Pollution Control Agency

Adopted Permanent Rules Relating to Air Quality

7002.0019 AIR QUALITY PERMIT APPLICATION FEES AND ADDITIONAL FEES.

[For text of subp 1, see M.R.]

Subp. 2. **Additional points.** The points assessed for activities designated in this subpart shall be multiplied by the dollar per point value as determined in part 7002.0018 to calculate the additional fee.

	Activity	Points
A.	Modeling review	15
	The points for modeling review shall not be assessed for screening modeling or CAPS modeling.	
B.	Best available control technology (BACT) review	15
	BACT points shall be applied for each prevention of significant deterioration (PSD) pollutant analyzed.	
C.	Lowest achievable emission rate (LAER) review	15
	LAER points shall be applied for each nonattainment new source review (NSR) pollutant analyzed.	
D.	Clean Air Act, section 110(a)(2)(D)(i)(I) review	10
	Points shall be applied for a review of any standard or other requirement related to interstate transport of pollutants established under section 110(a)(2)(D)(i)(I).	
E.	Part 75 continuous emission monitoring analysis	10
F.	New source performance standard (NSPS) review	10
	Points shall be applied for each applicable standard but do not apply to registration, capped, or general permit applications.	
G.	National emission standards for hazardous air pollutants (NESHAP) review	10
	Points shall be applied for each applicable standard but do not apply to registration, capped, or general permit applications.	

H. Case-by-case maximum achievable control technology (MACT) review 20

Points shall be applied for each applicable source category reviewed.

I. Netting 10

Points shall be applied for each prevention of significant deterioration (PSD) pollutant for which a netting analysis is performed.

J. Limit to remain below programmatic regulatory threshold 10

Points shall be applied, if applicable, to each of the following regulatory programs: Part 70, NESHAP, EAW, AERA, NSPS, PSD, and nonattainment NSR.

K. Plantwide applicability limit (PAL) 20

Points shall be applied for each prevention of significant deterioration (PSD) pollutant for which a plantwide applicability limit is established.

L. Air emission risk analysis (AERA) review 15

M. Variance request under part 7000.7000 35

N. Confidentiality request under part 7000.1300 2

O. Environmental assessment worksheet (EAW) review

Points shall be assigned as follows:

Part 4410.4300, subparts 18, item A; and 29 15

Part 4410.4300, subparts 8, items A and B; 10, items A to C; 16, items A and D; 17, items A to C and E to G; and 18, items B and C 35

Part 4410.4300, subparts 4; 5, items A and B; 13; 15; 16, items B and C; and 17, item D 70

A fee for EAW review shall be charged only if the project falls into a mandatory category specified in part 4410.4300, the agency is the designated responsible governmental unit (RGU), and an air or water permit is required for the project. If a facility requires both an air and water permit, the points for an EAW review shall be charged only once and multiplied by the lower of the dollar per point value for an air or water permit.

7005.0100 DEFINITIONS.

[For text of subps 1 to 4e, see M.R.]

~~Subp. 4f. **Condensable particulate matter.** "Condensable particulate matter" means material that is in vapor phase at stack conditions and upon discharge immediately condenses in the ambient air to form solid or liquid particulate.~~

Subp. 4g. **Conditionally exempt stationary source.** "Conditionally exempt stationary source" means a stationary source listed in parts 7008.2100 to 7008.2250 that complies with chapter 7008 and all applicable requirements as defined in part 7007.0100, subpart ~~6b~~ 7, and is not part of another stationary source.

Subp. 4h. **Conditionally insignificant activity.** "Conditionally insignificant activity" means any emissions unit, emissions units, or activity listed in ~~part~~ parts 7008.4100 to 7008.4110 that complies with chapter 7008 and all applicable requirements as defined in part 7007.0100, subpart ~~6b~~ 7.

[For text of subps 5 to 11d, see M.R.]

Subp. 11e. **Filterable particulate matter.** "Filterable particulate matter" means material collected up to and on the filter media of the sample train during a performance test for particulate matter.

