

US EPA ARCHIVE DOCUMENT

Office of Solid Waste (5305W)

**Hazardous Waste Combustion (HWC) National
Emission Standards for Hazardous Air Pollutants
(NESHAP) Fact Sheet:**



**CORRECTIONS AND AMENDMENTS TO THE
PHASE 1 HAZARDOUS WASTE COMBUSTION
NESHAP**

EPA promulgated Phase 1 of Maximum Achievable Control Technology (MACT) standards, also called the National Emission Standards for Hazardous Air Pollutants (NESHAP), for hazardous waste burning incinerators, cement kilns, and lightweight aggregate kilns on September 30, 1999 (64 FR 52828). These standards were promulgated under the joint authority of the Clean Air Act (CAA) and the Resource Conservation and Recovery Act (RCRA). Since 1999 we have issued several technical corrections and amendments to the Phase 1 NESHAP to improve its implementation. In addition, we have also revised specific sections in response to vacatur orders by the Court of Appeals for the District of Columbia Circuit. Most notably, we promulgated negotiated interim emission standards that temporarily replace the 1999-promulgated standards that were challenged, and we extended the compliance date by one year. For the convenience of all interested stakeholders, regulators, and industry, this fact sheet provides information on the corrections and amendments made to the September 30, 1999, Phase 1 HWC NESHAP (64 FR 52828).

Since the September 1999 promulgation of the Phase 1 HWC NESHAP, we have published: Technical Corrections and Interpretative Clarifications, Court Ordered Amendments, and Technical Amendments. The following sections discuss each of these final agency actions.

Technical Corrections and Interpretative Clarifications

We have published three Technical Corrections and Interpretative Clarifications to the September 30, 1999 Phase 1 HWC NESHAP to correct typographical errors and omissions and to clarify our intent regarding specific regulatory requirements. The Technical Corrections and Interpretative Clarifications were promulgated in the *Federal Register* on November 19, 1999 (64 FR 63209), July 10, 2000 (65 FR 42292), and November 9, 2000 (65 FR 67268).

On November 19, 1999, we clarified our intent with respect to the Notification of Intent to Comply and Progress Report requirements of the 1998 "Fast Track" final rule (63 FR 33782). Additionally, we corrected several typographical errors and omissions pertaining to the

comparable fuels specification table and the residue testing requirements provided in the 1999 Phase 1 final rule.

On July 10, 2000, we corrected additional typographical errors and clarified several issues to make the rule easier to understand and implement (65 FR 42292). For example, after publication of the Phase 1 HWC NESHAP, we received questions from stakeholders concerning the continuous monitoring requirements for hydrocarbons and carbon monoxide. Specifically, the stakeholders asked if continuous monitoring was required for both hydrocarbons and carbon monoxide. We clarified that, during normal operations, continuous monitoring is required for either carbon monoxide or hydrocarbons, not both. We also remedied one omission from the technical correction published on November 19, 1999, and made an additional correction to the related “Fast Track” rule.

Finally, on November 9, 2000, we clarified our intent with respect to the applicability of new source versus existing source standards for hazardous waste incinerators and clarified the term “reconstructed sources” (65 FR 67268). In addition, we made technical corrections related to the comprehensive performance test, continuous monitoring system evaluation test plan, and rolling average calculation procedures for continuous monitoring systems.

Court Ordered Amendments

We have promulgated several final rules implementing court decisions concerning the Phase 1 HWC NESHAP.

On May 14, 2001, we removed the “early cessation,” Notification of Intent to Comply (NIC), and Compliance Progress Report requirements from the federal regulations (66 FR 24270). We did this because on July 25, 2000, the Court of Appeals for the District of Columbia Circuit decided *Chemical Manufacturing Ass'n v. EPA*, 217 F.3d 861 (D.C. Cir. 2000) and vacated these requirements. The early cessation requirement, generally, required sources to choose whether to comply with Phase 1 HWC MACT standards within three years or cease burning hazardous waste within two years. The NIC requirements served to inform the regulatory agency of a source's intention to comply or cease burning. The NIC also provided other benefits separate from those associated with the early cessation requirement, such as greater public participation. The Compliance Progress Report served to help the regulatory agency determine if sources were making reasonable progress in their efforts to come into compliance. In its decision, the court held that EPA had the legal authority to impose an early cessation requirement. However, the court further held that we had not adequately explained our reasons for imposing this requirement. The vacatur of the early cessation, NIC and Compliance Progress Report requirements became effective on October 11, 2000.

In addition to removing the above requirements from the federal regulations on May 14, 2001, we also removed two compliance assurance monitoring requirements for baghouses and

electrostatic precipitators. We had filed an earlier motion, which was granted by the court on April 5, 2001, requesting the vacatur of two baghouse and electrostatic precipitator parameter limits: (1) minimum power (kVA) per field of an ESP; and (2) minimum and maximum pressure drop for each cell of the baghouse (CKRC v. EPA, no. 99-1457, EPA Motion of November 14, 2000).

