40 CFR Parts 60 and 63
[AD–FRL–6301–6]
RIN 2060–AH–47

AGENCY: Environmental Protection Agency (EPA).

ACTION: Direct final rule.

SUMMARY: On September 5, 1996, the EPA issued the National Emission Standards for Hazardous Air Pollutants (NESHAP) for Group I Polymers and Resins (61 FR 46906); on September 12, 1996, the EPA issued the Group IV Polymers and Resins NESHAP (61 FR 48208); and on December 11, 1990, the EPA issued the Standards of Performance for Volatile Organic Compound (VOC) Emissions from the Polymer Manufacturing Industry (55 FR 51035). This action revises the promulgated rules by adding provisions, correcting errors, and making clarifications in all of the above-mentioned rulemakings, as described in the remainder of this document.

DATES: The direct final rule is effective May 10, 1999 without further notice unless the Agency receives relevant adverse comments by April 8, 1999. (However, see information on the public hearing below.) Should the Agency receive such comments, it will publish a timely withdrawal informing the public that this rule will not take effect.

Public Hearing. If anyone contacts the EPA requesting to speak at a public hearing by March 19, 1999, a public hearing will be held in Research Triangle Park, North Carolina, beginning at 10 a.m. on March 23, 1999. Persons interested in attending the hearing should call Ms. Marguerite Thweatt at (919) 541–5673 to verify that a hearing will be held. If a hearing is requested, written comments must be received by April 12, 1999.

ADDRESSES: Written comments should be submitted (in duplicate, if possible) to: Air and Radiation Docket and Information Center (6102), Attention Robert E. Rosensteel, Organic Chemicals Division, Environmental Protection Agency, 401 M Street, SW, Washington, DC 20460. The EPA requests that a separate copy of each public comment be sent to the contact person listed below (see FOR FURTHER INFORMATION CONTACT). Comments may also be submitted electronically by following the instructions provided in SUPPLEMENTARY INFORMATION.

Docket. Docket numbers A–92–44 and A–92–45, containing information relevant to this Direct Final Rule, are available for public inspection between 8 a.m. and 5:30 p.m., Monday through Friday (except for Federal holidays) at the following address: U.S. Environmental Protection Agency, Air and Radiation Docket and Information Center (MC–6102), 401 M Street, SW, Washington, DC 20460. The docket is located at the above address in Room M–1500, Waterside Mall (ground floor). Alternatively, a docket index, as well as an individual index contained in the docket, may be obtained by calling (202) 260–7548 or (202) 260–7549. A reasonable fee may be charged for copying.


SUPPLEMENTARY INFORMATION:

Regulated Entities

Entities potentially regulated by this direct final rule include:

<table>
<thead>
<tr>
<th>Category</th>
<th>Examples of regulated entities</th>
</tr>
</thead>
</table>

This table is not intended to be exhaustive, but rather provides a guide for readers regarding entities likely to be affected by this action. To determine whether your facility is regulated by this direct final rule, you should carefully examine the applicability criteria in §§ 63.480 and 63.1310 of the promulgated rules. If you have any questions regarding the applicability of this direct final rule to a particular entity, contact the person listed in the preceding FOR FURTHER INFORMATION CONTACT section.

Electronic Access and Filing Addresses

This document, the promulgated texts, and other background information are available in Docket Numbers A–92–44 and A–92–45 or by request from the EPA’s Air and Radiation Docket and Information Center (see ADDRESSES). These documents can also be accessed through the EPA web site at: http://www.epa.gov/ttn/oarpg. For further information and general questions regarding the Technology Transfer Network (TTN), call Mr. Hersch Rorex (919) 541–5637 or Mr. Phil Dickerson (919) 541–4814.

Electronic comments and data may be submitted by sending electronic mail (e-mail) to: a-and-r-docket@epamail.epa.gov. Submit comments as an ASCII file, avoiding the use of special characters and any form of encryption. Comments and data will also be accepted on diskette in Word Perfect 5.1 or 6.1 or ASCII file format. Identify all comments and data in electronic form by the docket numbers A–92–44 and/or A–92–45. No Confidential Business Information (CBI) should be submitted through electronic mail. Electronic comments may be filed online at any Federal Depository Libraries. For additional information concerning comments, see the parallel proposal action found in the Proposed Rules section of this Federal Register.

Outline

The information presented in this preamble is organized as follows:

I. Background
II. Summary of and Rationale for Revisions
   A. Correction to Equation in § 60.564
   B. Modification of Compressors
   C. Compliance Extension for Compressors
   D. Changes to the 20 ppmv Organic HAP Outlet Concentration Option for Group 1 Continuous Process Vents
   E. Addition of New PET Compliance Options
   F. Clarification of the Term “Primary Condenser”
I. Background

On September 5, 1996 (61 FR 46906), and September 12, 1996 (61 FR 48208), the EPA published the Group I Polymers and Resins NESHAP and the Group IV Polymers and Resins NESHAP, respectively. These regulations were promulgated as subparts U and JJJ in 40 CFR part 63. On November 25, 1996 the EPA published an Advance Notice of Proposed Rulemaking (ANPR) (61 FR 59849) informing the public of the intent to propose amendments to the recently promulgated Group I Polymers and Resins NESHAP and Group IV Polymers and Resins NESHAP.

Although it is anticipated that the amendments to the Group I and Group IV Polymers and Resins NESHAP will be published simultaneously with this Direct Final Rule, it is not likely that those amendments will be finalized prior to Spring 1999. For that reason, the EPA is publishing this direct final rule, which, as long as no relevant adverse comments are received by April 8, 1999, will become effective immediately (without further rulemaking action) on May 10, 1999. If adverse comments are received on one or more of the distinct amendments, paragraphs, or sections in this rulemaking, the EPA will publish a timely withdrawal in the Federal Register withdrawing the specific provisions that are the subject of adverse comment. Any provision in today’s rulemaking that does not receive adverse comment will become effective on the date set out above, notwithstanding any adverse comment on any other distinct provision in today’s rulemaking. The EPA is publishing this rule as a direct final rule because the EPA views this as a noncontroversial amendment and anticipates no adverse comments.

However, should adverse comments be received on a distinct provision in this rulemaking, the EPA will publish a timely withdrawal in the Federal Register indicating which provisions will become effective and which provisions are being withdrawn. If part or all of this Direct Final Rule is withdrawn, all public comments received will be addressed in a subsequent final rule based on today’s proposal. The nature of the changes contained in today’s direct final rule are such that it will be of great benefit to industry and the States for these changes to become effective sooner rather than later, as will be described in more detail below.

II. Summary of and Rationale for Revisions

A. Correction to Equation in § 60.564

The first correction that this direct final rule makes is to an equation in § 60.564 of the Standards for Performance for Volatile Organic Compound (VOC) Emissions from the Polymer Manufacturing Industry (subpart DDD). The equation in § 60.564(h) is being corrected so that the emission rate determined by the equation is actually in kg total organic compound (TOC) per Mg product. During work on the other changes contained in this direct final rule, the EPA became aware that the promulgated version of the equation in § 60.564(h) misplaced the conversion factor between kilograms and megagrams, resulting in an erroneous production rate of polymer. The corrected equation results in the correct units for the emission rate of TOC (i.e., kg TOC/Mg product).

B. Modification of Compressors

The remainder of the changes contained in this Direct Final Rule are either in the Group I Polymers and Resins NESHAP, in the Group IV Polymers and Resins NESHAP, or both. The NESHAP for Group I Polymers and Resins and for Group IV Polymers and Resins omitted a provision that is contained in the Hazardous Organics NESHAP (HON), 40 CFR part 63, subpart H, on which these provisions are based. This provision, as added at §§ 63.481(d)(1)(iv) and 63.1311(d)(1)(iv), specifies another criterion to be considered in determining the compliance data for compressors.

C. Compliance Extension for Compressors

This direct final rule includes new language in § 63.1311(d)(4), as § 63.1311(d)(4)(ii), which corrects an error in the promulgated paragraph. At promulgation, this paragraph identified two situations in which a compliance extension could be requested. These situations are if the compressor must be replaced or the distance piece must be recast. A third situation (which was included in subpart U, as § 63.481(d)(4)(iii)) should have been included, which is if a design modification is required to connect the compressor to a closed-vent or recovery system. As part of adding this third situation, the paragraph was reorganized to improve the clarity.

D. Changes to the 20 ppmv Organic HAP Outlet Concentration Option for Group 1 Continuous Process Vents

Several changes have been made related to the 20 ppmv organic HAP outlet concentration compliance option for Group 1 continuous process vents subject to §§ 63.485 or 63.1315, which reference to the HON process vent requirements in §§ 63.113 through 63.118. The outlet concentration limit of 20 ppmv represents the performance limit of the control technology (see 61 FR 43698, August 26, 1996, pg. 43704 for more details). When determining compliance with the 20 ppmv outlet concentration standard under §§ 63.485 or 63.1315, the promulgated rule required that the outlet concentration be corrected to 3 percent oxygen. The changes made in this direct final rule only require a correction to 3 percent oxygen if supplemental combustion air is used to combust the emissions. A definition of supplemental combustion air has also been added. Finally, similar language has been added as part of adding a 20 ppmv outlet concentration compliance option to the aggregate batch vent stream provisions. The addition of a 20 ppmv organic HAP outlet concentration compliance option for aggregate batch vent streams is discussed later in this preamble.

The Polymers and Resins I and IV rules refer directly to the HON for control of continuous process vents subject to §§ 63.485 or 63.1315. Both rules (Polymers and Resins I and IV) refer to, and are based on, the HON process vent requirements for aggregate batch vent streams. Under the HON, the correction to 3 percent oxygen is
required for purposes of demonstrating compliance with the 20 ppmv outlet concentration standard. The purpose of correcting an outlet concentration to 3 percent oxygen is to prevent owners or operators from diluting streams to meet the 20 ppmv outlet concentration standard; dilution as a means of complying with a part 63 standard is prohibited by the General Provisions (see § 63.4(b)). The value of 3 percent originates from good engineering practices. Synthetic Organic Chemical Manufacturing (SOCM1) facilities subject to the HON do not typically have high oxygen, low VOC/HAP concentration streams; streams from SOCM1 unit operations are typically low oxygen, high VOC/HAP concentration streams that require supplemental combustion air for purposes of combating the emissions. For such oxygen deficient vent streams, adding the proper amount of supplemental combustion air would result in the outlet containing approximately 3 percent oxygen. The HON continuous process vent provisions are written assuming that continuous process vents will require supplemental combustion air when they are combusted, and therefore requires a 3 percent oxygen correction for all continuous process vents to prevent dilution.

The concept of requiring the correction to 3 percent oxygen only when supplemental combustion air is used, as is done in this direct final rule has a precedent in the Polymer Manufacturing New Source Performance Standards (NSPS). During development of the Polymer Manufacturing NSPS, the issue of requiring a high oxygen, low VOC concentration stream to correct the outlet concentration to 3 percent oxygen was raised. Commenters made the point that an oxygen correction may be appropriate for oxygen deficient streams where supplemental combustion air has been added in order to ensure combustion of the emissions, but such a correction is not appropriate for high oxygen, low VOC concentration streams. Review of this concern revealed that requiring an oxygen correction for processes with inherently high oxygen concentration streams would amount to taking away the compliance option of reaching the 20 ppmv outlet concentration. Because the combination of low VOC/HAP concentration and technology limitations of control devices sometimes make it impossible to achieve a 98 percent emission reduction, the 20 ppmv outlet concentration for all or be necessary for some streams. For the group of streams that cannot demonstrate a 98 percent emission reduction, failure to address this issue would make it impossible for owners or operators to demonstrate compliance. As a result of these considerations, the final rule for the Polymer Manufacturing NSPS was changed to require a correction to 3 percent oxygen only if supplemental combustion air was used to combust the emissions.