Subp. 12. [Repealed by amendment, 8 SR 2275]

Subp. 12a. **Inorganic condensable particulate matter.** "Inorganic condensable particulate matter" means inorganic material collected and measured by the sample train during a performance test for particulate matter.

[For text of subps 13 to 29, see M.R.]

Subp. 29a. **Organic condensable particulate matter.** "Organic condensable particulate matter" means organic material collected and measured by the sample train during a performance test for particulate matter.

Subp. 30. **Owner or operator.** "Owner" or "operator" means a person who owns, leases, operates, controls, or supervises, to any degree, an emissions unit, emission facility, or stationary source.

[For text of subps 30a to 44, see M.R.]

Subp. 45. **Volatile organic compound or VOC.** "Volatile organic compound " or "VOC" means any organic compound which participates in atmospheric photochemical reactions. This includes any organic compound other than the following compounds:

[For text of items A to GG, see M.R.]

HH. 1,1,1,2,3-pentafluoropropane (HFC-245eb);

II. 1,1,1,3,3-pentafluoropropane (HFC-245fa);

[For text of items JJ to NN, see M.R.]

OO. 1,1,1,2,2,3,3,4,4-nonafluoro-4-methoxy-butane ($C_4F_9OCH_3$ or HFE-7100);

PP. 2-(difluoromethoxymethyl)-1,1,1,2,3,3,3-heptafluoropropane ($(CF_3)_2CFCF_2OCH_3$);

QQ. 1-ethoxy-1,1,2,2,3,3,4,4,4-nonafluorobutane ($C_4F_9OC_2H_5$ or HFE-7200);

RR. 2-(ethoxydifluoromethyl)-1,1,1,2,3,3,3-heptafluoropropane ($(CF_3)_2CFCF_2OC_2H_5$);

[For text of item SS, see M.R.]

TT. 1,1,1,2,2,3,3-heptafluoro-3-methoxy-propane (n-$C_3F_7OCH_3$, HFE-7000);

UU. 3-ethoxy-1,1,1,2,3,4,4,5,5,6,6,6-dodecafluoro-2-(trifluoromethyl) hexane (HFE-7500);

VV. 1,1,1,2,3,3,3-heptafluoropropane (HFC 227ea);

WW. methyl formate (HCOOCH3);

XX. 1,1,1,2,2,3,4,5,5,5-decafluoro-3-methoxy-4-trifluoromethyl-pentane (HFE-7300);

YY. propylene carbonate;

ZZ. dimethyl carbonate;

AAA. trans-1,3,3,3-tetrafluoropropene;

BBB. HCF_2OCF_2H (HFE-134);

CCC. $HCF_2OCF_2OCF_2H$ (HFE-236cal2);

DDD. $HCF_2OCF_2CF_2OCF_2H$ (HFE-338pcc13);

EEE. $HCF_2OCF_2OCF_2CF_2OCF_2H$ (H-Galden 1040x or H-Galden ZT 130 (or 150 or 180));

FFF. trans 1-chloro-3,3,3-trifluoroprop-1-ene;

GGG. 2,3,3,3-tetrafluoropropene;

HHH. 2-amino-2-methyl-1-propanol;

III. any other compound listed in table 1, as amended, of the United States Environmental Protection Agency's Recommended Policy on Control of Volatile Organic Compounds, Federal Register, volume 42, page 35314, July 8, 1977; or

JJJ. any other compound determined by the United States Environmental Protection Agency to be negligibly photochemically reactive, upon publication of the determination in the Federal Register.

7007.0100 DEFINITIONS.

[For text of subps 1 to 6, see M.R.]

Subp. 6a. **Alternative operating scenario.** "Alternative operating scenario" means a scenario authorized in a part 70 permit that involves a change at the part 70 source for a

particular emissions unit and that either results in the unit being subject to one or more applicable requirements that differ from those applicable to the emissions unit prior to implementation of the change or renders inapplicable one or more requirements previously applicable to the emissions unit prior to implementation of the change.