On July 24, 2001, the Court of Appeals for the District of Columbia Circuit decided *Cement Kiln Recycling Coalition v. EPA*, 255 F.3d 855 (D.C. Cir. 2001) by vacating challenged portions of the 1999 Phase 1 HWC NESHAP. According to the court, the standards "fail to reflect the emissions achieved in practice by the best performing sources as required by the Clean Air Act." Because the decision left EPA without CAA standards regulating HWC emissions, the court invited EPA, or any of the parties that challenged the regulation, to file a motion to request that either the 1999 standards remain in place or that we be allowed time to develop interim standards until replacement standards could be issued that would comply with the court's opinion. On October 19, 2001, EPA, together with all the other parties, requested the court stay its vacatur order until February 14, 2002 to allow EPA time to develop and promulgate interim standards. The joint motion also detailed other actions we agreed to take, including: (1) promulgating, as quickly as possible, a final rule extending the Phase 1 HWC NESHAP compliance date by one year, (2) promulgating, by February 14, 2002, a final technical amendments rule, and (3) promulgating, by June 14, 2005, the Phase 1 HWC NESHAP replacement standards. The court granted this motion on November 1, 2001.

On December 6, 2001, we issued a final rule extending the Phase 1 HWC NESHAP compliance date by one year (66 FR 63313).

On February 13, 2002, we promulgated the negotiated Interim Standards final rule (See 67 FR 6792). This rule revised the following portions of the Phase 1 HWC NESHAP:

- (1) Specific emissions standards as follows: (a) the semi-volatile metals standard for new incinerators; (b) the semi-volatile metals standard for existing cement kilns; (c) the mercury standard for new cement kilns; (d) the dioxin standard for new and existing lightweight aggregate kilns; (e) the mercury standard for new and existing lightweight aggregate kilns; and (f) the hydrochloric acid/chlorine gas standard for new and existing lightweight aggregate kilns. In addition, we also included a provision that allows new and existing cement kilns and lightweight aggregate kilns to comply with a hazardous waste mercury feedrate limit in lieu of the mercury emission standard.
- (2) Startup, Shutdown, and Malfunction (SSM) provisions
- (3) Performance testing requirements
- (4) Ionizing wet scrubber minimum power requirements

(5) Carbon bed monitoring requirements

On February 14, 2002, we promulgated a final technical amendments rule containing several additional technical corrections and revisions to a number of Phase 1 HWC NESHAP compliance, testing, monitoring, and general implementation requirements (67 FR 6968). The revisions addressed the following:

- (1) Restrictions on the use of destruction and removal efficiency (DRE) data in lieu of performance testing
- (2) Alternative hydrocarbon monitoring location for short cement kilns burning hazardous waste at locations other than the “hot” end
- (3) Baghouse inspection requirements
- (4) Feedstream analysis requirements for organic hazardous air pollutants
- (5) Combustion system leaks provisions
- (6) Operator training and certification requirements
- (7) Time extensions for performance testing if the test plan has not been approved
- (8) Flexibility in operations during confirmatory performance testing for dioxins/furans
- (9) Waiving operating parameter limits during comprehensive performance testing and pretesting
- (10) Calibration requirements for temperature measurement devices
- (11) Operating requirements for activated carbon injection and carbon bed systems
- (12) How to comply temporarily with alternative otherwise applicable MACT standards
- (13) Bag leak detection system requirements

Other Technical Amendments

On July 3, 2001, we took direct final action on several amendments to the Phase 1 HWC NESHAP (66 FR 35087). The amendments became effective on October 16, 2001 and specifically addressed:

- (1) Hazardous waste residence time
- (2) The notification requirement for sources complying with alternative CAA standards
- (3) Time extensions for waiving particulate matter (PM) and opacity standards to correlate PM continuous emissions monitoring systems
- (4) The particulate matter emissions standard alternative for incinerators feeding low levels of metals
- (5) Metal feedrate extrapolation procedures
- (6) Feedrate limits for nondetectable constituents
- (7) Early compliance requirements
- (8) Accuracy requirements for weight measurement devices
- (9) Minimum pH parameter limit for wet scrubber mercury control

The July 3, 2001 direct final rule also included amendments to (1) eliminate certain data in lieu of performance testing restrictions for destruction and removal efficiency (DRE), (2) allow an alternative hydrocarbon monitoring location for short cement kilns burning hazardous waste at locations other than the “hot” end of the kiln, (3) delete the baghouse inspection requirement, and (4) allow waiver of the comprehensive analysis for organic compounds if a source documents that the principal organic hazardous pollutants (POHCs) used to demonstrate compliance with the DRE standard continue to be representative of the organic HAPs in hazardous waste feedstreams. These amendments, however, were withdrawn on October 15, 2001 (66 FR 52361) and later promulgated on February 14, 2002 (67 FR 6968). See the previous section of this fact sheet for information concerning the February 14, 2002 final rule.

For More Information

The *Federal Register* notices discussed in this fact sheet are available in electronic format on the Internet at our website—<http://www.epa.gov/epaoswer/hazwaste/combust/>.

For additional information or to order paper copies of the *Federal Register* notices, call the RCRA Hotline at 800 424-9346 (outside the Washington, D.C. area), or 703 412-9810 in the Washington, D.C. area or TDD 800 553-7672 (hearing impaired). For the most current version of the Phase 1 HWC NESHAP regulations, you may access the electronic Code of Federal Regulations on the Internet at <http://www.access.gpo.gov/ecfr/>

Several of the court-related documents discussed in this fact sheet may be accessed on the

Internet at our website <http://www.epa.gov/epaoswer/hazwaste/combust/preamble.htm>