The EPA has determined that a similar amendment is appropriate for the Polymers and Resins I and IV rules. Accordingly, the EPA has conducted a technical analysis to provide additional support for this decision. The technical analysis is documented in a memorandum to the project docket. The analysis found that an oxygen correction had not been applied to the data used to develop the 20 ppmv outlet concentration standard. Therefore, the 20 ppmv value is appropriate as an outlet concentration standard for uncorrected outlet concentrations (i.e., streams that do not require supplemental combustion air). This amendment does not alter the use of the 20 ppmv value compliance option where supplemental combustion air is used, provided, as with the promulgated rule, a 3 percent oxygen correction is made. Because the proper addition of supplemental combustion air should result in an oxygen outlet concentration of approximately 3 percent, requiring a correction to 3 percent oxygen should not change the outlet concentration of VOC/HAP significantly, and will ensure that the 20 ppmv outlet concentration standard will not be met through dilution.

In conclusion, the Polymers and Resins I and IV rules regulate industries (i.e., elastomer producers and thermoplastic producers, respectively) that may contain high oxygen, low VOC/HAP concentration process vent streams (e.g., streams that do not require supplemental combustion air such as vent streams from dryers), as well as low oxygen concentration streams. Therefore, for the same reason that a change was made to the Polymer Manufacturing NSPS and based on the support provided by the technical analysis described above, a provision to require an outlet concentration oxygen correction only when supplemental combustion air is used has been added to the continuous process vent provisions (i.e., §§ 63.485 and 63.1315) for the Polymers and Resins I and IV rules. Similar changes have been made to the aggregate batch vent stream provisions, as part of adding a 20 ppmv outlet concentration compliance option to those provisions.

Definitions of “supplemental combustion air” and “combustion device burner”. The EPA has added a definition of supplemental combustion air that reads as follows:

Supplemental combustion air means the air that is added to a vent stream after the vent stream leaves the unit operation. Air that is part of the vent stream as a result of the nature of the unit operation is not considered supplemental combustion air. Air required to operate combustion device burner(s) is not considered supplemental combustion air.

In adding this definition, the EPA is distinguishing supplemental combustion air from dilution air and from air required to operate the combustion device burner(s). The second sentence of the definition clarifies that a vent stream can contain air that is not considered to be “supplemental combustion air,” as long as the air is part of the vent stream prior to the vent stream leaving the unit operation. This clarification ensures that processes operating at ambient or near ambient oxygen levels are not considered to be using supplemental combustion air. An example of this kind of process is a dryer, where very high flow rates of ambient air are heated and blown over/through/around polymer that is being dried and very low levels of HAP are picked up as part of the drying process. The third sentence of the definition clarifies that air used to operate combustion device burner(s) is not considered supplemental combustion air. Failure to include this clarification could allow the interpretation that every combustion device uses supplemental combustion air. To further clarify the meaning of this third sentence, the EPA has added a definition of combustion device burner that reads as follows:

Combustion device burner means a device designed to mix and ignite fuel and air to provide a flame to heat and oxidize waste organic vapors in a combustion device.

The EPA is not amending the reference in these rules to the General Provisions prohibition against dilution to prevent compliance through dilution. Section 63.4(b), Circumvention, discusses the prohibition against dilution, and specifically prohibits “the use of diluents to achieve compliance with a relevant standard based on the concentration of a pollutant in the effluent discharged to the atmosphere.”

E. Addition of New PET Compliance Options

Section 63.1316(b), which specifies control requirements for certain continuous process vents at
poly(ethylene terephthalate) (PET) affected sources, has been amended to add compliance options based on the use of combustion devices; combustion controls allowed in other sections of this rule assures highly efficient reduction of emissions. The changes to § 63.1316(b) contained in this direct final rule will provide the same option for owners or operators of continuous dimethyl terephthalate (DMT) PET processes and continuous terephthalic acid (TPA) PET processes.

The need for these changes became apparent when a request was received from a company (Docket A–92–45, Item VI–A–12) that wanted to comply with the continuous process vent requirements of § 63.1316(b) using combustion controls. In one situation, the company is controlling continuous process vents from a continuous DMT PET process with a boiler that achieves a 99.99 percent emission reduction, based on emission tests conducted by the EPA. In this case, emissions are reduced to a much greater extent than the promulgated rule requires, and wastewater streams from the process are also eliminated. In the second case, the company is controlling continuous process vents from a continuous TPA PET process with a catalytic incinerator that achieves 98 percent emission reduction. Wastewater discharges from the process are eliminated in the second case, as well.

Analysis shows that emissions are reduced to a greater extent with the control systems described above than would be achieved through compliance with the separate, promulgated process vent and wastewater provisions (Docket A–92–45, Item VI–B–22).

Therefore, the EPA believes that the same combustion control options (including, but not limited to, thermal incinerators, catalytic incinerators, boilers, or process heaters) that are allowed elsewhere in this rule (for example in § 63.1316(c) for polystyrene affected sources) should be provided in § 63.1316(b), since these combustion devices are highly efficient techniques for reducing organic HAP emissions. Also, the application of these combustion techniques allows innovative control strategies, including pollution prevention measures such as those described above, which might otherwise be discouraged under the promulgated rule.

F. Clarification of the Term “Primary Condenser”

In both the Group I and the Group IV Polymers and Resins NESHAP, this Direct Final Rule is amending language in order to clarify what these rules mean by the term “primary condenser.” This change is being made in §§ 63.488(a)(2) and 63.1233(a)(2). There was some confusion over the language contained in those paragraphs at promulgation (partially due to an inconsistency between the promulgated preambles and the promulgated rules), and with the new language the EPA hopes to eliminate any such confusion. As §§ 63.488(a)(2) and 63.1233(a)(2) should make clear, a primary condenser can be a condenser operating as a reflux condenser on either a reactor or distillation column, or can be a condenser operating on a stripper or distillation operation to recover monomer, reaction products, by-products, or solvents.

G. References to Test Methods for the Polymers and Resins I Rule

This direct final rule is also adding references to the Test Methods for the Polymers and Resins I Rule, which were finalized on March 17, 1997 (62 FR 12546), and are contained in Appendix A of part 63. The newly added references to those Test Methods are contained in §§ 63.495(b)(3) and (e) and 63.505(e)(1)(ii).


This direct final rule is making cross-reference and grammatical corrections (e.g., changing “can” to “may,” where appropriate) throughout §§ 63.503 and 63.1332. No substantive changes have been made to either of those two sections.

I. Removal of Reference to Obsolete Table

In §§ 63.506(e)(4) and 63.1335(e)(4) the “HON Table” has been removed, because that table was removed in the promulgated amendments to the HON.

J. Clarification to Group 1 Storage Vessel Requirements in Subpart JJ

A new paragraph is being introduced with this direct final rule (§ 63.1314(b)(3)), in order to clarify that, for all storage vessels that are not described in § 63.1314(b)(1) or (2), the owner or operator must control emissions to the level specified in § 63.119.

K. Process Vent Provisions for Affected Sources Producing Acrylonitrile Terephthalate Resin (ASA)/Acrylonitrile Terephthalate Resin (AMSAN)

This direct final rule includes a new paragraph at § 63.1315(e), which states the special control level for process vents at affected sources that produce acrylonitrile terephthalate acrylic acid (ASA) or alpha methyl styrene acrylonitrile resin (AMSAN). In addition, a reference to the new provisions in § 63.1315(e) has been added in § 63.1321, as § 63.1321(d).

L. Exemptions from Wastewater Provisions in Subpart JJ

This direct final rule adds two paragraphs to § 63.1330, both of which act as exemptions from certain wastewater provisions in that section. The new paragraphs are § 63.1330(d) and (e), and pertain to affected sources producing ASA/AMSAN and affected sources producing polystyrene using a continuous or batch process.

M. Amendments to Tables 3 and 5 of Subpart JJ

This direct final rule makes corrections and clarifications to both Tables 3 and 5. In the amended Table 5, the entry for Group 1 storage vessels producing styrene acrylonitrile resin (SAN) was clarified and footnote “d” was added. Because there are different control levels for different sets of storage vessels, the promulgated table appeared to present overlapping capacity and vapor pressure criteria, which was not the EPA’s intent.

III. Impacts

The changes contained in this direct final rule are corrections and clarifications of the EPA’s intent at the promulgation of subparts U and JJ, and will not affect the estimated emissions reduction or the control cost for these rules. These clarifications and corrections should make it easier for owners and operators of affected sources, and for local and State authorities, to understand and implement the requirements found in subparts U and JJ.

IV. Administrative Requirements

A. Docket

The docket is an organized and complete file of all the information considered by the EPA in the development of this rulemaking. The docket is a dynamic file, because material is added throughout the rulemaking development. The docketing system is intended to allow members of the public and industries involved to readily identify and locate documents so that they can effectively participate in the rulemaking process. Along with the proposed and promulgated standards and their preambles, the contents of the docket will serve as the
record in the case of judicial review. (See section 307(d)(7)(A) of the Act.)

B. Executive Order 12866

Under Executive Order 12866 (58 FR 51735, October 4, 1993), the EPA must submit to the Office of Management and Budget (OMB) for review significant regulatory actions. The Executive Order defines “significant regulatory action” as one that OMB determines is likely to result in a rule that may:

(1) Have an annual effect on the economy of $100 million or more or adversely affect in a material way the economy, a sector of the economy, productivity, competition, jobs, the environment, public health or safety, or State, local, or Tribal governments or communities;

(2) Create a serious inconsistency or otherwise interfere with an action taken or planned by another agency;

(3) Materially alter the budgetary impact of entitlements, grants, user fees, or loan programs, or the rights and obligations of recipients thereof; or

(4) Raise novel legal or policy issues arising out of legal mandates, the President’s priorities, or the principles set forth in the Executive Order.

It has been determined that this Direct Final Rule does not qualify as a “significant regulatory action” under the terms of Executive Order 12866 and, therefore, is not subject to review by the Office of Management and Budget.

C. Executive Order 12875: Enhancing Intergovernmental Partnerships

Under Executive Order 12875, the EPA may not issue a regulation that is not required by statute, that significantly or uniquely affects the communities of Indian tribal governments, and that imposes substantial direct compliance costs on those communities, unless the Federal government provides the funds necessary to pay the direct compliance costs incurred by the tribal governments, or EPA consults with those governments. If EPA complies by consulting, Executive Order 13084 requires EPA to provide to the Office of Management and Budget in a separately identified section of the preamble to the rule, a description of the extent of EPA’s prior consultation with representatives of affected tribal governments, a summary of the nature of their concerns, and a statement supporting the need to issue the regulation. In addition, Executive Order 13084 requires the EPA to develop an effective process permitting elected and other representatives of Indian tribal governments “to provide meaningful and timely input in the development of regulatory policies on matters that significantly or uniquely affect their communities.”

This direct final rule does not impose any duties or compliance costs on Indian tribal governments. Further, the direct final rule provided herein does not significantly alter the control standards imposed by subpart U or subpart JJ for any source, including any that may affect communities of the Indian tribal governments. Hence, today’s direct final rule does not significantly affect the communities of Indian tribal governments. Accordingly, the requirements of section 3(b) of Executive Order 13084 do not apply to this direct final rule.