Subp. 6b. **Approved replicable methodology.** "Approved replicable methodology" means part 70 permit terms that:

A. specify a protocol that is consistent with and implements an applicable requirement, or requirement of this chapter, such that the protocol is based on sound scientific or mathematical principles and provides reproducible results using the same inputs; and

B. require the results of the protocol to be recorded and used for assuring compliance with the applicable requirement, any other applicable requirement implicated by implementation of the approved replicable methodology, or requirement of this chapter, including when an approved replicable methodology is used for determining applicability of a specific requirement to a particular change.

Subp. 7. **Applicable requirement.** "Applicable requirement" means all the following as they apply to emissions units in a stationary source (including requirements that have been promulgated or approved by the EPA or the commissioner through rulemaking at the time of issuance but have future effective compliance dates):

[For text of items A to V, see M.R.]

W. any standard or other requirement established under section 110(a)(2)(D)(i)(I) of the Clean Air Act that regulates interstate transport of pollutants.

[For text of subps 7a to 28, see M.R.]

7007.0250 SOURCES REQUIRED TO OBTAIN A STATE PERMIT.

[For text of subps 1 to 3, see M.R.]

Subp. 4. **PTE threshold required state permit.** Owners and operators of a stationary source must obtain a permit under this part if the source has the potential to emit any pollutant listed below at a rate equal to or greater than the following amounts, in tons per year:

Pollutant	Threshold
Lead	0.5 tons per year
SO_2	50.0 tons per year
PM-10	25.0 tons per year
VOCs	100.0 tons per year

[For text of subps 5 to 8, see M.R.]

7007.0300 SOURCES NOT REQUIRED TO OBTAIN A PERMIT.

Subpart 1. **No permit required.** The owners and operators of the following stationary sources are not required to obtain a permit under parts 7007.0100 to 7007.1850:

[For text of items A to C, see M.R.]

D. any stationary source with only emissions units ~~listed as~~ that:

(1) are listed as insignificant activities in part 7007.1300, subparts 2 and 3~~.~~;

(2) are conditionally insignificant activities under chapter 7008; or

(3) qualify under both subitems (1) and (2).

The owner or operator of a stationary source that has conditionally insignificant activities must comply with parts 7008.4000 to 7008.4110 to qualify for the permit exemption under this part. The owner or operator must maintain records that demonstrate that a permit is not required. These records ~~shall~~ must contain a list of all emissions units and the Minnesota Rules citation that defines those emissions units as an insignificant activity or conditionally insignificant activity. The records ~~shall~~ must be permanently kept

at the stationary source or a central office and be readily available for examination and copying by the commissioner or a representative of the commissioner;

[For text of items E and F, see M.R.]

[For text of subp 2, see M.R.]

7007.0350 EXISTING SOURCE APPLICATION DEADLINES AND SOURCE OPERATION DURING TRANSITION.

Subpart 1. **Transition applications under this part; deadline based on SIC code.** Initial permit applications under parts 7007.0100 to 7007.1850 for an emission unit, emission facility, or stationary source in operation on October 18, 1993, shall be considered timely if they meet the requirements of this part.

[For text of items A and B, see M.R.]

C. The owners and operators of a stationary source must comply with the applicable deadline in this part, even though the stationary source may be operating under a permit issued by the agency under parts 7001.1200 to 7001.1220 (the permit rules in effect before October 18, 1993), and the permit is not due to expire until after the applicable deadline in this part. If a stationary source is operating under a permit issued by the agency under parts 7001.1200 to 7001.1220, and the permit expires after October 18, 1993, but before the applicable deadline, the owners and operators need not reapply before expiration of the permit, but shall comply with the applicable deadline in this part.

[For text of subps 2 to 5, see M.R.]

7007.0500 CONTENT OF PERMIT APPLICATION.

[For text of subp 1, see M.R.]

