer certified concentration of a calibration gas (low, mid, or high), ppmv SO₂.
- C_{SO2} = Unadjusted sample SO₂ concentration, ppmv.
- C_{TRS} = Total reduced sulfur concentration corrected for system performance, ppmv.
- CS = Calibration span, ppmv.
- DF = Dilution system (if used) dilution factor, dimensionless.
- SP = System performance, percent.

12.2 Analyzer Calibration Error. For non-dilution systems, use Equation 16C-1 to calculate the analyzer calibration error for the low-, mid-, and high-level calibration gases.

Eq. 16C-1

Method 25C—Determination of Nonmethane Organic Compounds (NMOC) in Landfill Gases
* * * * *

9.1 Miscellaneous Quality Control Measures.

Section	Quality control measure	Effect
8.4.2	Verify that landfill gas sample contains less than 20 percent N ₂ or 5 percent O ₂ .	Ensures that ambient air was not drawn into the landfill gas sample and gas was sampled from an appropriate location.

Section	Quality control measure	Effect
10.1, 10.2	NMOC analyzer initial and daily performance checks	Ensures precision of analytical results.

* * * * *

12.1 Nomenclature
 B_w = Moisture content in the sample, fraction.
 C_{N2} = N₂ concentration in the diluted sample gas.
 C_{mN2} = Measured N₂ concentration, fraction in landfill gas.
 C_{mOx} = Measured Oxygen concentration, fraction in landfill gas.
 C_{Ox} = Oxygen concentration in the diluted sample gas.
 C_t = Calculated NMOC concentration, ppmv C equivalent.

C_{tm} = Measured NMOC concentration, ppmv C equivalent.
 P_b = Barometric pressure, mm Hg.
 P_t = Gas sample tank pressure after sampling, but before pressurizing, mm Hg absolute.
 P_{tf} = Final gas sample tank pressure after pressurizing, mm Hg absolute.
 P_{ti} = Gas sample tank pressure after evacuation, mm Hg absolute.
 P_w = Vapor pressure of H₂O (from Table 25C-1), mm Hg.
 r = Total number of analyzer injections of sample tank during analysis (where j = injection number, 1 . . . r).

T_t = Sample tank temperature at completion of sampling, °K.
 T_{ti} = Sample tank temperature before sampling, °K.
 T_{tr} = Sample tank temperature after pressuring, °K.

* * * * *
 12.3 Nitrogen Concentration in the landfill gas. Use equation 25C-2 to calculate the measured concentration of nitrogen in the original landfill gas.

$$C_{N2} = \left[\frac{\left(\frac{P_{tf}}{T_{tf}}\right)}{\left(\left(\frac{P_t}{T_t}\right) - \left(\frac{P_{ti}}{T_{ti}}\right)\right)} \right] C_{mN2} \tag{Eq. 25C-2}$$

12.4 Oxygen Concentration in the landfill gas. Use equation 25C-3 to calculate the measured concentration of oxygen in the original landfill gas.

$$C_{Ox} = \left[\frac{\left(\frac{P_{tf}}{T_{tf}}\right)}{\left(\left(\frac{P_t}{T_t}\right) - \left(\frac{P_{ti}}{T_{ti}}\right)\right)} \right] C_{mOx} \tag{Eq. 25C-3}$$

12.5 You must correct the NMOC Concentration for the concentration of nitrogen or oxygen based on which gas or gases passes the requirements in section 9.1.

12.5.1 NMOC Concentration with nitrogen correction. Use Equation 25C-4 to calculate the concentration of NMOC for each

sample tank when the nitrogen concentration is less than 20 percent.

$$C_t = \frac{\frac{P_{tf}}{T_{tf}}}{\left(\frac{P_t}{T_t} - \frac{P_{ti}}{T_{ti}}\right) \left(1 - \frac{99}{78} C_{N2}\right) - B_w} \frac{1}{r} \sum_{j=1}^r C_{tm(j)} \tag{Eq. 25C-4}$$

12.5.2 NMOC Concentration with oxygen correction. Use Equation 25C-5 to calculate the concentration of NMOC for each sample tank if the landfill gas oxygen is less than 5

percent and the landfill gas nitrogen concentration is greater than 20 percent.

$$C_t = \frac{\frac{P_{tf}}{T_{tf}}}{\left(\frac{P_t}{T_t} - \frac{P_{ti}}{T_{ti}}\right) \left(1 - \frac{99}{21} C_{Ox}\right) - B_w} \frac{1}{r} \sum_{j=1}^r C_{tm(j)} \tag{Eq. 25C-5}$$

* * * * *

- 16. In appendix A-8 to Part 60:
- a. Revise section 13.3 in Method 26.
- b. Revise sections 4.3 and 8.1.6 in Method 26A.

- c. Revise section 8.2.9.3 in Method 29.
- d. Add sections 10.4 and 10.5 in Method 29.
- e. Revise the section heading for section 8.1 in Method 30A.

- f. Revise the section heading for section 8.1, and revise 8.3.3.8 in Method 30B.
- The revisions and additions read as follows:

Appendix A–8 to Part 60—Test Methods 26 Through 30B

* * * * *

Method 26—Determination of Hydrogen Chloride Emissions From Stationary Sources

* * * * *

13.3 Detection Limit. A typical IC instrumental detection limit for Cl^- is 0.2 $\mu\text{g}/\text{ml}$. Detection limits for the other analyses should be similar. Assuming 50 ml liquid recovered from both the acidified impingers, and the basic impingers, and 0.12 dscm (4.24 dscf) of stack gas sampled, then the analytical detection limit in the stack gas would be about 0.05 ppm for HCl and Cl_2 , respectively.

* * * * *

Method 26A—Determination of Hydrogen Halide and Halogen Emissions From Stationary Sources Isokinetic Method

* * * * *

4.3 High concentrations of nitrogen oxides (NO_x) may produce sufficient nitrate (NO_3^-) to interfere with measurements of very low Br^- levels. Dissociating chloride salts (e.g., ammonium chloride) at elevated temperatures interfere with halogen acid measurement in this method. Maintaining particulate probe/filter temperatures between 120 °C and 134 °C (248 °F and 273 °F) minimizes this interference.

* * * * *

8.1.6 Post-Test Moisture Removal (Optional). When the optional cyclone is included in the sampling train or when liquid is visible on the filter at the end of a sample run even in the absence of a cyclone, perform the following procedure. Upon completion of the test run, connect the ambient air conditioning tube at the probe inlet and operate the train with the filter heating system between 120 and 134 °C (248 and 273 °F) at a low flow rate (e.g., $\Delta H = 1$ in. H_2O) to vaporize any liquid and hydrogen halides in the cyclone or on the filter and pull them through the train into the impingers. After 30 minutes, turn off the flow, remove the conditioning tube, and examine the cyclone and filter for any visible liquid. If liquid is visible, repeat this step for 15 minutes and observe again. Keep repeating until the cyclone is dry.

Note: It is critical that this procedure is repeated until the cyclone is completely dry.

* * * * *

Method 29—Determination of Metals Emissions From Stationary Sources

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8.2.9.3 Wash the two permanganate impingers with 25 ml of 8 N HCl, and place the wash in a separate sample container labeled No. 5C containing 200 ml of water. First, place 200 ml of water in the container. Then wash the impinger walls and stem with the 8 N HCl by turning the impinger on its side and rotating it so that the HCl contacts all inside surfaces. Use a total of only 25 ml of 8 N HCl for rinsing *both permanganate impingers combined*. Rinse the first impinger, then pour the actual rinse used for the first impinger into the second impinger for its rinse. Finally, pour the 25 ml of 8 N

HCl rinse carefully into the container with the 200 ml of water. Mark the height of the fluid level on the outside of the container in order to determine if leakage occurs during transport.

* * * * *

10.4 Field Balance Calibration Check. Check the calibration of the balance used to weigh impingers with a weight that is at least 500g or within 50g of a loaded impinger. The weight must be ASTM E617–13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference—see 40 CFR 60.17) Class 6 (or better). Daily before use, the field balance must measure the weight within $\pm 0.5\text{g}$ of the certified mass. If the daily balance calibration check fails, perform corrective measures and repeat the check before using balance.

10.5 Analytical Balance Calibration. Perform a multipoint calibration (at least five points spanning the operational range) of the analytical balance before the first use, and semiannually thereafter. The calibration of the analytical balance must be conducted using ASTM E617–13 “Standard Specification for Laboratory Weights and Precision Mass Standards” (incorporated by reference—see 40 CFR 60.17) Class 2 (or better) tolerance weights. Audit the balance each day it is used for gravimetric measurements by weighing at least one ASTM E617–13 Class 2 tolerance (or better) calibration weight that corresponds to 50 to 150 percent of the weight of one filter or between 1g and 5g. If the scale cannot reproduce the value of the calibration weight to within 0.5 mg of the certified mass, perform corrective measures, and conduct the multipoint calibration before use.