D. Executive Order 13084: Consultation and Coordination With Indian Tribal Governments

Under Executive Order 13084, the EPA may not issue a regulation that is not required by statute, that significantly or uniquely affects the communities of Indian tribal governments, and that imposes substantial direct compliance costs on those communities, unless the Federal government provides the funds necessary to pay the direct compliance costs incurred by the tribal governments, or EPA consults with those governments. If EPA complies by consulting, Executive Order 12875 requires that the Agency prepare a summary of the nature of their concerns, copies of any written communications from the governments, and a statement supporting the need to issue the regulation. In addition, Executive Order 12875 requires EPA to provide to the Office of Management and Budget a description of the extent of EPA’s prior consultation with representatives of affected State, local, and tribal governments, the nature of their concerns, copies of any written communications from the governments, and a statement supporting the need to issue the regulation. In addition, Executive Order 12875 requires EPA to consult with representatives of State, local, and tribal governments “to provide meaningful and timely input in the development of regulatory proposals containing significant unfunded mandates.”

Today’s direct final rule does not create a mandate on State, local, or tribal governments. This direct final rule does not impose any enforceable duties on these entities. Accordingly, the requirements of section 1(a) of Executive Order 12875 do not apply to this direct final rule.

E. Unfunded Mandates Reform Act

Section 202 of the Unfunded Mandates Reform Act of 1995 (UMRA), requires that the Agency prepare a budgetary impact statement before promulgating a regulation that includes a Federal mandate that may result in expenditure by State, local, and tribal governments, in the aggregate, or by the private sector, of more than $100 million in any one year. Section 203 requires the Agency to establish a plan for obtaining input from and informing, educating, and advising any small governments that may be significantly or uniquely affected by the rule.

The EPA has determined that this direct final rule does not include a Federal mandate that may result in estimated costs of, in the aggregate, $100 million or more to either State, local, or tribal governments in the aggregate, or to the private sector, and that this direct final rule does not significantly or uniquely impact small governments, because it contains no requirements that apply to such governments or impose obligations upon them. The EPA has not prepared a budgetary impact statement or specifically addressed the selection of the least costly, most cost-effective, or least burdensome alternative. In addition, because small governments will not be significantly or uniquely affected by this rule, the Agency is not required to develop a plan with regard to small governments. Therefore, the requirements of the Unfunded Mandates Act do not apply to this direct final rule.

F. Regulatory Flexibility

The Regulatory Flexibility Act (RFA) generally requires an agency to conduct a regulatory flexibility analysis of any rule subject to notice and comment rulemaking requirements unless the agency certifies that the rule will not have a significant economic impact on a substantial number of small entities. Small entities include small business, small not-for-profit enterprises, and small governmental jurisdictions. This direct final rule would not have a significant impact on a substantial number of small entities, because it clarifies and makes corrections to the promulgated versions of the Group I and IV Polymers and Resins NESHAP, but imposes no additional regulatory requirements on owners or operators of affected sources.

G. Paperwork Reduction Act

For both the Group I and Group IV Polymers and Resins NESHAP, the information collection requirements (ICRs) were submitted to the OMB under the Paperwork Reduction Act. At promulgation, OMB had already approved the ICRs for the Group IV Polymers and Resins NESHAP and assigned those standards the OMB control number 2060–0351. Subsequently, the OMB approved the ICRs for the Group I Polymers and Resins NESHAP, and on July 15, 1997 (62 FR 37720) the OMB control number
2060–0356 was assigned to the Group I Polymers and Resins NESHAP. 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 the EPA's regulations are listed in 40 CFR part 9 and 48 CFR Chapter 15. The EPA has amended 40 CFR part 9, § 9.1, to indicate the ICRs contained in the Group I and IV Polymers and Resins NESHAP.

The amendments to the NESHAP contained in this direct final rule should have no impact on the information collection burden estimates made previously. Therefore, the ICRs have not been revised.

H. Applicability of Executive Order 13045

Executive Order 13045: "Protection of Children from Environmental Health Risks and Safety Risks" (62 FR 19885, April 23, 1997) applies to any rule that (1) is determined to be "economically significant" as defined under Executive Order 12866, and (2) concerns an environmental health or safety risk that the EPA has reason to believe may have a disproportionate effect on children. If the regulatory action meets both criteria, the Agency must evaluate the environmental health or safety effects of the planned rule on children, and explain why the planned regulation is preferable to other potentially effective and reasonably feasible alternatives considered by the Agency.

The EPA interprets Executive Order 13045 as applying only to those regulatory actions that are based on health or safety risks, such that the analysis required under section 5–501 of the Order has the potential to influence the regulation. This direct final rule is not subject to Executive Order 13045 because it does not establish an environmental standard intended to mitigate health or safety risks.

I. Submission to Congress and the Comptroller General

The Congressional Review Act, 5 U.S.C. 801 et seq., 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. Prior to publication of this direct final rule in the Federal Register, a major rule cannot take effect until 60 days after it is published in the Federal Register. This direct final rule is not a "major rule" as defined by 5 U.S.C. § 804(2).

J. National Technology Transfer and Advancement Act

Section 12(d) of the National Technology Transfer and Advancement Act of 1995 (NTTAA) directs all Federal agencies to use voluntary consensus standards instead of government-unique standards in their regulatory activities unless to do so would be inconsistent with applicable law or otherwise impractical. Voluntary consensus standards are technical standards (e.g., material specifications, test methods, sampling and analytical procedures, business practices, etc.) that are developed or adopted by one or more voluntary consensus standards bodies. Examples of organizations generally regarded as voluntary consensus standards bodies include the American Society for Testing and Materials (ASTM), the National Fire Protection Association (NFPA), and the Society of Automotive Engineers (SAE). The NTTAA requires Federal agencies like EPA to provide Congress, through OMB, with explanations when an agency decides not to use available and applicable voluntary consensus standards.

This action does not involve the proposal of any new technical standards. The EPA welcomes comments on this aspect of the Direct Final Rule and, specifically, invites the public to identify potentially-applicable voluntary consensus standards and to explain why such standards should be used in this regulation.

As part of a larger effort, the EPA is undertaking a project to cross-reference existing voluntary consensus standards on testing, sampling, and analysis with current and future EPA test methods. When completed, this project will assist the EPA in identifying potentially-applicable voluntary consensus standards which can then be evaluated for equivalency and applicability in determining compliance with future regulations.

List of Subjects

40 CFR Part 63

Environmental protection, Air pollution control, Hazardous substances.


Carol M. Browner,
Administrator.

For the reasons set out in the preamble, title 40, chapter I of the Code of Federal Regulations is amended 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, 7411, 7413, 7414, 7416, 7429, 7601, and 7602.

Subpart DDD—Standards for Performance for Volatile Organic Compound (VOC) Emissions From the Polymer Manufacturing Industry

§ 60.564 Test Methods and procedures.

(h) The owner or operator shall determine compliance with the mass emission per mass product standards in §§ 60.560(d) and (e) and in §§ 60.560-1(b)(1)(i), (c)(1)(i)(A), (c)(1)(ii)(A), (c)(1)(ii)(B), (c)(2)(i), and (c)(2)(ii)(A).

The emission rate of TOC shall be computed using the following equation:

\[ \text{ER}_{\text{TOC}} = \frac{E_{\text{TOC}}}{P_p \times \text{Mg}/1000 \text{kg}} \]

Where:

\( E_{\text{TOC}} \) = Emission rate of total organic compounds (minus methane and ethane), kg TOC/Mg product.

\( P_p \) = The rate of polymer produced, kg/hr.

\( \text{Mg}/1000 \text{ kg} = \text{Mg of polymer produced per kg of polymer produced.} \)

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 U—National Emission Standards for Hazardous Air Pollutant Emissions: Group I Polymers and Resins

4. Amend §63.481 by revising paragraphs (d)(1)(i), and (d)(1)(iii); and by adding paragraph (d)(1)(iv), to read as follows:

§63.481 Compliance schedule and relationship to existing applicable rules.

(d) * * * *

(i) A barrier fluid system will be installed;

(ii) A new barrier fluid will be utilized which requires changes to the existing barrier fluid system; or

(iv) The compressor will be modified to permit connecting the compressor to a fuel gas system or closed vent system, or be modified so that emissions from the compressor can be routed to a process.

5. Amend §63.482 by adding, in alphabetical order, definitions for “combustion device burner” and “supplemental combustion air,” to paragraph (b), to read as follows:

§63.482 Definitions.

(b) * * * *

Combustion device burner means a device designed to mix and ignite fuel and air to provide a flame to heat and oxidize waste organic vapors in a combustion device.

Supplemental combustion air means the air that is added to a vent stream after the vent stream leaves the unit operation. Air that is part of the vent stream as a result of the nature of the unit operation is not considered supplemental combustion air. Air required to operate combustion device burner(s) is not considered supplemental combustion air.

6. Amend §63.485 by revising paragraph (a); by adding and reserving paragraphs (l) and (u); and by adding paragraph (v), to read as follows:

§63.485 Continuous front-end process vent provisions.

(a) For each continuous front-end process vent located at an affected source, the owner or operator shall comply with the requirements of §§63.113 through 63.118, except as provided for in paragraphs (b) through (v) of this section. The owner or operator of continuous front-end process vents that are combined with one or more batch front-end process vents shall comply with paragraph (o) or (p) of this section.

(v) When a combustion device is used to comply with the 20 parts per million by volume outlet concentration standard specified in §63.113(a)(2), the correction to 3 percent oxygen is only required when supplemental combustion air is used to combust the emissions, for the purposes of this subpart. In addition, the correction to 3 percent oxygen specified in §63.116(c)(3) and (c)(3)(iii) is only required when supplemental combustion air is used to combust the emissions, for the purposes of this subpart. Finally, when a combustion device is used to comply with the 20 parts per million by volume outlet concentration standard specified in §63.113(a)(2), an owner or operator shall record and report the outlet concentration required in §63.117(a)(4)(i) and (a)(4)(iv) corrected to 3 percent oxygen when supplemental combustion air is used to combust the emissions, for the purposes of this subpart. When supplemental combustion air is not used to combust the emissions, an owner or operator may record and report the outlet concentration required in §63.117(a)(4)(i) and (a)(4)(iv) on an uncorrected basis or corrected to 3 percent oxygen, for the purposes of this subpart.

7. Amend §63.487 by revising paragraphs (b) through (d) to read as follows:

§63.487 Batch front-end process vents—reference control technology.

(b) * * * *

(2) For each aggregate batch vent stream, reduce organic HAP or TOC emissions by 90 weight percent or to a concentration of 20 parts per million by volume, whichever is less stringent, on a continuous basis using a control device. For purposes of complying with the 20 parts per million by volume outlet concentration standard, the outlet concentration shall be calculated on a dry basis. When a combustion device is used for purposes of complying with the 20 parts per million by volume outlet concentration standard, the concentration shall be corrected to 3 percent oxygen if supplemental combustion air is used to combust the emissions. If supplemental combustion air is not used, a correction to 3 percent oxygen is not required.

8. Amend §63.488 by revising paragraph (a), to read as follows:

§63.488 Methods and procedures for batch front-end process vent group determination.

(a) * * *

(2) The annual uncontrolled organic HAP or TOC emissions and annual average batch vent flow rate shall be determined at the exit from the batch unit operation. For the purposes of these determinations, the primary condenser operating as a reflux condenser on a reactor or distillation column, the primary condenser recovering monomer, reaction products, by-products, or solvent from a stripper operated in batch mode, and the primary condenser recovering monomer, reaction products, by-products, or solvent from a distillation operation operated in batch mode shall be considered part of the batch unit operation. All other devices that recover or oxidize organic HAP or TOC vapors shall be considered control devices as defined in §63.482.