Subp. 2. **Information included.** Applicants shall submit the following information as required by the standard application form:

A. Information identifying the stationary source and its owners and operators:

(1) facility name and address;

(2) name, address, telephone number, and ownership interest of all owners of the stationary source;

(3) name, address, telephone number, and ownership interest of all owners of the real property on which the facility is located;

(4) name, address, and telephone number of all stationary source operators;

(5) name and contact telephone number of the facility site manager or primary facility contact; and

(6) name, address, and telephone number of the person preparing the application if different from the facility site manager or primary facility contact.

B. A description of the stationary source's processes and products (by Standard Industrial Classification Code or SIC Code) including any associated with each alternative operating scenario identified by the stationary source.

C. The following emissions-related information:

[For text of subitem (1), see M.R.]

(2) The application need not include the information required by this part for any activity listed on the insignificant activities list in part 7007.1300 or for conditionally insignificant activities, except as provided in this subitem. The application shall include a list identifying any activity at the stationary source described in subparts 3 and 4 of the insignificant activities list and conditionally insignificant activities. If requested by the agency, the permittee shall provide a calculation of emissions from any activity described in subparts 2, 3, and 4 of the insignificant activities list and conditionally insignificant activities. The agency shall request such a calculation if it finds that the emissions from those activities, in addition to other emissions from the stationary source,

could make the stationary source subject to different applicable requirements under parts 7007.0100 to 7007.1850.

[For text of subitem (3), see M.R.]

(4) The permit application shall specify the potential emissions, as defined in part 7005.0100, subpart 35a, in tons per year from the stationary source as a whole. These potential emissions shall be specified for each regulated air pollutant and each hazardous air pollutant that is not yet a regulated air pollutant, as defined in part 7007.0100, subparts 12a and 19, except that pollutants which are regulated solely under section 112(r) of the act need not be included and pollutants regulated solely under section 602 of the act need not be included. In addition, for each emissions unit subject to an applicable requirement, the permit application shall specify, in tons per year, the potential emissions of the same pollutants referenced in the previous sentence. If the applicable requirement contains a standard reference test method which is to be used to establish compliance, the permit application shall specify the potential emissions in the same units as are used in the test method.

[For text of subitems (5) to (10), see M.R.]

(11) A permit application for an amendment must include all calculations of emissions changes required under part 7007.1200.

(12) A permit application must explain the means by which the emissions information in subitems (1) to (11) is gathered, and provide the calculations on which they are based.

[For text of items D to J, see M.R.]

K. For part 70 permit applications only, a compliance plan that contains the following:

[For text of subitems (1) to (3), see M.R.]

(4) For applicable requirements associated with a proposed alternative operating scenario, a statement that the source will meet the requirements upon implementation of the alternative operating scenario. If a proposed alternative operating scenario would implicate an applicable requirement that will become effective during the permit term, a statement that the source will meet the requirement on a timely basis.

(5) For applicable requirements for which the stationary source is not in compliance at the time of application submittal, including applicable requirements associated with a proposed alternative operating scenario, a proposed schedule of compliance. The schedule must include a date specific schedule of remedial measures, including an enforceable sequence of actions with milestones, leading to compliance in the shortest reasonable period of time. The proposed schedule of compliance must begin at the time of permit application, but the applicant may project its compliance status at the time the permit is expected to be issued. This compliance schedule must resemble and be at least as stringent as that contained in any judicial consent decree, stipulation agreement, or administrative order to which the stationary source is subject. The compliance schedule must be supplemental to, and must not sanction noncompliance with, the applicable requirements on which it is based.

[For text of items L to N, see M.R.]

Subp. 3. **Application certification.** A responsible official, as defined in part 7007.0100, subpart 21, ~~shall~~ must sign and certify any application, ~~notice,~~ report, or compliance certification submitted pursuant to parts 7007.0100 to 7007.1850 or notice submitted pursuant to part 7007.0800, subpart 10, item B; 7007.1110, subpart 10, 11, or 15a; 7007.1150, item C; 7007.1250, subpart 4; or 7007.1350, subpart 2, with regard to truth, accuracy, and completeness. This certification and any other certification required by parts 7007.0100 to 7007.1850 ~~shall~~ must state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true,

accurate, and complete. This subpart ~~shall~~ must be complied with by both the owner and the operator of the stationary source if they are not the same.