* * * * *

Method 30A—Determination of Total Vapor Phase Mercury Emissions From Stationary Sources (Instrumental Analyzer Procedure)

* * * * *

8.1 Selection of Sampling Sites and Sampling Points * * *

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Method 30B—Determination of Total Vapor Phase Mercury Emissions From Coal-Fired Combustion Sources Using Carbon Sorbent Traps

* * * * *

8.1 Selection of Sampling Sites and Sampling Points * * *

* * * * *

8.3.3.8 Sample Handling, Preservation, Storage, and Transport. While the performance criteria of this approach provides for verification of appropriate sample handling, it is still important that the user consider, determine and plan for suitable sample preservation, storage, transport, and holding times for these measurements. Therefore, procedures in ASTM D6911–15 “Standard Guide for Packaging and Shipping Environmental Samples for Laboratory Analysis” (incorporated by reference—see 40 CFR 60.17) shall be followed for all samples, where appropriate. To avoid Hg contamination of the samples, special attention should be paid to cleanliness during transport, field

handling, sampling, recovery, and laboratory analysis, as well as during preparation of the sorbent cartridges. Collection and analysis of blank samples (e.g., reagent, sorbent, field, etc.) is useful in verifying the absence or source of contaminant Hg.

* * * * *

- 17. In appendix B to part 60:
 - a. Add the entry “Performance Specification 16—Specifications and Test Procedures for Predictive Emission Monitoring Systems in Stationary Sources” at the end of the table of contents for appendix B to part 60.
 - b. Add a sentence to the end of section 8.1(2)(i) in Performance Specification 1.
 - c. Revise sections 3.11, 6.1.1, 6.1.2, 16.3.2, and section 18.0 in Performance Specification 2.
 - d. Revise section 13.2 in Performance Specification 3.
 - e. Revise sections 8.3, 8.3.1, and 13.3 in Performance Specification 4A.
 - f. Revise sections 12.1 and 13.1 in Performance Specification 11.
 - g. Revise section 9.1.2 in Performance Specification 15.
 - h. Add reserved sections 14.0 and 15.0 in Performance Specification 15.
 - i. Revise the introductory text of section 12.2.3 in Performance Specification 16.
 - j. Revise table 16–1 in Performance Specification 16.

The revisions and additions read as follows:

Appendix B to Part 60—Performance Specifications

* * * * *

Performance Specification 1—Specifications and Test Procedures for Continuous Opacity Monitoring Systems in Stationary Sources

* * * * *

8.1 * * *

(2) * * *

(i) * * * Alternatively, you may select a measurement location specified in paragraph 8.1(2)(ii) or 8.1(2)(iii).

* * * * *

Performance Specification 2—Specifications and Test Procedures for SO_2 and NO_x Continuous Emission Monitoring Systems in Stationary Sources

* * * * *

3.11 *Span Value* means the calibration portion of the measurement range as specified in the applicable regulation or other requirement. If the span is not specified in the applicable regulation or other requirement, then it must be a value approximately equivalent to two times the emission standard. For spans less than 500 ppm, the span value may either be rounded upward to the next highest multiple of 10 ppm, or to the next highest multiple of 100 ppm such that the equivalent emission concentration is not less than 30 percent of the selected span value.

* * * * *

6.1.1 Data Recorder. The portion of the CEMS that provides a record of analyzer output. The data recorder may record other pertinent data such as effluent flow rates, various instrument temperatures or abnormal CEMS operation. The data recorder output range must include the full range of expected concentration values in the gas stream to be sampled including zero and span values.

6.1.2 The CEMS design should also allow the determination of calibration drift at the

zero and span values. If this is not possible or practical, the design must allow these determinations to be conducted at a low-level value (zero to 20 percent of the span value) and at a value between 50 and 100 percent of the span value. In special cases, the Administrator may approve a single-point calibration drift determination.

* * * * *

16.3.2 For diluent CEMS:
RA=d; ≤0.7 percent O₂ or CO₂, as applicable.

Note: Waiver of the relative accuracy test in favor of the alternative RA procedure does not preclude the requirements to complete the CD tests nor any other requirements specified in an applicable subpart for reporting CEMS data and performing CEMS drift checks or audits.

* * * * *

18.0 Tables, Diagrams, Flowcharts, and Validation Data

TABLE 2-1—t-VALUES

n ^a	t _{0.975}	n ^a	t _{0.975}	n ^a	t _{0.975}
2	12.706	7	2.447	12	2.201
3	4.303	8	2.365	13	2.179
4	3.182	9	2.306	14	2.160
5	2.776	10	2.262	15	2.145
6	2.571	11	2.228	16	2.131

^a The values in this table are already corrected for n – 1 degrees of freedom. Use n equal to the number of individual values.

TABLE 2-2—MEASUREMENT RANGE

Measurement point	Pollutant monitor	Diluent monitor for	
		CO ₂	O ₂
1	20–30% of span value	5–8% by volume	4–6% by volume.
2	50–60% of span value	10–14% by volume	8–12% by volume.

BILLING CODE 6560-50-P

FIGURE 2-2. RELATIVE ACCURACY DETERMINATION.

Run No.	Date and time	SO ₂			NO _x ^b			CO ₂ or O ₂ ^a		SO ₂ ^a			NO _x ^a		
		RM	CEMS	Diff	RM	CEMS	Diff	RM	CEMS	RM	CEMS	Diff	RM	CEMS	Diff
		ppm ^c			ppm ^c			% ^c	% ^c	mass/GCV			mass/GCV		
1															
2															
3															
4															
5															
6															
7															
8															
9															
10															
11															
12															
Average															
Confidence Interval															
Accuracy															

^aFor Steam generators.

^bAverage of three samples.

^cMake sure that RM and CEMS data are on a consistent basis, either wet or dry.

BILLING CODE 6560-50-C

* * * * *

Performance Specification 3—Specifications and Test Procedures for O₂ and CO₂ Continuous Emission Monitoring Systems in Stationary Sources

* * * * *

13.2 CEMS Relative Accuracy Performance Specification. The RA of the

CEMS must be no greater than 20.0 percent of the mean value of the reference method (RM) data when calculated using equation 3-1. The results are also acceptable if the result of Equation 3-2 is less than or equal to 1.0 percent O₂ (or CO₂).

$$RA = \frac{[|\bar{d}| + |CC|]}{\overline{RM}} \times 100$$

Eq. 3-1

Where:

$|\bar{d}|$ = Absolute value of the mean of the differences (from Equation 2-3 of Performance Specification 2).

$|CC|$ = Absolute value of the confidence coefficient (from Equation 2-5 of Performance Specification 2).

\overline{RM} = Average Reference Method value.

$$RA = \overline{RM} - \overline{CEMS} \quad \text{Eq. 3-2}$$

\overline{RM} = Average Reference Method value.

\overline{CEMS} = Average CEMS value.

* * * * *

**Performance Specification 4A—
Specifications and Test Procedures for
Carbon Monoxide Continuous Emission
Monitoring Systems in Stationary Sources**

* * * * *

8.3 Response Time Test Procedure. The response time test applies to all types of CEMS, but will generally have significance only for extractive systems. The entire system is checked with this procedure including applicable sample extraction and transport, sample conditioning, gas analyses, and data recording.

8.3.1 Introduce zero gas into the system. When the system output has stabilized (no change greater than 1 percent of full scale for

30 sec), introduce an upscale calibration gas and wait for a stable value. Record the time (upscale response time) required to reach 95 percent of the final stable value. Next, reintroduce the zero gas and wait for a stable reading before recording the response time (downscale response time). Repeat the entire procedure until you have three sets of data to determine the mean upscale and downscale response times. The slower or longer of the two means is the system response time.

* * * * *

13.3 Response Time. The CEMS response time shall not exceed 240 seconds to achieve 95 percent of the final stable value.

* * * * *

**Performance Specification 11—
Specifications and Test Procedures for
Particulate Matter Continuous Emission
Monitoring Systems at Stationary Sources**

* * * * *

12.1 How do I calculate upscale drift and zero drift? You must determine the difference in your PM CEMS output readings from the established reference values (zero and upscale check values) after a stated period of operation during which you performed no unscheduled maintenance, repair or adjustment.

(1) Calculate the upscale drift (UD) using Equation 11-1:

$$UD = \frac{|R_{CEM} - R_U|}{R_r} \times 100$$

Eq. 11-1

Where:

UD = The upscale (high-level) drift of your PM CEMS in percent,

R_{CEM} = The measured PM CEMS response to the upscale reference standard,
 R_U = The pre-established numerical value of the upscale reference standard, and

R_r = The response range of the analyzer.

(2) Calculate the zero drift (ZD) using Equation 11-2:

$$ZD = \frac{|R_{CEM} - R_L|}{R_r} \times 100$$

Eq. 11-2

Where:

ZD = The zero (low-level) drift of your PM CEMS in percent,
 R_{CEM} = The measured PM CEMS response to the zero reference standard,
 R_L = The pre-established numerical value of the zero reference standard, and
 R_r = The response range of the analyzer.

(3) Summarize the results on a data sheet similar to that shown in Table 2 (see section 17).

* * * * *

13.1 What is the 7-day drift check performance specification? Your daily PM CEMS internal drift checks must demonstrate that the average daily drift of your PM CEMS does not deviate from the value of the reference light, optical filter, Beta attenuation signal, or other technology-suitable reference standard by more than 2 percent of the response range. If your CEMS includes diluent and/or auxiliary monitors (for temperature, pressure, and/or moisture) that are employed as a necessary part of this performance specification, you must determine the calibration drift separately for

each ancillary monitor in terms of its respective output (see the appropriate performance specification for the diluent CEMS specification). None of the calibration drifts may exceed their individual specification.