9. Amend §63.490 by revising paragraph (e) introductory text and by adding paragraph (e)(3), to read as follows:

§63.490 Batch front-end process vents—performance test methods and procedures to determine compliance.

(e) Aggregate batch vent stream testing for compliance with §63.487(b)(2). Except as specified in paragraphs (e)(1) through (e)(3) of this section, owners or operators of aggregate batch vent streams complying with §63.487(b)(2) shall conduct a performance test using the performance testing procedures for continuous front-end process vents in §63.116(c).

(3) When a combustion device is used to comply with the 20 parts per million by volume outlet concentration standard specified in §63.487(b)(2), the correction to 3 percent oxygen specified in the performance testing procedures of §63.116(c)(3) and (c)(3)(iii) is only required when supplemental combustion air is used to combust the emissions, for the purposes of this subpart.

10. Amend §63.491 by revising paragraph (b)(4) introductory text and adding paragraph (b)(5), to read as follows:

§63.491 Batch front-end process vents—recordkeeping requirements.

(b) * * *

(4) The following information when using a control device to meet the
percent reduction requirement specified in § 63.487 (a)(2) or (b)(2):

(5) When complying with the 20 parts per million by volume outlet concentration standard specified in § 63.487(b)(2), records of the outlet concentration of organic HAP or TOC on a dry basis. If supplemental combustion air is used to combust the emissions, the outlet concentration shall be corrected to 3 percent oxygen. If supplemental combustion air is not used, a correction to 3 percent oxygen is not required.

11. Amend § 63.495 by revising paragraph (b)(3) and adding paragraph (e) to read as follows:

§ 63.495 Back-end process provisions—procedures to determine compliance using stripping technology.

(b) * * *

(3) The residual organic HAP content in each sample is to be determined using the Method specified in paragraph (e) of this section.

(e) The residual organic HAP content in each sample is to be determined using the Methods specified in paragraphs (c)(1) through (e)(5) of this section, as applicable.

(1) For styrene butadiene rubber produced by the emulsion process, either Method 312a, 312b, or 312c of 40 CFR part 63, appendix A, shall be used.

(2) For styrene butadiene rubber produced by the solution process, either Method 313a or 313b of 40 CFR part 63, appendix A, shall be used.

(3) For polybutadiene rubber produced by the solution process, either Method 313a or 313b of 40 CFR part 63, appendix A, shall be used.

(4) For ethylene-propylene rubber produced by the solution process, either Method 310a, 310b, or 310c of 40 CFR part 63, appendix A, shall be used.

(5) Alternatively, any other method that has been validated according to the applicable procedures in Method 301 of 40 CFR part 63, appendix A, may be used.

12. Amend § 63.503 by revising paragraphs (a) introductory text, (a)(2), (a)(3), (c) introductory text, (c)(2), (c)(5)(i), (c)(5)(ii), (d)(5), (e)(3)(ii), (e)(5), (g)(1), (g)(2)(i)(ii)(A), (g)(2)(ii)(iii)(B)(1), (g)(2)(ii)(iii)(B)(2), (g)(3), (g)(5), (g)(7)(i)(ii)(A), (h)(1) introductory text, (h)(3), (h)(5), (h)(6)(ii) introductory text (the Equation remains unchanged), (h)(7)(ii) introductory text, (i)(1) introductory text, (i)(1)(iii), (i)(2), (i)(3), (i)(5) introductory text, (j)(2)(i) introductory text, (j)(2)(ii)(B), (j)(2)(ii)(D), (j)(2)(ii)(E), (j)(2)(iv), (j)(2)(v), (k) introductory text, (k)(4) introductory text, (m)(1)(i), (m)(1)(ii), (m)(1)(iii), (m)(2)(i), (m)(2)(ii), (m)(3)(i), (m)(3)(ii), (m)(3)(iii), (m)(4)(i), (m)(5)(i), (m)(5)(ii), (m)(5)(iii), and (m)(5)(iv), to read as follows:

§ 63.503 Emissions averaging provisions.

(a) This section applies to owners or operators of existing affected sources who seek to comply with § 63.483(b) by using emissions averaging rather than following the provisions of §§ 63.484, 63.485, 63.486, 63.494, and 63.501.

(b) * * *

(2) Compliance with the provisions of this section may be based on either organic HAP or TOC.

(3) For the purposes of the provisions in this section, whenever Method 18, 40 CFR part 60, appendix A, is specified within the paragraphs of this section or is specified by reference through provisions outside this section, Method 18 or Method 25A, 40 CFR part 60, appendix A, may be used. The use of Method 25A, 40 CFR part 60, appendix A, shall conform with the requirements in paragraphs (a)(3)(i) and (a)(3)(ii) of this section.

(i) The organic HAP used as the calibration gas for Method 25A, 40 CFR part 60, appendix A, shall be the single organic HAP representing the largest percent by volume of the emissions.

(ii) The use of Method 25A, 40 CFR part 60, appendix A, is acceptable if the response from the high-level calibration gas is at least 20 times the standard deviation of the response from the zero calibration gas when the instrument is zeroed on the most sensitive scale.

(c) Paragraphs (c)(1) and (c)(4) of this section describe the emission points that may be used to generate emissions averaging credits if control was applied after November 15, 1990 and if sufficient information is available to determine the appropriate value of credits for the emission point. Paragraph (c)(5) of this section discusses the use of pollution prevention in generating emissions averaging credits.

(i) For a Group 1 storage vessel, batch front-end process vents, aggregate batch vent stream, continuous front-end process vent, or process wastewater stream, the pollution prevention measure shall reduce emissions more than if the reference control technology or standard had been applied to the emission point instead of the pollution prevention measure, except as provided in paragraph (c)(5)(ii) of this section.

(ii) If a pollution prevention measure used in conjunction with other controls for a Group 1 storage vessel, batch front-end process vents, aggregate batch vent stream, continuous front-end process vent, or process wastewater stream, the pollution prevention measure alone does not have to reduce emissions more than the reference control technology or standard, but the combination of the pollution prevention measure and other controls shall reduce emissions more than if the applicable reference control technology or standard had been applied instead of the pollution prevention measure.

(d) * * *

(5) Emission points controlled to comply with a State or Federal rule other than this subpart cannot be used to generate credits, unless the level of control has been increased after November 15, 1990 to a level above what is required by the other State or Federal rule. Only the control above what is required by the other State or Federal rule will be credited. However, if an emission point has been used to generate emissions averaging credit in an approved emissions average, and the emission point is subsequently made subject to a State or Federal rule other than this subpart, the emission point may continue to generate emissions averaging credit for the purpose of complying with the previously approved emissions average.

(e) * * *

(3) * * *

(ii) The initial demonstration in the Emissions Averaging Plan or operating permit application that credit-generating emission points will be capable of generating sufficient credits to offset the debits from the debit-generating emission points shall be made under representative operating conditions. After the compliance date, actual operating data will be used for all debit and credit calculations.

(5) Record and report quarterly and annual credits and debits in the Periodic...
Debits = \sum_{i=1}^{n} (ECFEPV_{\text{ACTUAL}} - (0.02) ECFEPV_{iu}) + \sum_{i=1}^{n} (ES_{\text{ACTUAL}} - (0.05) ES_{iu})
\hspace{1cm} + (EBEP_{\text{ACTUAL}} - EBEP_{c}) + \sum_{i=1}^{n} (EWW_{\text{ACTUAL}} - EWW_{iu})
\hspace{1cm} + \sum_{i=1}^{n} (EBFEP_{\text{ACTUAL}} - (0.1) EBFEPV_{iu}) + \sum_{i=1}^{n} (EABV_{\text{ACTUAL}} - (0.1) EABV_{iu}) \hspace{1cm} \text{[Eq. 33]}

Where:

ECFEPV_{\text{ACTUAL}} = \text{Emissions from each Group 1 continuous front-end process vent } i \text{ that is uncontrolled or is controlled to a level less stringent than the applicable reference control technology.}

EBFEPV_{\text{ACTUAL}} = \text{Emissions from each Group 1 continuous front-end process vent } i \text{ if the applicable reference control technology had been applied to the uncontrolled emissions.}

ES_{\text{ACTUAL}} = \text{Emissions from each Group 1 storage vessel } i \text{ that is uncontrolled or is controlled to a level less stringent than the applicable reference control technology or standard.}

EBEP_{\text{ACTUAL}} = \text{Emissions from back-end process operations that do not meet the residual organic HAP limits in § 63.494.}

EWW_{\text{ACTUAL}} = \text{Emissions from each Group 1 wastewater stream } i \text{ that is uncontrolled or is controlled to a level less stringent than the applicable reference control technology.}

EABV_{\text{ACTUAL}} = \text{Emissions from each Group 1 wastewater stream } i \text{ that is uncontrolled or is controlled to a level less stringent than the applicable reference control technology.}

\text{The values of } Q \text{ and } C_{i} \text{ shall be determined during a performance test conducted under representative operating conditions. The values of } Q \text{ and } C_{i} \text{ shall be calculated using the procedures specified in paragraph (g)(4)(ii) of this section.}

\text{For determining debits from Group 1 continuous front-end process vents, product recovery devices shall not be considered control devices and cannot be assigned a percent reduction in calculating } ECFEPV_{\text{ACTUAL}}. \text{ The sampling site for measurement of uncontrolled emissions is after the final product recovery device. However, as provided in § 63.113(a)(3), a Group 1 continuous front-end process vent may add sufficient product recovery to raise the TRE index value above 1.0, thereby becoming a Group 2 continuous front-end process vent. Such a continuous front-end process vent would not be a Group 1 continuous front-end process vent and would, therefore, not be included in determining debits under this paragraph.}

\text{For determining debits from Group 1 continuous front-end process vents, product recovery devices shall not be considered control devices and cannot be assigned a percent reduction in calculating } ECFEPV_{\text{ACTUAL}}. \text{ The sampling site for measurement of uncontrolled emissions is after the final product recovery device. However, as provided in § 63.113(a)(3), a Group 1 continuous front-end process vent may add sufficient product recovery to raise the TRE index value above 1.0, thereby becoming a Group 2 continuous front-end process vent. Such a continuous front-end process vent would not be a Group 1 continuous front-end process vent and would, therefore, not be included in determining debits under this paragraph.}

\text{For determining debits from Group 1 continuous front-end process vents, product recovery devices shall not be considered control devices and cannot be assigned a percent reduction in calculating } ECFEPV_{\text{ACTUAL}}. \text{ The sampling site for measurement of uncontrolled emissions is after the final product recovery device. However, as provided in § 63.113(a)(3), a Group 1 continuous front-end process vent may add sufficient product recovery to raise the TRE index value above 1.0, thereby becoming a Group 2 continuous front-end process vent. Such a continuous front-end process vent would not be a Group 1 continuous front-end process vent and would, therefore, not be included in determining debits under this paragraph.}
Credits = D \sum_{i=1}^{n} \left( (0.02) \text{ECFEPV1}_{iu} - \text{ECFEPV1}_{iACTUAL} \right) + D \sum_{i=1}^{m} \left( \text{ECFEPV2}_{iBASE} - \text{ECFEPV2}_{iACTUAL} \right)
+ D \sum_{i=1}^{n} \left( (0.05) \text{ES1}_{iu} - \text{ES1}_{iACTUAL} \right) + D \sum_{i=1}^{m} \left( \text{ES2}_{iBASE} - \text{ES2}_{iACTUAL} \right) + D \left( \text{EBEP}_{c} - \text{EBEP}_{iACTUAL} \right)
+ D \sum_{i=1}^{n} \left( (0.1) \text{EBFEPV1}_{iu} - \text{EBFEPV1}_{iACTUAL} \right) + D \sum_{i=1}^{n} \left( (0.1) \text{EABV1}_{iu} - \text{EABV1}_{iACTUAL} \right)
+ D \sum_{i=1}^{m} \left( \text{EBFPV2}_{iBASE} - \text{EBFPV2}_{iACTUAL} \right) + D \sum_{i=1}^{m} \left( \text{EABV2}_{iBASE} - \text{EABV2}_{iACTUAL} \right) \quad \text{[Eq. 41]}

Where:

D = Discount factor = 0.9 for all credit generating emission points, except those controlled by a pollution prevention measure; discount factor = 1.0 for each credit generating emission point controlled by a pollution prevention measure (i.e., no discount provided).