[For text of subps 4 and 5, see M.R.]

7007.0502 MERCURY EMISSIONS REDUCTION PLANS.

[For text of subp 1, see M.R.]

Subp. 2. **Applicability.** The owners or operators of an existing mercury emission source must comply with this part. For the purposes of this part, "existing mercury emission source" means that the owners or operators have been issued an air emission permit by the agency as of September 29, 2014. For initial applicability, owners or operators must calculate emissions following methods in part 7019.3030 for the calendar year 2014. If, after 2014, the actual mercury emissions from the existing mercury emission source are below the threshold of three pounds per year or more for three consecutive years, then the stationary source is no longer considered a mercury emission source and is not subject to this part. The owner or operator must:

A. retain records of the actual mercury emissions for the qualifying three years on site for five years from the date the determination was made;

B. make the records available for inspection and submit the records, within specified timelines, upon request of the commissioner; and

C. immediately resume compliance with applicable requirements for mercury emission sources if a physical or operational change causes the stationary source to again become a mercury emission source. Owners or operators must resubmit a mercury emissions reduction plan under subpart 3 within 12 months of again becoming a mercury emission source.

[For text of subps 3 to 9, see M.R.]

7007.0600 COMPLETE APPLICATION AND SUPPLEMENTAL INFORMATION REQUIREMENTS.

Subpart 1. **Complete application.** To be deemed complete, an application must provide all information required by part 7007.0500, except that an application for a permit amendment under parts 7007.1400, 7007.1450, and 7007.1500 need supply only information that is related to the proposed amendment. Information required under part 7007.0500 must be sufficient to evaluate the subject stationary source and its application and to determine all applicable requirements. The application shall also contain a certification from a responsible official consistent with part 7007.0500, subpart 3.

[For text of subp 2, see M.R.]

7007.0650 APPLICATION SUBMITTAL.

Subpart 1. **Who receives application.** Permit applicants shall submit two printed copies of the complete application and all supplemental information requested by the commissioner to the ~~Minnesota Pollution Control Agency at 520 Lafayette Road North, Saint Paul, Minnesota 55155~~ address specified by the commissioner. Upon request of the commissioner, the applicant shall submit additional copies of the application directly to the administrator, affected states, and other governmental entities with the legal right to review the application, or submit additional copies to the agency to be forwarded to these parties.

Subp. 2. **Electronic application submittal.** Applicants may submit applications and supplemental information in an electronic format specified by the commissioner. If the information is submitted in an electronic format:

A. the applicant must submit a printed copy of the complete application and supplemental information if requested by the commissioner ~~may allow the applicant to submit fewer printed copies than required in subpart 1~~; and

B. ~~the application must include~~ the application certification required by part 7007.0500, subpart 3, must either:

(1) be on paper with an original signature; or

(2) ~~with~~ have an electronic signature, if such a method of signature has been approved by the commissioner.

7007.0700 COMPLETENESS REVIEW.

A. Within one week of receipt of an application, the agency shall notify the applicant in writing that it has received the application.

B. Within 60 days of receipt of an application, the agency shall notify the applicant in writing of whether the application is complete. If the agency fails to make the completeness determination required above within the 60-day period, the application shall be deemed complete. A completeness determination under this subpart triggers timelines for permit issuance under part 7007.0750, retroactive to the date the complete application was received by the agency, but does not limit the agency's ability to request additional information.

C. If an application is incomplete, the agency shall identify the incomplete portions of the application and outline the actions needed to complete the application.

D. If, during processing of a permit application that has been deemed complete, a minor permit amendment application, or an administrative amendment application, the agency determines that additional information is necessary to evaluate or take final action on that application, it may request such information in writing, and, after consultation with the applicant, set a deadline for a response. In the request for additional information, the agency shall briefly explain why the additional information is needed. If an applicant fails to respond to requests for additional information within the time period requested, the application shall be deemed incomplete. Applicants who have already made a change or begun actual construction of a modification at a permitted facility under part 7007.1450, shall provide the additional information within the time period specified by the agency.