* * * * *

Performance Specification 15—Performance Specification for Extractive FTIR Continuous Emissions Monitor Systems in Stationary Sources

* * * * *

9.1.2 Test Procedure. Spike the audit sample using the analyte spike procedure in section 11. The audit sample is measured directly by the FTIR system (undiluted) and then spiked into the effluent at a known dilution ratio. Measure a series of spiked and unspiked samples using the same procedures as those used to analyze the stack gas. Analyze the results using sections 12.1 and 12.2. The measured concentration of each analyte must be within ±5 percent of the expected concentration (plus the uncertainty), *i.e.*, the calculated correction

factor must be within 0.93 and 1.07 for an audit with an analyte uncertainty of ±2 percent.

* * * * *

14.0 Pollution Prevention [Reserved]

15.0 Waste Management [Reserved]

* * * * *

Performance Specification 16—Specifications and Test Procedures for Predictive Emission Monitoring Systems in Stationary Sources

* * * * *

12.0 Calculations and Data Analysis

* * * * *

12.2.3 Confidence Coefficient. Calculate the confidence coefficient using Equation 16-3 and Table 16-1 for n - 1 degrees of freedom.

* * * * *

17.0 Tables, Diagrams, Flowcharts, and Validation Data

TABLE 16-1—t-VALUES FOR ONE-SIDED, 97.5 PERCENT CONFIDENCE INTERVALS FOR SELECTED SAMPLE SIZES *

n - 1 *	t-value	n - 1	t-value
1	12.706	15	2.131
2	4.303	16	2.120
3	3.182	17	2.110
4	2.776	18	2.101
5	2.571	19	2.093
6	2.447	20	2.086
7	2.365	21	2.080
8	2.306	22	2.074
9	2.262	23	2.069
10	2.228	24	2.064
11	2.201	25	2.060
12	2.179	26	2.056
13	2.160	27	2.052
14	2.145	>28	t-Table

* The value n is the number of RM runs; n - 1 equals the degrees of freedom.

* * * * *

■ 18. Revise section 12.0 paragraphs (3) and (4) in Procedure 2 of appendix F to part 60 to read as follows:

Appendix F to Part 60—Quality Assurance Procedures

* * * * *

Procedure 2—Quality Assurance Requirements for Particulate Matter Continuous Emission Monitoring Systems at Stationary Sources

* * * * *

12.0 What calculations and data analysis must I perform for my PM CEMS?

* * * * *

(3) How do I calculate daily upscale and zero drift? You must calculate the upscale drift using Equation 2-2 and the zero drift using Equation 2-3:

$$UD = \frac{|R_{CEM} - R_U|}{R_r} \times 100$$

Eq. 2-2

Where:

UD = The upscale drift of your PM CEMS, in percent,

R_{CEM} = Your PM CEMS response to the upscale check value,

R_U = The upscale check value, and

R_r = The response range of the analyzer.

$$ZD = \frac{|R_{CEM} - R_L|}{R_r} \times 100$$

Eq. 2-3

Where:

ZD = The zero (low-level) drift of your PM CEMS, in percent,

R_{CEM} = Your PM CEMS response of the zero check value,

R_L = The zero check value, and

R_r = The response range of the analyzer.

(4) How do I calculate SVA accuracy? You must use Equation 2-4 to calculate the accuracy, in percent, for each of the three SVA tests or the daily sample volume check:

$$SVA \text{ Accuracy} = \frac{|V_M - V_R|}{V_R} \times 100$$

Eq. 2-4

Where:

SVA Accuracy = The SVA accuracy at each audit point, in percent,

V_M = Sample gas volume determined/ reported by your PM CEMS (e.g., dscm), and

V_R = Sample gas volume measured by the independent calibrated reference device (e.g., dscm) for the SVA or the reference value for the daily sample volume check.

Note: Before calculating SVA accuracy, you must correct the sample gas volumes measured by your PM CEMS and the independent calibrated reference device to the same basis of temperature, pressure, and moisture content. You must document all data and calculations.

* * * * *

PART 61—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS

■ 19. The authority citation for part 61 continues to read as follows:

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

■ 20. In § 61.13, revise paragraph (e)(1)(i) to read as follows:

§ 61.13 Emission tests and waiver of emission tests.

* * * * *

- (e) * * *
- (1) * * *

(i) The source owner, operator, or representative of the tested facility shall obtain an audit sample, if commercially available, from an AASP for each test method used for regulatory compliance purposes. No audit samples are required for the following test methods: Methods 3A and 3C of appendix A-3 of part 60 of this chapter; Methods 6C, 7E, 9, and 10 of appendix A-4 of part 60; Method 18 and 19 of appendix A-6 of part 60; Methods 20, 22, and 25A of appendix A-7 of part 60; Methods 30A and 30B of appendix A-8 of part 60; and Methods 303, 318, 320, and 321 of appendix A of part 63 of this chapter. If multiple sources at a single facility are tested during a compliance test event, only one audit sample is required for each method used during a compliance test. The compliance authority

responsible for the compliance test may waive the requirement to include an audit sample if they believe that an audit sample is not necessary.

“Commercially available” means that two or more independent AASPs have blind audit samples available for purchase. If the source owner, operator, or representative cannot find an audit sample for a specific method, the owner, operator, or representative shall consult the EPA Web site at the following URL, www.epa.gov/ttn/emc, to confirm whether there is a source that can supply an audit sample for that method. If the EPA Web site does not list an available audit sample at least 60 days prior to the beginning of the compliance test, the source owner, operator, or representative shall not be required to include an audit sample as part of the quality assurance program for the compliance test. When ordering an audit sample, the source owner, operator, or representative shall give the sample provider an estimate for the concentration of each pollutant that is emitted by the source or the estimated concentration of each pollutant based on the permitted level and the name, address, and phone number of the compliance authority. The source owner, operator, or representative shall report the results for the audit sample along with a summary of the emission test results for the audited pollutant to the compliance authority and shall report the results of the audit sample to the AASP. The source owner, operator, or representative shall make both reports at the same time and in the same manner or shall report to the compliance authority first and then report to the AASP. If the method being audited is a method that allows the samples to be analyzed in the field and the tester plans to analyze the samples in the field, the tester may analyze the audit samples prior to collecting the emission samples provided a representative of the compliance authority is present at the testing site. The tester may request, and the compliance authority may grant, a

waiver to the requirement that a representative of the compliance authority must be present at the testing site during the field analysis of an audit sample. The source owner, operator, or representative may report the results of the audit sample to the compliance authority and then report the results of the audit sample to the AASP prior to collecting any emission samples. The test protocol and final test report shall document whether an audit sample was ordered and utilized and the pass/fail results as applicable.

* * * * *

■ 21. Revise the section heading for section 11.7.3 in Method 107 of appendix B to part 61 to read as follows:

Appendix B to Part 61—Test Methods

* * * * *

Method 107—Determination of Vinyl Chloride Content of In-Process Wastewater Samples, and Vinyl Chloride Content of Polyvinyl Chloride Resin Slurry, Wet Cake, and Latex Samples

* * * * *

11.0 Analytical Procedure

* * * * *

11.7.3 Dispersion Resin Slurry and Latex Samples.

* * * * *

PART 63—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR SOURCE CATEGORIES

■ 22. The authority citation for part 63 continues to read as follows:

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

■ 23. In § 63.7:

■ a. Revise paragraph (c)(2)(iii)(A).

■ b. Add paragraph (g)(2).

The revision and addition read as follows:

§ 63.7 Performance testing requirements.

* * * * *

- (c) * * *
- (2) * * *
- (iii) * * *

(A) The source owner, operator, or representative of the tested facility shall

obtain an audit sample, if commercially available, from an AASP for each test method used for regulatory compliance purposes. No audit samples are required for the following test methods: Methods 3A and 3C of appendix A–3 of part 60 of this chapter; Methods 6C, 7E, 9, and 10 of appendix A–4 of part 60; Methods 18 and 19 of appendix A–6 of part 60; Methods 20, 22, and 25A of appendix A–7 of part 60; Methods 30A and 30B of appendix A–8 of part 60; and Methods 303, 318, 320, and 321 of appendix A of this part. If multiple sources at a single facility are tested during a compliance test event, only one audit sample is required for each method used during a compliance test. The compliance authority responsible for the compliance test may waive the requirement to include an audit sample if they believe that an audit sample is not necessary. “Commercially available” means that two or more independent AASPs have blind audit samples available for purchase. If the source owner, operator, or representative cannot find an audit sample for a specific method, the owner, operator, or representative shall consult the EPA Web site at the following URL, www.epa.gov/ttn/emc, to confirm whether there is a source that can supply an audit sample for that method. If the EPA Web site does not list an available audit sample at least 60 days prior to the beginning of the compliance test, the source owner, operator, or representative shall not be required to include an audit sample as part of the quality assurance program for the compliance test. When ordering an audit sample, the source owner, operator, or representative shall give the sample provider an estimate for the concentration of each pollutant that is emitted by the source or the estimated concentration of each pollutant based on the permitted level and the name, address, and phone number of the compliance authority. The source owner, operator, or representative shall report the results for the audit sample along with a summary of the emission test results for the audited pollutant to the compliance authority and shall report the results of the audit sample to the AASP. The source owner, operator, or representative shall make both reports at the same time and in the same manner or shall report to the compliance authority first and then report to the AASP. If the method being

audited is a method that allows the samples to be analyzed in the field and the tester plans to analyze the samples in the field, the tester may analyze the audit samples prior to collecting the emission samples provided a representative of the compliance authority is present at the testing site. The tester may request, and the compliance authority may grant, a waiver to the requirement that a representative of the compliance authority must be present at the testing site during the field analysis of an audit sample. The source owner, operator, or representative may report the results of the audit sample to the compliance authority and then report the results of the audit sample to the AASP prior to collecting any emission samples. The test protocol and final test report shall document whether an audit sample was ordered and utilized and the pass/fail results as applicable.