\text{ECFEPV1}_{iACTUAL} = \text{Emissions for each Group 1 continuous front-end process vent \(i\) that is controlled to a level more stringent than the reference control technology.} \text{ECFEPV1}_{iACTUAL} \text{ is calculated according to paragraph (h)(2)(ii) of this section.}

(0.02)\text{ECFEPV1}_{iu} = \text{Emissions from each Group 1 continuous front-end process vent \(i\) that is controlled to a level more stringent than the reference control technology.} \text{ECFEPV1}_{iACTUAL} \text{ is calculated according to paragraph (h)(2)(ii) of this section.}

\text{ES1}_{iACTUAL} = \text{Emissions from each Group 1 storage vessel \(i\) that is controlled to a level more stringent than the reference control technology or standard.} \text{ES1}_{iACTUAL} \text{ is calculated according to paragraph (h)(3) of this section.}

(0.05)\text{ES1}_{iu} = \text{Emissions from each Group 1 storage vessel \(i\) that is controlled to a level more stringent than the reference control technology or standard.} \text{ES1}_{iACTUAL} \text{ is calculated according to paragraph (h)(3) of this section.}

\text{ES2}_{iACTUAL} = \text{Emissions from each Group 2 storage vessel \(i\) that is controlled.} \text{ES2}_{iACTUAL} \text{ is calculated according to paragraph (h)(3) of this section.}

\text{ES2}_{iBASE} = \text{Emissions from each Group 2 storage vessel \(i\) at the baseline date.} \text{ES2}_{iBASE} \text{ is calculated in paragraph (h)(3) of this section.}

\text{EBEP}_{iACTUAL} = \text{Actual emissions from back-end process operations, M\(g\)/month.} \text{EBEP}_{iACTUAL} \text{ is calculated in paragraph (h)(4)(ii) of this section.}

\text{EBEP}_{c} = \text{Emissions from back-end process operations if the residual organic HAP limits in §63.494(a) were met. M\(g\)/month.} \text{EBEP}_{c} \text{ is calculated in paragraph (h)(4)(ii) of this section.}

\text{EBESP}_{c} = \text{Discount provided.}

\text{EBFPV2}_{iACTUAL} = \text{Emissions from each Group 2 batch front-end process vent \(i\) that is controlled.} \text{EBFPV2}_{iACTUAL} \text{ is calculated according to paragraph (h)(6)(iii) of this section.}

\text{EABV2}_{iBASE} = \text{Emissions from each Group 2 aggregate batch vent stream \(i\) at the baseline date.} \text{EABV2}_{iBASE} \text{ is calculated according to paragraph (g)(7)(iv) of this section.}

\text{EABV2}_{iACTUAL} = \text{Emissions from each Group 2 aggregate batch vent stream \(i\) that is controlled.} \text{EABV2}_{iACTUAL} \text{ is calculated according to paragraph (h)(7)(iii) of this section.}

\(n\) = \text{Number of Group 1 emission points included in the emissions average. The value of } n \text{ is not necessarily the same for continuous front-end process vents, batch front-end process vents, aggregate batch vent streams, storage vessels, wastewater streams, or the collection of process sections within the affected source.}

\(m\) = \text{Number of Group 2 emission points included in the emissions average. The value of } m \text{ is not necessarily the same for continuous front-end process vents, batch front-end process vents, aggregate batch vent streams, storage vessels, wastewater streams, or the collection of process sections within the affected source.}

* * * * *

(3) Emissions from storage vessels shall be calculated using the procedures specified in § 63.150(h)(3).

* * * * *

(5) Emissions from wastewater streams shall be calculated using the procedures specified in § 63.150(h)(5).

(ii) Actual emissions from Group 1 batch front-end process vents controlled to a level more stringent than the standard \(\text{EBFPV2}_{iACTUAL}\) shall be calculated using Equation 46, where percent reduction is for the batch cycle: \(\text{[Equation 46 is unchanged.]}\)

* * * * *

(7) * * *

(ii) Actual emissions from Group 1 aggregate batch vent streams controlled
to a level more stringent than the standard (EABV_{1\text{ACTUAL}}) shall be calculated using Equation 49:

\[
EABV_{1\text{ACTUAL}} = EABV_{i\text{in}} \left(1 - \frac{\text{Percent reduction}}{100}\right)
\]  

(E) For wastewater, \(E_{pp}\) shall be calculated according to §63.150(j)(2)(ii)(E). 

* * * * *

(iv) The same pollution prevention measure may reduce emissions from multiple emission points. In such cases, the percent reduction in emissions for each emission point shall be calculated.

(v) For the purposes of the equations in paragraphs (h)(2) through (h)(7) of this section, used to calculate credits for emission points controlled more stringently than the reference control technology or standard, the nominal efficiency of a pollution prevention measure is equivalent to the percent reduction in emissions for each emission point. When a pollution prevention measure is used, the owner or operator of an affected source is not required to apply to the Administrator for a nominal efficiency and is not subject to paragraph (i) of this section.

(k) The owner or operator shall demonstrate that the emissions from the pollution prevention measures proposed to be included in the emissions average will not result in greater hazard, or at the option of the Administrator, greater risk to human health or the environment than if the emission points were controlled according to the provisions in §§63.484, 63.485, 63.486, 63.493, and 63.501.

* * * * *

(4) A hazard or risk equivalency demonstration shall:

* * * *

(i) Determine whether the continuous front-end process vent is Group 1 or Group 2 according to the procedures specified in §63.115 and as required by §63.485;

(ii) Conduct initial performance tests to determine percent reduction as specified in §63.116 and as required by §63.485; and

(iii) Monitor the operating parameters, keep records, and submit reports as specified in §§63.114, 63.117(a), and 63.118(a) and (f), as required, for the specific control device as required by §63.485.

* * * *

(2) * * *

(ii) * * *

(i) Determine the flow rate, organic HAP concentration, and TRE index...
value according to the procedures specified in § 63.115; and
(ii) Monitor the operating parameters, keep records, and submit reports according to the procedures specified in §§ 63.114, 63.117(a), and 63.118(b) and (f), as required, for the specific recovery device, and as required by § 63.485.

(3) * * *
   (i) Perform the monitoring or inspection procedures according to the procedures specified in § 63.120, and as required by § 63.484;
   (ii) Perform the reporting and recordkeeping procedures according to the procedures specified in §§ 63.122 and 63.123, and as required by § 63.484; and
   (iii) For closed vent systems with control devices, conduct an initial design evaluation and submit an operating plan according to the procedures specified in § 63.120(d) and (b), and as required by § 63.484.
(4) * * *
   (i) If a control or recovery device is used to reduce back-end process operation emissions, the owner or operator of the affected source shall comply with §§ 63.496, 63.497, 63.498(d), and the applicable provisions of 63.499, and shall implement the provisions of these sections.
(5) * * *
   (i) For wastewater treatment processes, conduct tests according to the procedures specified in § 63.138(i) and (j), and as required by § 63.501;
   (ii) Conduct inspections and monitoring according to the procedures specified in § 63.143, and as required by § 63.501;
   (iii) Implement a recordkeeping program according to the procedures specified in § 63.147, and as required by § 63.501; and
   (iv) Implement a reporting program according to the procedures specified in § 63.146, and as required by § 63.501.

Subpart JJJ—National Emission Standards for Hazardous Air Pollutant Emissions: Group IV Polymers and Resins
15. Amend § 63.1311 by revising paragraphs (d)(1)(ii), (d)(1)(iii), and (d)(4), and adding paragraph (d)(1)(iv), to read as follows:
§ 63.1311 Compliance schedule and relationship to existing applicable rules.
   (d) * * *
      (1) A barrier fluid system will be installed;
      (i) A new barrier fluid will be utilized which requires changes to the existing barrier fluid system; or
      (ii) The compressor will be modified to permit connecting the compressor to a fuel gas system or a closed vent system or modified so that emissions from the compressor can be routed to a process.
   (4) Compliance with the compressor provisions of § 63.164 shall occur not later than September 12, 1999 for any compressor meeting one or more of the criteria in paragraphs (d)(4)(i) through (d)(4)(iii) of this section.
      (1) * * *
      (i) Compliance cannot be achieved without replacing the compressor;
      (ii) Compliance cannot be achieved without recasting the distance piece; or
      (iii) Design modifications are required to connect to a closed-vent or recovery system.
   (16) When a combustion device is used to comply with the 20 parts per million by volume outlet concentration standard specified in § 63.113(a)(2), the correction to 3 percent oxygen is only required when supplemental combustion air is used to combust the emissions, for the purposes of this subpart. In addition, the correction to 3 percent oxygen specified in § 63.116(c)(3) and (c)(3)(ii) is only required when supplemental combustion air is used to combust the emissions, for the purposes of this subpart. Finally, when a combustion device is used to comply with the 20 parts per million by volume outlet concentration standard specified in § 63.113(a)(2), an owner or operator shall record and report the outlet concentration required in § 63.117(a)(4)(ii) and (a)(4)(iv) corrected to 3 percent oxygen when supplemental combustion air is used to combust the emissions, for the purposes of this subpart. When supplemental combustion air is not used to combust...
the emissions, an owner or operator may record and report the outlet concentration required in § 63.117(a)(4)(ii) and (a)(4)(iv) on an uncorrected basis or corrected to 3 percent oxygen, for the purposes of this subpart.

(e) Owners or operators of affected sources producing ASA/AMSAN shall reduce organic HAP emissions from each continuous process vent, each batch process vent, and each aggregate batch vent stream by 98 weight-percent and shall comply with either paragraph (e)(1), (e)(2), or (e)(3), as appropriate. Where batch process vents or aggregate batch vent streams are combined with continuous process vents, the provisions of paragraph (a)(13) of this section shall apply for the purposes of this paragraph (e).

(1) For each continuous process vent, comply with paragraph (a) of this section as specified in paragraphs (e)(1)(i) through (e)(1)(ii) of this section.

(i) For purpose of this section, each continuous process vent shall be considered to be a Group 1 continuous process vent and the owner or operator of that continuous process vent shall comply with the requirements for a Group 1 continuous process vent.

(ii) For purposes of this section, the group determination procedure required by § 63.115 shall not apply.

(2) For each batch process vent, comply with §§ 63.1321 through 63.1327 as specified in paragraphs (e)(2)(i) through (e)(2)(ii) of this section.

(i) For purpose of this section, each batch process vent shall be considered to be a Group 1 batch process vent and the owner or operator of that batch process vent shall comply with the requirements for a Group 1 batch process vent contained in §§ 63.1321 through 63.1327, except that each batch process vent shall be controlled to reduce organic HAP emissions by 98 weight-percent.

(ii) For purposes of this section, the group determination procedure required by § 63.1323 shall not apply.