* * * * *

(g) * * *
 (2) Contents of report (electronic or paper submitted copy). Unless otherwise specified in a relevant standard or test method, or as otherwise approved by the Administrator in writing, the report for a performance test shall include the elements identified in paragraphs (g)(2)(i) through (vi) of this section.

(i) General identification information for the facility including a mailing address, the physical address, the owner or operator or responsible official (where applicable) and his/her email address, and the appropriate Federal Registry System (FRS) number for the facility.

(ii) Purpose of the test including the applicable regulation requiring the test, the pollutant(s) and other parameters being measured, the applicable emission standard, and any process parameter component, and a brief process description.

(iii) Description of the emission unit tested including fuel burned, control devices, and vent characteristics; the appropriate source classification code (SCC); the permitted maximum process rate (where applicable); and the sampling location.

(iv) Description of sampling and analysis procedures used and any modifications to standard procedures, quality assurance procedures and results, record of process operating conditions that demonstrate the applicable test conditions are met, and

values for any operating parameters for which limits were being set during the test.

(v) Where a test method requires you record or report, the following shall be included in your report: Record of preparation of standards, record of calibrations, raw data sheets for field sampling, raw data sheets for field and laboratory analyses, chain-of-custody documentation, and example calculations for reported results.

(vi) Identification of the company conducting the performance test including the primary office address, telephone number, and the contact for this test including his/her email address.

* * * * *

■ 24. Revise sections 13.1, 13.4, and 13.4.1 in Method 320 of appendix A to part 63 to read as follows:

Appendix A to Part 63—Test Methods Pollutant Measurement Methods From Various Waste Media

* * * * *

Method 320—Measurement of Vapor Phase Organic and Inorganic Emissions by Extractive Fourier Transform Infrared (FTIR) Spectroscopy

* * * * *

13.0 Method Validation Procedure

* * * * *

13.1 Section 6.0 of Method 301 (40 CFR part 63, appendix A), the Analyte Spike procedure, is used with these modifications. The statistical analysis of the results follows section 12.0 of EPA Method 301. Section 3 of this method defines terms that are not defined in Method 301.

* * * * *

13.4 *Statistical Treatment.* The statistical procedure of EPA Method 301 of this appendix, section 12.0 is used to evaluate the bias and precision. For FTIR testing a validation “run” is defined as spectra of 24 independent samples, 12 of which are spiked with the analyte(s) and 12 of which are not spiked.

13.4.1 *Bias.* Determine the bias (defined by EPA Method 301 of this appendix, section 12.1.1) using equation 7:

$$B = S_m - CS$$

Where:

B = Bias at spike level.

S_m = Mean concentration of the analyte spiked samples.

CS = Expected concentration of the spiked samples.

* * * * *

ENVIRONMENTAL PROTECTION AGENCY**40 CFR Part 63**

[EPA-HQ-OAR-2010-0544; FRL-9947-30-OAR]

RIN 2060-AS94

National Emission Standards for Hazardous Air Pollutants for Secondary Aluminum Production**AGENCY:** Environmental Protection Agency (EPA).**ACTION:** Direct final rule.

SUMMARY: The Environmental Protection Agency (EPA) is taking direct final action to amend the National Emission Standards for Hazardous Air Pollutants for Secondary Aluminum Production (Secondary Aluminum NESHAP). This direct final rule amends the final rule that was published in the **Federal Register** on September 18, 2015, by correcting inadvertent errors, clarifying rule requirements for initial performance tests and submittal of malfunction reports, providing an additional option for new round top furnaces to account for unmeasured emissions during compliance testing, and clarifying what constitutes a change in furnace operating mode. The direct final rule also updates Web site addresses for the EPA's Electronic Reporting Tool (ERT) and the Compliance and Emissions Data Reporting Interface (CEDRI). These amendments will help to improve compliance and implementation of the rule.

DATES: This rule is effective on September 12, 2016 without further notice, unless the EPA receives adverse comment by July 28, 2016. If the EPA receives adverse comment, we will publish a timely withdrawal in the **Federal Register** informing the public that the rule will not take effect.

Public Hearing. If anyone contacts the EPA requesting to speak at a public hearing by June 20, 2016 we will hold a public hearing on June 28, 2016 on the EPA campus at 109 T.W. Alexander Drive, Research Triangle Park, North Carolina.

ADDRESSES: Comments. Submit your comments, identified by Docket ID No. EPA-HQ-OAR-2010-0544, at <http://www.regulations.gov>. Follow the online instructions for submitting comments. Once submitted, comments cannot be edited or removed from *Regulations.gov*. The EPA may publish any comment received to its public docket. Do not submit electronically any information you consider to be Confidential

Business Information (CBI) or other information whose disclosure is restricted by statute. Multimedia submissions (audio, video, etc.) must be accompanied by a written comment. The written comment is considered the official comment and should include discussion of all points you wish to make. The EPA will generally not consider comments or comment contents located outside of the primary submission (*i.e.*, on the Web, cloud, or other file sharing system). For additional submission methods, the full EPA public comment policy, information about CBI or multimedia submissions, and general guidance on making effective comments, please visit <http://www2.epa.gov/dockets/commenting-epa-dockets>.

FOR FURTHER INFORMATION CONTACT: Ms. Rochelle Boyd, Sector Policies and Programs Division (D243-02), Office of Air Quality Planning and Standards, U.S. Environmental Protection Agency, Research Triangle Park, North Carolina 27711; telephone number: (919) 541-1390; fax number: (919) 541-3207; and email address: boyd.rochelle@epa.gov.

SUPPLEMENTARY INFORMATION:

Organization of This Document. The information in this preamble is organized as follows:

- I. General Information
 - A. Why is the EPA publishing a direct final rule?
 - B. Does this direct final rule apply to me?
 - C. What should I consider as I prepare my comments for the EPA?
- II. What are the amendments made by this direct final rule?
- III. Statutory and Executive Order Reviews
 - A. Executive Order 12866: Regulatory Planning and Review and Executive Order 13563: Improving Regulation and Regulatory Review
 - B. Paperwork Reduction Act (PRA)
 - C. Regulatory Flexibility Act (RFA)
 - D. Unfunded Mandates Reform Act (UMRA)
 - E. Executive Order 13132: Federalism
 - F. Executive Order 13175: Consultation and Coordination With Indian Tribal Governments
 - G. Executive Order 13045: Protection of Children From Environmental Health Risks and Safety Risks
 - H. Executive Order 13211: Actions Concerning Regulations That Significantly Affect Energy Supply, Distribution, or Use
 - I. National Technology Transfer and Advancement Act (NTTAA)
 - J. Executive Order 12898: Federal Actions To Address Environmental Justice in Minority Populations and Low-Income Populations
 - K. Congressional Review Act (CRA)

I. General Information*A. Why is the EPA publishing a direct final rule?*

The EPA is publishing this direct final rule without a prior proposed rule because we view this as a noncontroversial action and anticipate no adverse comment. However, in the "Proposed Rules" section of this **Federal Register**, we are publishing a separate document that will serve as the proposed rule to amend the Secondary Aluminum NESHAP, if adverse comments are received on this direct final rule. We will not institute a second comment period on this action. Any parties interested in commenting must do so at this time. For further information about commenting on this rule, see the **ADDRESSES** section of this document.

If the EPA receives adverse comment on all or a distinct portion of this direct final rule, we will publish a timely withdrawal in the **Federal Register** informing the public that some or all of this direct final rule will not take effect. We would address all public comments in any subsequent final rule based on the proposed rule.

B. Does this direct final rule apply to me?

Categories and entities potentially regulated by this direct final rule include:

Category	NAICS code ¹
Primary Aluminum Production Facilities.	331312
Secondary Aluminum Production Facilities.	331314
Aluminum Sheet, Plate, and Foil Manufacturing Facilities.	331315
Aluminum Extruded Product Manufacturing Facilities.	331316
Other Aluminum Rolling and Drawing Facilities.	331319
Aluminum Die Casting Facilities.	331521
Aluminum Foundry Facilities ...	331524

¹ North American Industry Classification System.

This table is not intended to be exhaustive, but rather provides a guide for readers regarding entities likely to be regulated by this direct final rule. To determine whether your facility is affected, you should examine the applicability criteria in 40 CFR 63.1500. If you have any questions regarding the applicability of any aspect of this action to a particular entity, consult either the air permitting authority for the entity or your EPA Regional representative as listed in 40 CFR 63.13.

C. What should I consider as I prepare my comments for the EPA?

Do not submit information containing CBI to the EPA through <http://www.regulations.gov> or email. Clearly mark the part or all of the information that you claim to be CBI. For CBI information on a disk or CD-ROM that you mail to the EPA, mark the outside of the disk or CD-ROM as CBI and then identify electronically within the disk or CD-ROM the specific information that is claimed as CBI. In addition to one complete version of the comments that includes information claimed as CBI, a copy of the comments that does not contain the information claimed as CBI must be submitted for inclusion in the public docket. Information so marked will not be disclosed except in accordance with procedures set forth in 40 CFR part 2. Send or deliver information identified as CBI only to the following address: OAQPS Document Control Officer (C404-02), OAQPS, U.S. Environmental Protection Agency, Research Triangle Park, North Carolina 27711, Attention Docket ID No. EPA-HQ-OAR-2010-0544.

II. What are the amendments made by this direct final rule?

This direct final rule amends the table in Appendix A titled “Appendix A to Subpart RRR of Part 63—General Provisions Applicability to Subpart RRR.” As published in the **Federal Register** on September 18, 2015, the table consisted of three columns labeled “Citation,” “Applies to RRR,” and “Comment.” The EPA had intended to include a fourth column labeled “Requirement,” but this column was inadvertently omitted from the September 18, 2015, publication in the **Federal Register**. We are revising the table by adding a column labeled “Requirement,” which contains a brief description of the cited General Provision and republishing the entire table with appropriate updated information and clarifications. This amendment will provide additional information to the public on the content of the General Provision citations.

In response to stakeholder feedback, this direct final rule also amends 40 CFR 63.1514(e), which contains the limits on the frequency of changing furnace operating mode. The amendment clarifies that a change from one operating mode and subsequently back to the initial mode constitutes a single change. With respect to the options available to new round top furnaces to account for unmeasured emissions during compliance testing, this direct final rule also amends 40

CFR 63.1512(e)(5) to extend to new round top furnaces a compliance testing option to account for unmeasured emissions during compliance testing that is already available to uncontrolled group 1 furnaces. With this amendment, new round top furnaces will now have the option of assuming an 80-percent capture efficiency for the furnace exhaust during testing. We are adding 40 CFR 63.1516(b)(4) of the reporting requirements to clarify that malfunction reports required by 40 CFR 63.1516(d) must be submitted as part of the semiannual excess emissions/summary reports required by 40 CFR 63.1516(b). With respect to reconstructed sources, we are revising 40 CFR 63.1511(b) to clarify that under this provision reconstructed sources will be treated like new sources. In addition to correcting several minor typographical errors, we are correcting the inadvertent deletion of 40 CFR 63.1510(e)(1) and (2) from the regulatory text. These provisions relate to equipment accuracy and calibration and were previously codified when the Secondary Aluminum NESHAP was originally promulgated in 2000. The September 18, 2015, action mistakenly removed these provisions. This rulemaking replaces these provisions in the regulatory text to ensure that the regulated community has a clear understanding of the applicable compliance requirements.

III. Statutory and Executive Order Reviews

Additional information about these statutes and Executive Orders can be found at <http://www2.epa.gov/laws-regulations/laws-and-executive-orders>.

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 and was, therefore, not submitted to the Office of Management and Budget (OMB) for review.

B. Paperwork Reduction Act (PRA)

This action does not impose any new information collection burden under the PRA. OMB has previously approved the information collection activities contained in the existing regulation (40 CFR part 63, subpart RRR), and has assigned OMB control number 2060-0433. This action does not change the information collection requirements.

C. Regulatory Flexibility Act (RFA)

I certify that this action will not have a significant economic impact on a substantial number of small entities

under the RFA. This action will not impose any requirements on small entities. This action does not create any new requirements or burdens and no costs are associated with this direct final action.

D. Unfunded Mandates Reform Act (UMRA)

This action does not contain any unfunded mandate as described in UMRA, 2 U.S.C. 1531–1538, and does not significantly or uniquely affect small governments.

The action imposes no enforceable duty on any state, local, or tribal governments or the private sector.

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. There are no secondary aluminum production facilities owned or operated by tribal governments. Thus, Executive Order 13175 does not apply to this action.

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

The EPA interprets Executive Order 13045 as applying only to those regulatory actions that concern environmental health or safety risks that the 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 (NTTAA)

This rulemaking does not involve technical standards.

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 section will *not* have potential disproportionately high and adverse human health or environmental effects on minority, low-income, or indigenous populations. This action does not affect the level of protection provided to human health or the environment. The final amendments are either clarifications or corrections of compliance alternatives that will neither increase or decrease environmental protection.

K. Congressional Review Act (CRA)

This action is subject to the CRA, and the EPA will submit a rule report to each House of the Congress and to the Comptroller General of the United States. This action is not a “major rule” as defined by 5 U.S.C. 804(2).

List of Subjects in 40 CFR Part 63

Environmental protection, Administrative practice and procedures, Air pollution control, Hazardous substances, Intergovernmental relations, Reporting and recordkeeping requirements.

Dated: May 27, 2016.

Gina McCarthy,
Administrator.

For the reasons stated in the preamble, the Environmental Protection Agency is amending title 40, chapter I, part 63 of the Code of Federal Regulations (CFR) as follows:

PART 63—NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS FOR SOURCE CATEGORIES

■ 1. The authority citation for part 63 continues to read as follows:

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

Subpart RRR—National Emission Standards for Hazardous Air Pollutants for Secondary Aluminum Production

■ 2. Section 63.1510 is amended by revising paragraph (b) introductory text and adding paragraphs (e)(1) and (2) to read as follows:

§ 63.1510 Monitoring requirements.

* * * * *

(b) *Operation, maintenance, and monitoring (OM&M) plan.* The owner or operator must prepare and implement for each new or existing affected source and emission unit, a written OM&M

plan. The owner or operator of an existing affected source must submit the OM&M plan to the permitting authority for major sources, or the Administrator for area sources no later than the compliance date established by § 63.1501. The owner or operator of any new affected source must submit the OM&M plan to the permitting authority for major sources, or the Administrator for area sources within 90 days after a successful initial performance test under § 63.1511(b), or within 90 days after the compliance date established by § 63.1501 if no initial performance test is required. The plan must be accompanied by a written certification by the owner or operator that the OM&M plan satisfies all requirements of this section and is otherwise consistent with the requirements of this subpart. The owner or operator must comply with all of the provisions of the OM&M plan as submitted to the permitting authority for major sources, or the Administrator for area sources, unless and until the plan is revised in accordance with the following procedures. If the permitting authority for major sources, or the Administrator for area sources determines at any time after receipt of the OM&M plan that any revisions of the plan are necessary to satisfy the requirements of this section or this subpart, the owner or operator must promptly make all necessary revisions and resubmit the revised plan. If the owner or operator determines that any other revisions of the OM&M plan are necessary, such revisions will not become effective until the owner or operator submits a description of the changes and a revised plan incorporating them to the permitting authority for major sources, or the Administrator for area sources. Each plan must contain the following information:

* * * * *

(e) * * *

(1) The accuracy of the weight measurement device or procedure must be ±1 percent of the weight being measured. The owner or operator may apply to the permitting agency for approval to use a device of alternative accuracy if the required accuracy cannot be achieved as a result of equipment layout or charging practices. A device of alternative accuracy will not be approved unless the owner or operator provides assurance through data and information that the affected source will meet the relevant emission standard.

(2) The owner or operator must verify the calibration of the weight measurement device in accordance with the schedule specified by the

manufacturer, or if no calibration schedule is specified, at least once every 6 months.

* * * * *

■ 3. Section 63.1511 is amended by revising paragraph (b) introductory text and paragraph (i) heading to read as follows:

§ 63.1511 Performance test/compliance demonstration general requirements.

* * * * *

(b) *Initial performance test.* Following approval of the site-specific test plan, the owner or operator must demonstrate initial compliance with each applicable emission, equipment, work practice, or operational standard for each affected source and emission unit, and report the results in the notification of compliance status report as described in § 63.1515(b). The owner or operator of any affected source constructed before February 14, 2012, for which an initial performance test is required to demonstrate compliance must conduct this initial performance test no later than the date for compliance established by § 63.1501. The owner or operator of any affected source constructed or reconstructed after February 14, 2012, for which an initial performance test is required must conduct this initial performance test within 180 days after the date for compliance established by § 63.1501. Except for the date by which the performance test must be conducted, the owner or operator must conduct each performance test in accordance with the requirements and procedures set forth in § 63.7(c). Owners or operators of affected sources located at facilities which are area sources are subject only to those performance testing requirements pertaining to D/F. Owners or operators of sweat furnaces meeting the specifications of § 63.1505(f)(1) are not required to conduct a performance test.