(3) For each aggregate batch vent stream, comply with §§ 63.1321 through 63.1327 as specified in paragraphs (e)(3)(i) through (e)(3)(ii) of this section.

(i) For purpose of this section, each aggregate batch vent stream shall be considered to be a Group 1 aggregate batch vent stream and the owner or operator of that aggregate batch vent stream shall comply with the requirements for a Group 1 aggregate batch vent stream contained in §§ 63.1321 through 63.1327, except that each aggregate batch vent stream shall be controlled to reduce organic HAP emissions by 98 weight-percent.

(ii) For purposes of this section, the group determination procedure required by § 63.1323 shall not apply.

19. Amend § 63.1316 by revising the section title, paragraphs (b)(1)(i), (b)(1)(ii), (b)(2)(i), and (b)(2)(ii); and adding paragraphs (b)(1)(v) and (b)(2)(v), to read as follows:

§ 63.1316 PET and polystyrene affected sources—emissions control provisions.

(b) * * * * * *(1) * * * * * * *

(i) The owner or operator of an existing affected source with organic HAP emissions greater than 0.12 kg organic HAP per Mg of product from continuous process vents in the collection of material recovery sections (i.e., methanol recovery) within the affected source shall comply with either paragraph (b)(1)(i)(A), (b)(1)(i)(B), or (b)(1)(i)(C) of this section. Emissions from continuous process vents in the collection of material recovery sections within the affected source shall be determined by the procedures specified in § 63.1318(b).

(A) Organic HAP emissions from all continuous process vents in each individual material recovery section shall, as a whole, be no greater than 0.018 kg organic HAP per Mg of product from the associated TPPU(s); or alternatively, organic HAP emissions from all continuous process vents in the collection of material recovery sections within the affected source shall, as a whole, be no greater than 0.018 kg organic HAP per Mg product from all associated TPPU(s);

(B) As specified in § 63.1318(d), the owner or operator shall maintain the daily average outlet gas stream temperature from each final condenser in a material recovery section at a temperature of +3°C (+37°F) or less (i.e., cold); or

(C) Comply with paragraph (b)(1)(v) of this section.

(ii) Limit organic HAP emissions from continuous process vents in the collection of polymerization reaction sections within the affected source by complying with either paragraph (b)(2)(i)(A) or (b)(2)(i)(B) of this section.

(A) Organic HAP emissions from all continuous process vents in each individual polymerization reaction section within the affected source (including emissions from any equipment used to further recover ethylene glycol, but excluding emissions from process contact cooling towers) shall, as a whole, be no greater than 0.02 kg organic HAP per Mg of product from the associated TPPU(s); or alternatively, organic HAP emissions from all continuous process vents in the collection of polymerization reaction sections within the affected source shall, as a whole, be no greater than 0.02 kg organic HAP per Mg product from all associated TPPU(s);

(B) Comply with paragraph (b)(1)(v) of this section.

(v) Comply with one of the following:

(A) Reduce the emissions in a combustion device to achieve 98 weight percent reduction or to achieve a concentration of 20 parts per million by volume (ppmv) on a dry basis, whichever is less stringent. If an owner or operator elects to comply with the 20 ppbv standard, the concentration shall include a correction to 3 percent oxygen only when supplemental combustion air is used to combust the emissions;

(B) Combust the emissions in a boiler or process heater with a design heat input capacity of 150 million Btu/hr or greater by introducing the emissions into the flame zone of the boiler or process heater; or

(C) Combust the emissions in a flare that complies with the requirements of § 63.1333(e).

(2) * * *

(i) Limit organic HAP emissions from continuous process vents in the collection of raw material preparation sections within the affected source by complying with either paragraph (b)(2)(i)(A) or (b)(2)(i)(B) of this section.

(A) Organic HAP emissions from all continuous process vents associated with the esterification vessels in each individual raw materials preparation section shall, as a whole, be no greater than 0.04 kg organic HAP per Mg of product from the associated TPPU(s); or alternatively,organic HAP emissions from all continuous process vents associated with the esterification vessels in the collection of raw material preparation sections within the affected source shall, as a whole, be no greater than 0.04 kg organic HAP per Mg product from all associated TPPU(s);

(B) As specified in § 63.1318(d), the owner or operator shall maintain the daily average outlet gas stream temperature from each final condenser in a material recovery section at a temperature of +3°C (+37°F) or less (i.e., cold); or

(C) Comply with paragraph (b)(1)(v) of this section.

(ii) Limit organic HAP emissions from continuous process vents in the collection of polymerization reaction sections within the affected source by complying with either paragraph (b)(2)(i)(A) or (b)(2)(i)(B) of this section.

(A) Organic HAP emissions from all continuous process vents in each individual polymerization reaction section within the affected source (including emissions from any equipment used to further recover ethylene glycol, but excluding emissions from process contact cooling towers) shall, as a whole, be no greater than 0.02 kg organic HAP per Mg of product from the associated TPPU(s); or alternatively, organic HAP emissions from all continuous process vents in the collection of polymerization reaction sections within the affected source shall, as a whole, be no greater than 0.02 kg organic HAP per Mg product from all associated TPPU(s);

(B) Comply with paragraph (b)(1)(v) of this section.

(ii) Limit organic HAP emissions from continuous process vents in the collection of raw material preparation sections within the affected source by complying with either paragraph (b)(2)(i)(A) or (b)(2)(i)(B) of this section.

(A) Organic HAP emissions from all continuous process vents associated with the esterification vessels in each individual raw materials preparation section shall, as a whole, be no greater than 0.04 kg organic HAP per Mg of product from the associated TPPU(s); or alternatively,organic HAP emissions from all continuous process vents associated with the esterification vessels in the collection of raw material preparation sections within the affected source shall, as a whole, be no greater than 0.04 kg organic HAP per Mg product from all associated TPPU(s);

(B) As specified in § 63.1318(d), the owner or operator shall maintain the daily average outlet gas stream temperature from each final condenser in a material recovery section at a temperature of +3°C (+37°F) or less (i.e., cold); or

(C) Comply with paragraph (b)(1)(v) of this section.

(ii) Limit organic HAP emissions from continuous process vents in the collection of polymerization reaction sections within the affected source by complying with either paragraph (b)(2)(i)(A) or (b)(2)(i)(B) of this section.

(A) Organic HAP emissions from all continuous process vents associated with the esterification vessels in each individual raw materials preparation section shall, as a whole, be no greater than 0.04 kg organic HAP per Mg of product from the associated TPPU(s); or alternatively,organic HAP emissions from all continuous process vents associated with the esterification vessels in the collection of raw material preparation sections within the affected source shall, as a whole, be no greater than 0.04 kg organic HAP per Mg product from all associated TPPU(s);

(B) As specified in § 63.1318(d), the owner or operator shall maintain the daily average outlet gas stream temperature from each final condenser in a material recovery section at a temperature of +3°C (+37°F) or less (i.e., cold); or

(C) Comply with paragraph (b)(1)(v) of this section.

(ii) Limit organic HAP emissions from continuous process vents in the collection of raw material preparation sections within the affected source by complying with either paragraph (b)(2)(i)(A) or (b)(2)(i)(B) of this section.
collection of polymerization reaction sections within the affected source by complying with either paragraph (b)(2)(ii)(A) or (b)(2)(ii)(B) of this section.

(A) Organic HAP emissions from all continuous process vents in each individual polymerization reaction section (including emissions from any equipment used to further recover ethylene glycol, but excluding emissions from process contact cooling towers) shall, as a whole, be no greater than 0.02 kg organic HAP per Mg of product from the associated TPPU(s); or alternatively, organic HAP emissions from all continuous process vents in the collection of polymerization reaction sections within the affected source shall, as a whole, be no greater than 0.02 kg organic HAP per Mg of product from all associated TPPU(s); or

(B) Comply with paragraph (b)(2)(v) of this section.

(v) Comply with one of the following:

(A) Reduce the emissions in a combustion device to achieve 98 weight percent reduction or to achieve a concentration of 20 parts per million by volume (ppmv) on a dry basis, whichever is less stringent. If an owner or operator elects to comply with the 20 ppmv standard, the concentration shall include a correction to 3 percent oxygen if supplemental combustion air is used to combust the emissions;

(B) Combust the emissions in a boiler or process heater with a design heat input capacity of 150 million Btu/hr or greater by introducing the emissions into the flame zone of the boiler or process heater; or

(C) Combust the emissions in a flare that complies with the requirements of § 63.1333(e).

20. Amend § 63.1321 by adding paragraph (d), to read as follows:

§ 63.1321 Batch process vents provisions.

(d) Owners and operators of affected sources producing ASA/AMSAN shall comply with the provisions of § 63.1315(e).

21. Amend § 63.1322 by revising paragraph (b)(2), to read as follows:

§ 63.1322 Batch process vents—reference control technology.

(b) * * * * *

(2) For each aggregate batch vent stream, reduce organic HAP emissions by 90 weight percent or to a concentration of 20 parts per million by volume, whichever is less stringent, on a continuous basis using a control device. For purposes of complying with the 20 parts per million by volume outlet concentration standard, the output concentration shall be calculated on a dry basis. When a combustion device is used for purposes of complying with the 20 parts per million by volume outlet concentration standard, the concentration shall be corrected to 3 percent oxygen if supplemental combustion air is used to combust the emissions. If supplemental combustion air is not used, a correction to 3 percent oxygen is not required.

22. Amend § 63.1323 by revising paragraph (a)(2), to read as follows:

§ 63.1323 Batch process vents—methods and procedures for group determination.

(a) * * * * *

(2) The annual uncontrolled organic HAP or TOC emissions and annual average batch vent flow rate shall be determined at the exit from the batch unit operation. For the purposes of these determinations, the primary condenser operating as a reflux condenser on a reactor or distillation column, the primary condenser recovering monomer, reaction products, by-products, or solvent from a stripper operated in batch mode, and the primary condenser recovering monomer, reaction products, by-products, or solvent from a distillation operation operated in batch mode shall be considered part of the batch unit operation. All other devices that recover or oxidize organic HAP or TOC vapors shall be considered control devices as defined in § 63.1312.

23. Amend § 63.1325 by revising paragraph (e) introductory text and adding paragraph (e)(3), to read as follows:

§ 63.1325 Batch process vents—performance test methods and procedures to determine compliance.

(e) * * * * *

(3) When a combustion device is used to comply with the 20 parts per million by volume outlet concentration standard specified in § 63.1322(b)(2), the correction to 3 percent oxygen specified in the performance testing procedures of § 63.116(c)(3) and § 63.116(c)(3)(ii) is only required when supplemental combustion air is used to combust the emissions, for the purposes of this subpart.

24. Amend § 63.1326 by revising paragraph (b)(4) introductory text and adding paragraph (b)(5), to read as follows:

§ 63.1326 Batch process vents—recordkeeping provisions.

(b) * * * *

(4) The following information when using a control device to meet the percent reduction requirement specified in § 63.1322(a)(2), (a)(3), (b)(2), or (b)(3):

(5) When complying with the 20 parts per million by volume outlet concentration standard specified in § 63.1322(b)(2), records of the outlet concentration of organic HAP or TOC on a dry basis. If supplemental combustion air is used to combust the emissions, the outlet concentration shall be corrected to 3 percent oxygen. If supplemental combustion air is not used, a correction to 3 percent oxygen is not required.

25. Amend § 63.1330 by adding and reserving paragraph (c), and paragraphs (d) and (e), to read as follows:

§ 63.1330 Wastewater provisions.