* * * * *

(i) *Testing of commonly-ducted units not within a secondary aluminum processing unit.* * * *

* * * * *

■ 4. Section 63.1512 is amended by revising paragraph (e)(4) introductory text, paragraph (e)(4)(v), and paragraph (e)(5) to read as follows:

§ 63.1512 Performance test/compliance demonstration requirements and procedures.

* * * * *

(e) * * *

(4) When testing an existing uncontrolled furnace, the owner or operator must comply with the requirements of either paragraphs

(e)(4)(i), (ii), or (iii) of this section at the next required performance test required by § 63.1511(e).

* * * * *

(v) Round top furnaces constructed before February 14, 2012, and reconstructed round top furnaces are exempt from the requirements of paragraphs (e)(4)(i), (ii), and (iii) of this section. Round top furnaces must be operated to minimize unmeasured emissions according to paragraph (e)(7) of this section.

(5) When testing a new uncontrolled furnace, other than a new round top furnace, constructed after February 14, 2012, the owner or operator must comply with the requirements of paragraph (e)(5)(i) or (ii) of this section at the next required performance test required by § 63.1511(e). When testing a new round top furnace constructed after February 14, 2012, the owner or operator must comply with the requirements of either paragraphs (e)(5)(i), (ii), or (iii) of this section at the next required performance test required by § 63.1511(e).

(i) Install hooding that meets ACGIH Guidelines (incorporated by reference, see § 63.14), or

(ii) At least 180 days prior to testing petition the permitting authority for major sources, or the Administrator for area sources, that such hoods are impractical under the provisions of paragraph (e)(6) of this section and propose testing procedures that will minimize unmeasured emissions during the performance test according to the paragraph (e)(7) of this section, or

(iii) Assume an 80-percent capture efficiency for the furnace exhaust (i.e., multiply emissions measured at the furnace exhaust outlet by 1.25). If the source fails to demonstrate compliance using the 80-percent capture efficiency assumption, the owner or operator must re-test with a hood that meets the ACGIH Guidelines within 180 days, or petition the permitting authority for major sources, or the Administrator for area sources, within 180 days that such hoods are impractical under the provisions of paragraph (e)(6) of this section and propose testing procedures that will minimize unmeasured emissions during the performance test according to paragraph (e)(7) of this section.

(iv) The 80-percent capture efficiency assumption is not applicable in the event of testing conducted under an approved petition submitted pursuant to paragraphs (e)(5)(ii) or (iii) of this section.

* * * * *

■ 5. Section 63.1513 is amended by revising paragraph (f)(2) to read as follows:

§ 63.1513 Equations for determining compliance.

* * * * *

(f) * * *

(2) For periods of startup and shutdown, divide your measured emissions in lb/hr or µg/hr or ng/hr by the feed/charge rate in tons/hr or Mg/hr from your most recent performance test associated with a production rate greater than zero, or the rated capacity of the affected source if no prior performance test data are available.

■ 6. Section 63.1514 is amended by revising paragraphs (e) heading and (e)(1) to read as follows:

§ 63.1514 Change of furnace classification.

* * * * *

(e) *Limit on frequency of changing furnace operating mode.* (1) A change in furnace operating mode, which consists of changing from one furnace operating mode to another and subsequently back to the initial operating mode, as provided in paragraphs (a) through (d) of this section, may not be done more frequently than 4 times in any 6-month period unless you receive approval from the permitting authority or Administrator for additional changes pursuant to paragraph (e)(2).

* * * * *

■ 7. Section 63.1515 is amended by revising paragraph (b) introductory text to read as follows:

§ 63.1515 Notifications.

* * * * *

(b) *Notification of compliance status report.* Each owner or operator of an existing affected source must submit a notification of compliance status report within 60 days after the compliance date established by § 63.1501. Each owner or operator of a new affected source must submit a notification of compliance status report within 90 days after conducting the initial performance test required by § 63.1511(b), or within 90 days after the compliance date established by § 63.1501 if no initial performance test is required. The notification must be signed by the responsible official who must certify its accuracy. A complete notification of compliance status report must include the information specified in paragraphs (a)(1) through (10) of this section. The required information may be submitted in an operating permit application, in an amendment to an operating permit application, in a separate submittal, or in any combination. In a State with an approved operating permit program

where delegation of authority under section 112(l) of the CAA has not been requested or approved, the owner or operator must provide duplicate notification to the applicable Regional Administrator. If an owner or operator submits the information specified in this section at different times or in different submittals, later submittals may refer to earlier submittals instead of duplicating and resubmitting the information previously submitted. A complete notification of compliance status report must include:

* * * * *

■ 8. Section 63.1516 is amended by revising paragraph (b)(3)(i)(A), adding paragraph (b)(4), and revising paragraph (d) to read as follows:

§ 63.1516 Reports.

* * * * *

(b) * * *

(3) * * *

(i) * * *

(A) For data collected using test methods supported by the EPA's Electronic Reporting Tool (ERT) as listed on the EPA's ERT Web site (https://www3.epa.gov/ttn/chief/ert/ert_info.html), you must submit the results of the performance test to the EPA via the Compliance and Emissions Data Reporting Interface (CEDRI). (CEDRI can be accessed through the EPA's Central Data Exchange (CDX) (<https://cdx.epa.gov/>.) Performance test data must be submitted in a file format generated through the use of the EPA's ERT or an alternate electronic file format consistent with the extensible markup language (XML) schema listed on the EPA's ERT Web site. If you claim that some of the performance test information being submitted is confidential business information (CBI), you must submit a complete file generated through the use of the EPA's ERT or an alternate electronic file consistent with the XML schema listed on the EPA's ERT Web site, including information claimed to be CBI, on a compact disc, flash drive, or other commonly used electronic storage media to the EPA. The electronic media must be clearly marked as CBI and mailed to U.S. EPA/OAQPS/CORE CBI Office, Attention: Group Leader, Measurement Policy Group, MD C404-02, 4930 Old Page Rd., Durham, NC 27703. The same ERT or alternate file with the CBI omitted must be submitted to the EPA via the EPA's CDX as described earlier in this paragraph.

* * * * *

(4) A malfunction report that is required under paragraph (d) of this section shall be submitted

simultaneously with the semiannual excess emissions/summary report required by paragraph (b) of this section.

* * * * *

(d) If there was a malfunction during the reporting period, the owner or operator must submit a report that includes the emission unit ID, monitor ID, pollutant or parameter monitored, beginning date and time of the event, end date and time of the event, cause of the deviation or exceedance and corrective action taken for each malfunction which occurred during the reporting period and which caused or may have caused any applicable emission limitation to be exceeded. The report must include a list of the affected source or equipment, an estimate of the

quantity of each regulated pollutant emitted over any emission limit, and a description of the method used to estimate the emissions, including, but not limited to, product-loss calculations, mass balance calculations, measurements when available, or engineering judgment based on known process parameters. The report must also include a description of actions taken by an owner or operator during a malfunction of an affected source to minimize emissions in accordance with § 63.1506(a)(5).

* * * * *

■ 9. Section 63.1517 is amended by revising paragraph (b)(18)(ii) to read as follows:

§ 63.1517 Records.

* * * * *

(b) * * *

(18) * * *

(ii) Records of actions taken during periods of malfunction to minimize emissions in accordance with § 63.1506(a)(5), including corrective actions to restore malfunctioning process and air pollution control and monitoring equipment to its normal or usual manner of operation.

* * * * *

■ 10. Table 1 to Subpart RRR of part 63 is revised to read as follows:

BILLING CODE 6560-50-P

Table 1 to Subpart RRR of Part 63—Emission Standards for New and Existing Affected Sources

Affected source/ Emission unit	Pollutant	Limit	Units
All new and existing affected sources and emission units that are controlled with a PM add-on control device and that choose to monitor with a continuous opacity monitor (COM); and all new and existing aluminum scrap shredders that choose to monitor with a COM or to monitor visible emissions	Opacity	10	percent
New and existing aluminum scrap shredder	PM	0.01	gr/dscf
New and existing thermal chip dryer	THC	0.80	lb/ton of feed
	D/F ^a	2.50	µg TEQ/Mg of feed
New and existing scrap dryer/delacquering kiln/decoating kiln Or Alternative limits if afterburner has a design residence time of at least 1 second and operates at a temperature of at least 1400°F	PM	0.08	lb/ton of feed
	HCl	0.80	lb/ton of feed
	THC	0.06	lb/ton of feed
	D/F ^a	0.25	µg TEQ/Mg of feed
New and existing sweat furnace	PM	0.30	lb/ton of feed
	HCl	1.50	lb/ton of feed
	THC	0.20	lb/ton of feed
	D/F ^a	5.0	µg TEQ/Mg of feed
New and existing dross-only furnace	D/F ^a	0.80	ng TEQ/dscm 11% O ₂ ^b
New and existing dross-only furnace	PM	0.30	lb/ton of feed
New and existing in-line fluxer ^c	HCl	0.04	lb/ton of feed
	PM	0.01	lb/ton of feed
New and existing in-line fluxer with no reactive fluxing		No Limit	Work practice: no reactive fluxing
New and existing rotary dross cooler	PM	0.04	gr/dscf
New and existing clean furnace (Group 2)		No Limit	Work practices: clean charge only and no reactive fluxing
New and existing group 1 melting/holding furnace (processing only clean charge) ^c	PM	0.80	lb/ton of feed
	HF ^h	0.40	lb/ton of feed
	HCl	0.40	lb/ton of feed
		10	percent of the HCl upstream of the add-on control device
New and existing group 1 furnace ^c	PM	0.40	lb/ton of feed
	HF ^h	0.40	lb/ton of feed
	HCl	0.40	lb/ton of feed
		or	

Affected source/ Emission unit	Pollutant	Limit	Units
		10	percent of the HCl upstream of the add-on control device
	D/F ^a	15.0	µg TEQ/Mg of feed
New and existing group 1 furnace with clean charge only ^c	PM	0.40	lb/ton of feed
	HF ^h	0.40	lb/ton of feed
	HCl	0.40	lb/ton of feed
		or 10	percent of the HCl upstream of an add-on control device
	D/F ^a	No Limit	Clean charge only
New and existing secondary aluminum processing unit ^{a, d} (consists of all existing group 1 furnaces and existing in-line flux boxes at the facility, or any combination of new group 1 furnaces and new in-line fluxers)	PM ^e	$L_{i, PM} = \frac{\sum_{i=1}^n (L_{i, PM} \times T_i)}{\sum_{i=1}^n (T_i)} \quad (\text{Eq. 1})$	
	HCl and HF ^{f, h}	$L_{i, HCl/ HF} = \frac{\sum_{i=1}^n (L_{i, HCl/ HF} \times T_i)}{\sum_{i=1}^n (T_i)} \quad (\text{Eq. 2})$	
	D/F ^g	$L_{i, D/F} = \frac{\sum_{i=1}^n (L_{i, D/F} \times T_i)}{\sum_{i=1}^n (T_i)} \quad (\text{Eq. 3})$	

^a D/F limit applies to a unit at a major or area source.

^b Sweat furnaces equipped with afterburners meeting the specifications of § 63.1505(f)(1) are not required to conduct a performance test.

^c These limits are also used to calculate the limits applicable to secondary aluminum processing units.

^d Equation definitions: $L_{i, PM}$ = the PM emission limit for individual emission unit i in the secondary aluminum processing unit [kg/Mg (lb/ton) of feed]; T_i = the feed rate for individual emission unit i in the secondary aluminum processing unit; $L_{t, PM}$ = the overall PM emission limit for the secondary aluminum processing unit [kg/Mg (lb/ton) of feed]; $L_{i, HCl/ HF}$ = the HCl or HF emission limit for individual emission unit i in the secondary aluminum processing unit [kg/Mg (lb/ton) of feed]; $L_{t, HCl/ HF}$ = the overall HCl or HF emission limit for the secondary aluminum processing unit [kg/Mg (lb/ton) of feed]; $L_{i, D/F}$ = the D/F emission limit for individual emission unit i [µg (TEQ)/Mg (gr TEQ/ton) of feed]; $L_{t, D/F}$ = the overall D/F emission limit for the secondary aluminum processing unit [µg TEQ/Mg (gr TEQ/ton) of feed]; n = the number of units in the secondary aluminum processing unit.

^e In-line fluxers using no reactive flux materials cannot be included in this calculation since they are not subject to the PM limit.

^f In-line fluxers using no reactive flux materials cannot be included in this calculation since they are not subject to the HCl and HF limit. Controlled group 1 furnaces cannot be included in the HF emissions calculation because they are not subject to HF limits.

^g Clean charge furnaces cannot be included in this calculation since they are not subject to the D/F limit.

^h HF limits apply only to uncontrolled group 1 furnaces.

■ 11. Table 2 to Subpart RRR of part 63 is amended by revising the entry “Group 1 furnace without add-on air pollution controls (including those that are part of a secondary aluminum processing unit)” to read as follows:

TABLE 2 TO SUBPART RRR OF PART 63—SUMMARY OF OPERATING REQUIREMENTS FOR NEW AND EXISTING AFFECTED SOURCES AND EMISSION UNITS

Affected source/emission unit	Monitor type/operation/process	Operating requirements
Group 1 furnace without add-on air pollution controls (including those that are part of a secondary aluminum processing unit).	Reactive flux injection rate	Maintain the total reactive chlorine flux injection rate and total reactive fluorine flux injection rate for each operating cycle or time period used in the performance test at or below the average rate established during the performance test.

■ 12. Table 3 to Subpart RRR of part 63 is amended by:

- a. Revising the entry “In-line fluxer with lime-injected fabric filter;”
- b. Revising the entry “Group 1 furnace with lime-injected fabric filter;” and
- c. Revising footnote d to Table 3. The revisions read as follows:

TABLE 3 TO SUBPART RRR OF PART 63—SUMMARY OF MONITORING REQUIREMENTS FOR NEW AND EXISTING AFFECTED SOURCES AND EMISSION UNITS

Affected source/emission unit	Monitor type/operation/process	Operating requirements
In-line fluxer with lime-injected fabric filter.	Bag leak detector or	Install and operate in accordance with manufacturer’s operating instructions.
	COM	Design and install in accordance with PS–1; collect data in accordance with subpart A of 40 CFR part 63; determine and record 6-minute block averages.
	Reactive flux injection rate	Weight measurement device accuracy of ±1%; ^b calibrate according to manufacturer’s specifications or at least once every 6 months; record time, weight and type of reactive flux added or injected for each 15-minute block period while reactive fluxing occurs; calculate and record total reactive chlorine flux injection rate and the total reactive fluorine flux injection rate for each operating cycle or time period used in performance test; or Alternative flux injection rate determination procedure per § 63.1510(j)(5). For solid flux added intermittently, record the amount added for each operating cycle or time period used in the performance test.
Group 1 furnace with lime-injected fabric filter.	Bag leak detector or	Install and operate in accordance with manufacturer’s operating instructions.
	COM	Design and install in accordance with PS–1; collect data in accordance with subpart A of 40 part CFR 63; determine and record 6-minute block averages.
	Lime injection rate	For continuous injection systems, record feeder setting daily and inspect each feed hopper or silo every 8 hours to verify that lime is free-flowing; record results of each inspection. If blockage occurs, inspect every 4 hours for 3 days; return to 8-hour inspections if corrective action results in no further blockage during 3-day period. ^c Verify monthly that the lime injection rate is no less than 90 percent of the rate used during the compliance demonstration test.
	Reactive flux injection rate	Weight measurement device accuracy of ±1%; ^b calibrate every 3 months; record weight and type of reactive flux added or injected for each 15-minute block period while reactive fluxing occurs; calculate and record total reactive chlorine flux injection rate and the total reactive fluorine flux injection rate for each operating cycle or time period used in performance test; or Alternative flux injection rate determination procedure per § 63.1510(j)(5). For solid flux added intermittently, record the amount added for each operating cycle or time period used in the performance test.

^bPermitting agency may approve measurement devices of alternative accuracy, for example in cases where flux rates are very low and costs of meters of specified accuracy are prohibitive; or where feed/charge weighing devices of specified accuracy are not practicable due to equipment layout or charging practices.

^cPermitting authority for major sources, or the Administrator for area sources may approve other alternatives including load cells for lime hopper weight, sensors for carrier gas pressure, or HCl monitoring devices at fabric filter outlet.

^dThe frequency of volumetric flow rate measurements may be decreased to once every 5 years if daily differential pressure measures, daily fan RPM, or daily fan motor amp measurements are made in accordance with § 63.1510(d)(2)(ii)–(iii). The frequency of annual verification of a permanent total enclosure may be decreased to once every 5 years if negative pressure measurements in the enclosure are made daily in accordance with § 63.1510(d)(2)(iv). In lieu of volumetric flow rate measurements or verification of permanent total enclosure, sweat furnaces may demonstrate annually negative air flow into the sweat furnace opening in accordance with § 63.1510(d)(3).

* * * * *

■ 13. Revise Appendix A to Subpart RRR of part 63 to read as follows:

APPENDIX A TO SUBPART RRR OF PART 63—GENERAL PROVISIONS APPLICABILITY TO SUBPART RRR

Citation	Requirement	Applies to RRR	Comment
§ 63.1(a)(1)–(4)	General Applicability	Yes.	
§ 63.1(a)(5)		No	[Reserved].
§ 63.1(a)(6)		Yes.	
§ 63.1(a)(7)–(9)		No	[Reserved].
§ 63.1(a)(10)–(12)		Yes.	
§ 63.1(b)	Initial Applicability Determination	Yes	EPA retains approval authority.
§ 63.1(c)(1)	Applicability After Standard Established.	Yes.	
§ 63.1(c)(2)		Yes	§ 63.1500(e) exempts area sources subject to this subpart from the obligation to obtain Title V operating permits.
§ 63.1(c)(3)–(4)		No	[Reserved].
§ 63.1(c)(5)		Yes.	
§ 63.1(d)		No	[Reserved].
§ 63.1(e)	Applicability of Permit Program	Yes.	
§ 63.2	Definitions	Yes	Additional definitions in § 63.1503.
§ 63.3	Units and Abbreviations	Yes.	
§ 63.4(a)(1)–(2)	Prohibited Activities	Yes.	
§ 63.4(a)(3)–(5)		No	[Reserved].
§ 63.4(b)	Circumvention	Yes.	
§ 63.4(c)	Fragmentation	Yes.	
§ 63.5(a)	Applicability of Preconstruction Review and Notification.	Yes.	
§ 63.5(b)(1)	Requirements for Existing, Newly, Constructed Sources and Reconstructed Sources.	Yes.	
§ 63.5(b)(2)		No	[Reserved].
§ 63.5(b)(3)–(4)		Yes.	
§ 63.5(b)(5)		No	[Reserved].
§ 63.5(b)(6)		Yes.	
§ 63.5(c)		No	[Reserved].
§ 63.5(d)	Application for Approval of Construction or Reconstruction.	Yes.	
§ 63.5(e)	Approval of Construction or Reconstruction.	Yes.	
§ 63.5(f)	Approval of Construction or Reconstruction Based on Prior State Preconstruction Review.	Yes.	
§ 63.6(a)	Applicability for Compliance with Standards and Maintenance Requirements.	Yes.	
§ 63.6(b)(1)–(5)	Compliance Dates for New and Reconstructed Sources.	Yes	§ 63.1501 specifies dates.
§ 63.6(b)(6)		No	[Reserved].
§ 63.6(b)(7)		Yes.	
§ 63.6(c)(1)	Compliance Dates for Existing Sources.	Yes	§ 63.1501 specifies dates.
§ 63.6(c)(2)		Yes.	
§ 63.6(c)(3)–(4)		No	[Reserved].
§ 63.6(c)(5)		Yes.	
§ 63.6(d)		No	[Reserved].
§ 63.6(e)(1)(i)	Operation and Maintenance Requirements.	No	See § 63.1506(a)(5) for general duty requirement. Any other cross reference to § 63.6(3)(1)(i) in any other general provision referenced shall be treated as a cross reference to § 63.1506(a)(5).

APPENDIX A TO SUBPART RRR OF PART 63—GENERAL PROVISIONS APPLICABILITY TO SUBPART RRR—Continued

Citation	Requirement	Applies to RRR	Comment
§ 63.6(e)(1)(ii)		No.	
§ 63.6(e)(2)		No	[Reserved].
§ 63.6(e)(3)	Startup, Shutdown, and Malfunction Plan.	No.	
§ 63.6(f)(1)	Compliance with Nonopacity Emission Standards.	No.	
§ 63.6(f)(2)		Yes.	
§ 63.6(g)	Use of an Alternative Nonopacity Emission Standard.	No.	
§ 63.6(h)(1)	Applicability for Compliance with Opacity and Visible Emission Standards.	No.	
§ 63.6(h)(2)	Methods for Determining Compliance.	Yes.	
§ 63.6(h)(3)		No	[Reserved].
§ 63.6(h)(4)–(9)		Yes.	
§ 63.6(i)(1)–(14)	Extension of Compliance	Yes.	
§ 63.6(i)(15)		No	[Reserved].
§ 63.6(i)(16)		Yes.	
§ 63.6(j)	Exemption from Compliance	Yes.	
§ 63.7(a)	Applicability and Performance Test Dates.	Yes	Except § 63.1511 establishes dates for initial performance tests.
§ 63.7(b)	Notification of Performance Test	Yes.	
§ 63.7(c)	Quality Assurance Program	Yes.	
§ 63.7(d)	Performance Testing Facilities	Yes.	
§ 63.7(e)(1)	Conduct of Performance Tests	No.	
§ 63.7(e)(2)		Yes.	
§ 63.7(e)(3)		Yes.	
§ 63.7(f)	Use of an Alternative Test Method	Yes.	
§ 63.7(g)(1)–(3)	Data Analysis, Recordkeeping, and Reporting.	Yes	Except for § 63.7(g)(2), which is reserved.
§ 63.7(h)(1)–(5)	Waiver of Performance Tests	Yes.	
§ 63.8(a)(1)	Applicability for Monitoring Requirements.	Yes.	
§ 63.8(a)(2)		Yes.	
§ 63.8(a)(3)		No	[Reserved].
§ 63.8(a)(4)		Yes.	
§ 63.8(b)	Conduct of Monitoring	Yes.	
§ 63.8(c)(1)(i)	Operation and Maintenance of Continuous Monitoring Systems (CMS).	No	See § 63.1506(a)(5) for general duty requirement.
§ 63.8(c)(1)(ii)		Yes.	
§ 63.8(c)(1)(iii)		No.	
§ 63.8(c)(2)–(8)		Yes.	
§ 63.8(d)(1)–(2)	Quality Control Program	Yes.	
§ 63.8(d)(3)		Yes, except for last sentence, which refers to an SSM plan. SSM plans are not required.	
§ 63.8(e)	Performance Evaluation of CMS	Yes.	
§ 63.8(f)(1)–(5)	Use of an Alternative Monitoring Method.	No	§ 63.1501(w) includes provisions for monitoring alternatives.
§ 63.8(f)(6)	Alternative to the Relative Accuracy Test.	Yes.	
§ 63.8(g)(1)	Reduction of Monitoring Data	Yes.	
§ 63.8(g)(2)		No	§ 63.1512 requires five 6-minute averages for an aluminum scrap shredder.
§ 63.8(g)(3)–(5)		Yes.	
§ 63.9(a)	Applicability and General Information for Notification Requirements.	Yes.	
§ 63.9(b)(1)–(5)	Initial Notifications	Yes	Except § 63.9(b)(3) is reserved.
§ 63.9(c)	Request for Compliance Extension	Yes.	
§ 63.9(d)	Notification that Source is Subject to Special Compliance Requirements.	Yes.	
§ 63.9(e)	Notification of Performance Test	Yes.	
§ 63.9(f)	Notification of Opacity and Visible Emission Observations.	Yes.	
§ 63.9(g)	Additional Notification Requirement for Sources with CMS.	Yes.	

APPENDIX A TO SUBPART RRR OF PART 63—GENERAL PROVISIONS APPLICABILITY TO SUBPART RRR—Continued

Citation	Requirement	Applies to RRR	Comment
§ 63.9(h)(1)–(3)	Notification of Compliance Status ..	Yes ..	Except § 63.1515 establishes dates notification of compliance status reports.
§ 63.9(h)(4)	.....	No ..	[Reserved].
§ 63.9(h)(5)–(6)	.....	Yes.	
§ 63.9(i)	Adjustment of Deadlines for Re- quired Communications.	Yes.	
§ 63.9(j)	Change in Information Already Provided.	Yes.	
§ 63.10(a)	Applicability and General Informa- tion for Recordkeeping and Re- porting Requirements.	Yes.	
§ 63.10(b)(1)	General Recordkeeping Require- ments.	Yes.	
§ 63.10(b)(2)(i), (ii), (iv), (v)	.....	No.	
§ 63.10(b)(2)(iii), (vi)–(xiv)	.....	Yes ..	§ 63.1517 includes additional re- quirements.
§ 63.10(b)(3)	Recordkeeping Requirement for Applicability Determinations.	Yes.	
§ 63.10(c)(1)	Additional Recordkeeping Require- ments for Sources with CMS.	Yes.	
§ 63.10(c)(2)–(4)	.....	No ..	[Reserved].
§ 63.10(c)(5)	.....	Yes.	
§ 63.10(c)(6)	.....	Yes.	
§ 63.10(c)(7)–(8)	.....	Yes.	
§ 63.10(c)(9)	.....	No ..	[Reserved].
§ 63.10(c)(10)–(13)	.....	Yes.	
§ 63.10(c)(14)	.....	Yes.	
§ 63.10(c)(15)	.....	No.	
§ 63.10(d)(1)	General Reporting Requirements ..	Yes.	
§ 63.10(d)(2)	Reporting Results of Performance Tests.	Yes.	
§ 63.10(d)(3)	Reporting Results of Opacity or Visible Emission Observations.	Yes.	
§ 63.10(d)(4)	Progress Reports ..	No ..	See § 63.1516(d).
§ 63.10(d)(5)	Periodic Startup, Shutdown, and Malfunction Reports.	No ..	See § 63.1516(d).
§ 63.10(e)(1)–(2)	Additional Reporting Requirements for Sources with CMS.	Yes.	
§ 63.10(e)(3)	Excess Emissions and CMS Per- formance Report and Summary Report.	Yes ..	Reporting deadline given in § 63.1516.
§ 63.10(e)(4)	Continuous Opacity Monitoring System (COMS) Data Produced During a Performance Test.	Yes.	
§ 63.10(f)	Waiver of Recordkeeping or Re- porting Requirements.	Yes.	
§ 63.11(a)–(e)	Control Device and Work Practice Requirements.	No ..	Flares not applicable.
§ 63.12(a)–(c)	State Authority and Delegations	Yes ..	EPA retains authority for applica- bility determinations.
§ 63.13	Addresses ..	Yes.	
§ 63.14	Incorporations by Reference ..	Yes ..	ACGIH Guidelines, ASTM D7520– 13, and Interim Procedures for Estimating Risks Associated with Exposures to Mixtures of Chlorinated Dibenzo-p-Dioxins and -Dibenzofurans (CDDs and CDFs) and 1989 Update.
§ 63.15	Availability of Information and Con- fidentiality.	Yes.	
§ 63.16	Performance Track Provisions	No.	