(c) [Reserved]

(d) The provisions of paragraph (b) of this section do not apply to each affected source producing ASA/AMSAN.

(e) The provisions of paragraphs (a), (b), and (c) of this section do not apply to each affected source producing polystyrene using either a continuous or batch process.

26. Amend § 63.1332 by revising paragraphs (a)(2), (a)(3) introductory text, (c) introductory text, (c)(3), (d)(5), (e)(3)(ii), (e)(5), (g)(1), (g)(2)(ii)(A), (g)(7)(ii)(A), (h)(1) introductory text, (h)(6)(ii) introductory text, (h)(7)(ii) introductory text (the equation remains unchanged), (i)(1) introductory text, (i)(1)(i)(iii), (i)(2), (i)(3), (i)(5) introductory text, (j)(5)(i), (j)(2)(ii) introductory text, (j)(2)(ii)(B), (j)(2)(iv), (j)(2)(v), (k) introductory text, (k)(4) introductory text, and (l) introductory text, to read as follows:

§ 63.1332 Emissions averaging provisions.

(a) * * * *

(2) Compliance with the provisions of this section may be based on either organic HAP or TOC.
(3) For the purposes of these provisions, whenever Method 18, 40 CFR part 60, appendix A, is specified within the paragraphs of this section or is specified by reference to provisions outside this section, Method 18 or Method 25A, 40 CFR part 60, appendix A, may be used. The use of Method 25A, 40 CFR part 60, appendix A, shall conform with the requirements in paragraphs (a)(3)(i) and (a)(3)(ii) of this section.

(c) Paragraphs (c)(1) through (c)(5) of this section describe the emission points that may be used to generate emissions averaging credits if control was applied after November 15, 1990, and if sufficient information is available to determine the appropriate value of credits for the emission point. Paragraph (c)(6) of this section discusses the use of pollution prevention in generating emissions averaging credits.

(3) Storage vessels, continuous process vents subject to § 63.1315, and process wastewater streams that are determined to be Group 1 emission points and that are controlled by a technology that the Administrator or permitting authority agrees has a higher nominal efficiency than the reference control technology. Information on the nominal efficiencies for such technologies will be submitted and approved as provided in paragraph (i) of this section.

(d) * * *

(5) Emission points controlled to comply with a State or Federal rule other than this subpart cannot be used to generate credits, unless the level of control has been increased after November 15, 1990, to a level above what is required by the other State or Federal rule. Only the control above what is required by the other State or Federal rule will be credited. However, if an emission point has been used to generate emissions averaging credit in an approved emissions average, and the emission point is subsequently made subject to a State or Federal rule other than this subpart, the emission point may continue to generate emissions averaging credit for the purpose of complying with the previously approved emissions average.

(e) * * *

(ii) The initial demonstration in the Emissions Averaging Plan or operating permit application that credit-generating emission points will be capable of generating sufficient credits to offset the debits from the debit-generating emission points shall be made under representative operating conditions. After the compliance date, actual operating data will be used for all debit and credit calculations.

(4) * * *

(5) Record and report quarterly and annual credits and debits in the Periodic Reports as specified in § 63.1335(e)(6). Every fourth Periodic Report shall include a certification of compliance with the emissions averaging provisions as required by § 63.1335(e)(6)(x)(C)(2).

(g) * * *

(1) Source-wide debits shall be calculated using Equation 28 of this subpart. Debits and all terms of Equation 28 of this subpart are in units of megagrams per month:

\[
\text{Debits} = \sum_{i=1}^{n} [ECPV_{\text{ACTUAL}} - (0.02) ECPV_{\text{STD}}] + \sum_{j=1}^{m} [ECPVS_{\text{ACTUAL}} - ECPVS_{\text{STD}}] + \sum_{i=1}^{n} (ES_{\text{ACTUAL}} - b) ES_{\text{in}} + \sum_{i=1}^{n} (EWW_{\text{ACTUAL}} - EWW_{ic}) + \sum_{i=1}^{n} [EBPV_{\text{ACTUAL}} - (0.10) EBPV_{\text{in}}] + \sum_{i=1}^{n} [EABV_{\text{ACTUAL}} - (0.10) EABV_{\text{in}}]
\]  

[Eq. 28]

Where:

- \( ECPV_{\text{ACTUAL}} \) = Emissions from each Group 1 continuous process vent \( i \) subject to § 63.1315 that is uncontrolled or is controlled to a level less stringent than the applicable reference control technology. \( ECPV_{\text{ACTUAL}} \) is calculated according to paragraph (g)(2) of this section.
- \( ECPVS_{\text{ACTUAL}} \) = Emissions from each Group 1 continuous process vent \( i \) subject to § 63.1315 if the applicable reference control technology had been applied to the uncontrolled emissions. \( ECPVS_{\text{ACTUAL}} \) is calculated according to paragraph (g)(2) of this section.
- \( ECPV_{\text{STD}} \) = Emissions from Group 1 continuous process vents subject to § 63.1316(b)(1)(i), (b)(1)(ii), (b)(2)(i), (b)(2)(ii), or (c)(1) located in the collection of process sections \( j \) within the affected source that are uncontrolled or controlled to a level less stringent than the applicable standard. \( ECPV_{\text{STD}} \) is calculated according to paragraph (g)(3) of this section.
- \( ES_{\text{ACTUAL}} \) = Emissions from each Group 1 storage vent \( i \) if the applicable reference control technology or standard had been applied to the uncontrolled emissions. \( ES_{\text{ACTUAL}} \) is calculated according to paragraph (g)(3) of this section.
- \( ES_{\text{STD}} \) = Emissions from each Group 1 storage vent \( i \) if the applicable reference control technology or standard had been applied to the uncontrolled emissions. \( ES_{\text{STD}} \) is calculated according to paragraph (g)(3) of this section.
- \( EWW_{\text{ACTUAL}} \) = Emissions from each Group 1 wastewater stream \( i \) that is uncontrolled or is controlled to a level less stringent than the applicable reference control technology. \( EWW_{\text{ACTUAL}} \) is calculated according to paragraph (g)(3) of this section.
- \( EWW_{\text{STD}} \) = Emissions from each Group 1 wastewater stream \( i \) that is uncontrolled or is controlled to a level less stringent than the applicable standard. \( EWW_{\text{STD}} \) is calculated according to paragraph (g)(3) of this section.
- \( EBPV_{\text{ACTUAL}} \) = Emissions from each Group 1 batch process vent \( i \) that is uncontrolled or is controlled to a level less stringent than the applicable reference control technology. \( EBPV_{\text{ACTUAL}} \) is calculated according to paragraph (g)(5) of this section.
- \( EBPV_{\text{STD}} \) = Emissions from each Group 1 batch process vent \( i \) if the applicable standard had been applied to the uncontrolled emissions. \( EBPV_{\text{STD}} \) is calculated according to paragraph (g)(5) of this section.
- \( EABV_{\text{ACTUAL}} \) = Emissions from each Group 1 aggregate batch vent stream \( i \) that is uncontrolled or is controlled to a level less stringent than the applicable reference control technology. \( EABV_{\text{ACTUAL}} \) is calculated according to paragraph (g)(7) of this section.
Credits = \( \sum_{i=1}^{n} \left( (0.02) \text{ECPV}_{1i} - \text{ECPV}_{1\text{ACTUAL}} \right) + \sum_{j=1}^{m} \left( \text{ECPVS}_{1j\text{STD}} - \text{ECPVS}_{1\text{ACTUAL}} \right) \)
+ \( \sum_{i=1}^{n} \left( \text{ECPV}_{2i\text{BASE}} - \text{ECPV}_{2\text{ACTUAL}} \right) + \sum_{j=1}^{m} \left( \text{ECPVS}_{2j\text{BASE}} - \text{ECPVS}_{2\text{ACTUAL}} \right) \)
+ \( \sum_{i=1}^{n} \left( \text{EWW}_{1i\text{STD}} - \text{EWW}_{1\text{ACTUAL}} \right) + \sum_{j=1}^{m} \left( \text{EWW}_{2j\text{BASE}} - \text{EWW}_{2\text{ACTUAL}} \right) \)
+ \( \sum_{i=1}^{n} \left( (0.10) \text{EBPV}_{1i} - \text{EBPV}_{1\text{ACTUAL}} \right) + \sum_{i=1}^{n} \left( (0.10) \text{EABV}_{1i} - \text{EABV}_{1\text{ACTUAL}} \right) \)
+ \( \sum_{i=1}^{n} \left( \text{EBPV}_{2i\text{BASE}} - \text{EBPV}_{2\text{ACTUAL}} \right) + \sum_{j=1}^{m} \left( \text{EABV}_{2j\text{BASE}} - \text{EABV}_{2\text{ACTUAL}} \right) \)  

[Eq. 35]

Where:

\( D \) = Discount factor = 0.9 for all credit generating emission points except those controlled by a pollution prevention measure; discount factor = 1.0 for each credit generating emission point controlled by a pollution prevention measure (i.e., no discount provided).

\( \text{ECPV}_{1\text{ACTUAL}} \) = Emissions for each Group 1 continuous process vent subject to § 63.1315 that is controlled to a level more stringent than the available technology. \( \text{ECPV}_{1\text{ACTUAL}} \) is calculated according to paragraph (h)(2) of this section.

\( \text{ECPV}_{1\text{STD}} \) = Emissions from Group 1 continuous process vents subject to § 63.1315 if the applicable reference technology had been applied to the uncontrolled emissions. \( \text{ECPV}_{1\text{STD}} \) is calculated according to paragraph (h)(3) of this section.

\( \text{ECPVS}_{1\text{STD}} \) = Emissions from Group 1 continuous process vents subject to § 63.1316(b)(1)(i), (b)(1)(ii), (b)(2)(i), (b)(2)(ii), or (c)(1) located in the collection of process sections \( j \) within the affected source if the applicable standard had been applied to the uncontrolled emissions. \( \text{ECPVS}_{1\text{STD}} \) is calculated according to paragraph (h)(3) of this section.

\( \text{ECPVS}_{1\text{ACTUAL}} \) = Emissions from Group 1 continuous process vents subject to § 63.1316(b)(1)(i), (b)(1)(ii), (b)(2)(i), (b)(2)(ii), or (c)(1) located in the collection of process sections \( j \) within the affected source if the applicable standard had been applied to the uncontrolled emissions. \( \text{ECPVS}_{1\text{ACTUAL}} \) is calculated according to paragraph (g)(7)(ii)(B) of this section.

\( \text{ES}_{1\text{STD}} \) = Emissions from each Group 1 storage vessel that are controlled to a level more stringent than the applicable standard. \( \text{ES}_{1\text{STD}} \) is calculated according to paragraph (h)(3) of this section.

\( \text{ES}_{1\text{ACTUAL}} \) = Emissions from each Group 1 storage vessel that are controlled to a level more stringent than the applicable reference control technology or standard. \( \text{ES}_{1\text{ACTUAL}} \) is calculated according to paragraph (h)(4) of this section.

\( \text{EBPV}_{1i} \) = Emissions from Group 1 wastewater stream \( i \) that is controlled during a performance test conducted under representative operating conditions. The values of \( Q \) and \( C \) shall be established in the Notification of Compliance Status and shall be updated as provided in paragraph (g)(2)(ii)(B) of this section.

\( \text{EBPV}_{1\text{ACTUAL}} \) = Emissions from each Group 1 wastewater stream \( i \) that is controlled during a performance test conducted under representative operating conditions. The values of \( Q \) and \( C \) shall be established in the Notification of Compliance Status and shall be updated as provided in paragraph (g)(2)(ii)(B) of this section.

\( \text{EBPV}_{2i\text{BASE}} \) = Emissions from Group 2 wastewater stream \( i \) that is controlled to a level more stringent than the applicable source if the applicable reference control technology or standard had been applied to the uncontrolled emissions. \( \text{EBPV}_{2i\text{BASE}} \) is calculated according to paragraph (h)(2) of this section.

\( \text{EBPV}_{2\text{ACTUAL}} \) = Emissions from each Group 2 wastewater stream \( i \) that is controlled to a level more stringent than the applicable reference control technology or standard. \( \text{EBPV}_{2\text{ACTUAL}} \) is calculated according to paragraph (h)(3) of this section.

\( \text{EABV}_{1i} \) = Emissions from each Group 1 wastewater stream \( i \) that is controlled during a performance test conducted under representative operating conditions. The values of \( Q \) and \( C \) shall be established in the Notification of Compliance Status and shall be updated as provided in paragraph (g)(2)(ii)(B) of this section.

\( \text{EABV}_{1\text{ACTUAL}} \) = Emissions from each Group 1 wastewater stream \( i \) that is controlled during a performance test conducted under representative operating conditions. The values of \( Q \) and \( C \) shall be established in the Notification of Compliance Status and shall be updated as provided in paragraph (g)(2)(ii)(B) of this section.

\( \text{EABV}_{2i\text{BASE}} \) = Emissions from Group 2 wastewater stream \( i \) that is controlled to a level more stringent than the applicable source if the applicable reference control technology or standard had been applied to the uncontrolled emissions. \( \text{EABV}_{2i\text{BASE}} \) is calculated according to paragraph (h)(2) of this section.
EBPV1\textsubscript{ACTUAL} = \text{Emissions from each Group 1 batch process vent i that is controlled to a level more stringent than the applicable standard.} \text{EBPV1}\textsubscript{in} \left(1 - \frac{\text{Percent reduction}}{100}\right)

\text{(7) Actual emissions from Group 1 aggregate batch vent streams controlled to a level more stringent than the standard (EBPV1}\textsubscript{ACTUAL}) \text{shall be calculated using Equation 43 of this subpart:}

\text{[Equation 43 is unchanged.]}* * *

\text{(i) In those cases where the owner or operator is seeking permission to take credit for use of a control technology that is different in use or design from the reference control technology, and the different control technology will be used in more than three applications at a single plant site, the owner or operator shall submit the information specified in paragraphs (i)(1)(i) through (i)(1)(iv) of this section, as specified in § 63.1335(e)(7)(iii), to the Director of the EPA Office of Air Quality Planning and Standards in writing:}

\text{[Equation 43 is unchanged.]}* * *

\text{(ii) Documentation demonstrating to the Administrator’s satisfaction the control efficiency of the control technology. This may include performance test data collected using an appropriate EPA Method or any other method validated according to Method 301, 40 CFR Part 63, appendix A, of this part. If it is infeasible to obtain test data, documentation may include a design engineering basis of the calculation and calculations. The engineering basis of the calculation procedures and all inputs and assumptions made in the calculations shall be documented.}

\text{[Equation 43 is unchanged.]}* * *

\text{(2) The Administrator shall determine within 120 days whether an application presents sufficient information to determine nominal efficiency. The Administrator reserves the right to request specific data in addition to the items listed in paragraph (i)(1) of this section.}

\text{(3) The Administrator shall determine within 120 days of the submittal of sufficient data whether a control technology shall have a nominal efficiency and the level of that nominal efficiency. If, in the Administrator’s judgment, the control technology achieves a level of emission reduction greater than the reference control technology for a particular kind of emission point, the Administrator will publish a Federal Register notice establishing a nominal efficiency for the control technology.}

\text{[Equation 43 is unchanged.]}* * *

\text{(5) In those cases where the owner or operator is seeking permission to take credit for use of a control technology that is different in use or design from the reference control technology and the different control technology will be used in more than three applications at a single plant site, the owner or operator shall submit the information specified in paragraphs (i)(1)(i) through (i)(1)(iv) of this section, as specified in § 63.1335(e)(7)(iii), to the Administrator.}

\text{(i) In these instances, use and conditions for use of the control technology may be approved by the permitting authority as part of an operating permit application or modification. The permitting authority shall follow the procedures specified in paragraphs (i)(2) through (i)(4) of this section except that, in these instances, a Federal Register notice is not required to establish the nominal efficiency for the different technology.}

\text{[Equation 43 is unchanged.]}* * *

\text{(j) For wastewater, } E_t \text{ shall be calculated using Equation 47 of this subpart:}
\[ E_B = \sum_{i=1}^{n} \left( 6.0 \times 10^{-8} \right) Q_{Bi} H_{Bi} \sum_{m=1}^{5} F_{em} HAP_{Bim} \]  

([Eq. 47])

Where:

- \( n \) = Number of wastewater streams.
- \( Q_{Bi} \) = Annual average flow rate for wastewater stream \( i \) before the pollution prevention measure, defined and determined according to § 63.144(c)(3), liters per minute, before implementation of the pollution prevention measure.
- \( H_{Bi} \) = Number of hours per month that wastewater stream \( i \) was discharged before the pollution prevention measure, hours per month.
- \( s \) = Total number of organic HAP in wastewater stream \( i \).
- \( F_{em} \) = Fraction emitted of organic HAP \( m \) in wastewater from Table 34 of subpart G of this part, dimensionless.
- \( HAP_{Bim} \) = Annual average concentration of organic HAP \( m \) in wastewater stream \( i \), defined and determined according to paragraph § 63.150(g)(5) of this section, before the pollution prevention measure, parts per million by weight, as measured before the implementation of the pollution measure.

(iv) The same pollution prevention measure may reduce emissions from multiple emission points. In such cases, the percent reduction in emissions for each emission point shall be calculated.

(v) For the purposes of the equations in paragraphs (h)(2) through (h)(7) of this section used to calculate credits for emission points controlled more stringent than the reference control technology or standard, the nominal efficiency of a pollution prevention measure is equivalent to the percent reduction of the pollution prevention measure. When a pollution prevention measure is used, the owner or operator of an affected source is not required to apply to the Administrator for a nominal efficiency and is not subject to paragraph (i) of this section.

(k) The owner or operator shall demonstrate that the emissions from the emission points proposed to be included in the emissions average will not result in greater hazard or, at the option of the Administrator, greater risk to human health or the environment than if the emission points were controlled according to the provisions in §§ 63.1314, 63.1315, 63.1316 through 63.1320, 63.1321, and 63.1330.

(4) A hazard or risk equivalency demonstration shall:

(i) For periods of parameter monitoring excursions, an owner or operator may request that the provisions of paragraphs (l)(1) through (l)(4) of this section be followed instead of the procedures in paragraphs (f)(2)(i) and (f)(2)(ii) of this section.

27. Amend § 63.1335 by revising paragraph (e)(4)(ii)(L)(1), to read as follows:

§ 63.1335 General recordkeeping and reporting provisions.

* * * * *

28. Revise Tables 3 and 5 to subpart JJJ of Part 63, to read as follows:

TABLE 3 OF SUBPART JJJ.—GROUP 1 STORAGE VESSELS AT EXISTING AFFECTED SOURCES PRODUCING THE LISTED THERMOPLASTICS

<table>
<thead>
<tr>
<th>Thermoplastic</th>
<th>Chemical a</th>
<th>Vessel capacity (cubic meters)</th>
<th>Vapor pressure b (kilopascals)</th>
</tr>
</thead>
<tbody>
<tr>
<td>ASA/AMSANac</td>
<td>styrene/acrylonitrile mixture</td>
<td>≥ 3.78</td>
<td>≥ 0.47</td>
</tr>
<tr>
<td>Polystyrene, continuous processes</td>
<td>acrylonitrile</td>
<td>≥ 75.7</td>
<td>≥ 1.62</td>
</tr>
<tr>
<td></td>
<td>all chemicals</td>
<td>&lt;75.7</td>
<td>14.2</td>
</tr>
<tr>
<td></td>
<td></td>
<td>≥ 75.7</td>
<td>19.6</td>
</tr>
<tr>
<td></td>
<td></td>
<td>≥ 75.7</td>
<td>7.48</td>
</tr>
<tr>
<td></td>
<td></td>
<td>≥ 1.8</td>
<td>1.8</td>
</tr>
<tr>
<td>Nitrilec</td>
<td>acrylonitrile</td>
<td>≥ 13.25</td>
<td>1.8</td>
</tr>
</tbody>
</table>

a Vessel capacity and vapor pressure criteria are specific to the listed chemical or to “all chemicals,” as indicated.

b Maximum true vapor pressure of total organic HAP at storage temperature.

c The applicability criteria in Table 2 of this subpart shall be used for chemicals not specifically listed in this table (i.e., Table 3).

TABLE 5 OF SUBPART JJJ.—GROUP 1 STORAGE VESSELS AT NEW AFFECTED SOURCES PRODUCING THE LISTED THERMOPLASTICS

<table>
<thead>
<tr>
<th>Thermoplastic</th>
<th>Chemical a</th>
<th>Vessel capacity (cubic meters)</th>
<th>Vapor pressure b (kilopascals)</th>
</tr>
</thead>
<tbody>
<tr>
<td>ASA/AMSANac</td>
<td>Styrene/ acrylonitrile mixture</td>
<td>≥ 3.78</td>
<td>0.47</td>
</tr>
<tr>
<td></td>
<td>Acrylonitrile</td>
<td>≥ 75.7</td>
<td>1.62</td>
</tr>
<tr>
<td>SAN, continuous</td>
<td>All chemicals</td>
<td>≥ 2.271</td>
<td>0.5 and &lt; 0.7</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&lt;151</td>
<td>10</td>
</tr>
<tr>
<td></td>
<td></td>
<td>≥ 151</td>
<td>7.48</td>
</tr>
<tr>
<td></td>
<td></td>
<td>≥ 109.8</td>
<td>0.53</td>
</tr>
<tr>
<td>Nitrilec</td>
<td>Acrylonitrile</td>
<td>≥ 13.25</td>
<td>1.8</td>
</tr>
<tr>
<td>Polystyrene, continuous processes</td>
<td>All chemicals</td>
<td>≥ 19.6 and &lt;45.4</td>
<td>7.48</td>
</tr>
<tr>
<td></td>
<td></td>
<td>≥ 45.4 and &lt;109.8</td>
<td>0.61</td>
</tr>
<tr>
<td></td>
<td></td>
<td>≥ 109.8</td>
<td>0.53</td>
</tr>
<tr>
<td>Thermoplastic</td>
<td>Chemical</td>
<td>Vessel capacity (cubic meters)</td>
<td>Vapor pressure (kilopascals)</td>
</tr>
<tr>
<td>-------------------------------------</td>
<td>-----------</td>
<td>-------------------------------</td>
<td>-------------------------------</td>
</tr>
<tr>
<td>ABS, continuous mass</td>
<td>Styrene</td>
<td>≥ 45.43</td>
<td>≥ 0.078</td>
</tr>
<tr>
<td></td>
<td>All other chemicals</td>
<td>≥ 38 and &lt; 45.43</td>
<td>≥ 13.1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>≥ 45.43</td>
<td>≥ 0.53</td>
</tr>
</tbody>
</table>

*Vessel capacity and vapor pressure criteria are specific to the listed chemical, to “all chemicals,” or to “all other chemicals,” as indicated.

bMaximum true vapor pressure of total organic HAP at storage temperature.

*The applicability criteria in Table 4 of this subpart shall be used for chemicals not specifically listed in this table (i.e., Table 5).