E. Items A and B do not apply to applications for minor amendments or administrative amendments.

7007.0750 APPLICATION PRIORITY AND ISSUANCE TIMELINES.

[For text of subp 1, see M.R.]

Subp. 2. **Application processing and issuance deadlines.**

[For text of items A and B, see M.R.]

C. The agency shall take final action on applications for permits or permit amendments not governed by items A and B within the period specified in this item. The agency shall take final action on such an application for a permit, permit reissuance, or major permit amendment within 18 months of receiving a complete application. The agency shall take final action on such an application for a minor permit amendment within 90 days of receiving a complete application or for a moderate permit amendment within six months of receiving a complete application, but not before the end of the administrator's 45-day review period in the case of part 70 permits. The agency shall take final action on an application for an administrative amendment within 60 days of receiving the complete application.

[For text of items D to F, see M.R.]

[For text of subps 3 to 6, see M.R.]

Subp. 7. **Two-stage issuance of permits and permit amendments authorizing construction or modification.**

A. If a permit or permit amendment:

(1) authorizes construction or modification;

(2) ~~includes the requirements of a part 70 permit;~~

~~(3)~~ must follow the 45-day EPA review period procedures under part 7007.0950; and

~~(4)~~ (3) includes either:

(a) the requirements of a new source review program under part C (Prevention of Significant Deterioration of Air Quality) or part D (Plan Requirements for Nonattainment Areas) of the act; or

(b) an enforceable limitation assumed to avoid being subject to a new source review program under part C or D of the act,

then the agency shall send the permit to the permittee after ~~all requirements~~ the procedural requirements, including public participation procedures, of the applicable new source review program have been satisfied or after all requirements to avoid applicability of a new source review program have been completed including any required notice and comment period. The agency shall at the same time notify the permittee in writing that those permit conditions required by the new source review program or developed to avoid applicability of a new source review program and designated as such by the agency in the permit or amendment, and only those conditions, shall be considered issued.

[For text of items B and C, see M.R.]

[For text of subp 8, see M.R.]

7007.0800 PERMIT CONTENT.

[For text of subp 1, see M.R.]

Subp. 2. **Emission limitations and standards.** The permit must:

A. include emissions limitations, operational requirements, and other provisions needed to ensure compliance with all applicable requirements at the time of permit issuance. For part 70 permits, the requirements and limitations must include approved replicable methodologies identified by the source in its permit application if approved by

the commissioner, provided that no approved replicable methodologies shall contravene any terms needed to comply with any applicable requirement or requirement of this part or circumvent any applicable requirement that would apply as a result of implementing the approved replicable method;

B. include any condition the commissioner determines to be necessary to protect human health and the environment;

C. state that, where another applicable requirement of the act is more stringent than any applicable requirement of regulations promulgated under title IV of the act (Acid Deposition Control), both provisions shall be incorporated into the permit and shall be enforceable by the administrator; and

D. contain provisions to ensure continuous compliance with applicable emissions limitations during periods of ~~startup~~ start-up and shutdown of an emissions unit~~, such as operating parameters or best practices to minimize emissions~~.

[For text of subps 3 to 10, see M.R.]

Subp. 11. **Alternative operating scenarios.** Terms and conditions allowing for reasonably anticipated alternative operating scenarios identified by the stationary source in its application. Such terms and conditions shall:

[For text of item A, see M.R.]

B. ensure that the operation under each such alternative operating scenario complies with all applicable requirements and the requirements of parts 7007.0100 to 7007.1850.

[For text of subps 12 to 16, see M.R.]

7007.0801 CONDITIONS FOR AIR EMISSION PERMITS FOR WASTE COMBUSTORS.

[For text of subp 1, see M.R.]

Subp. 2. **Mixed municipal solid waste or refuse-derived fuel waste combustors.** An air emissions permit for a waste combustor combusting mixed municipal solid waste or refuse-derived fuel must:

[For text of items A to F, see M.R.]

G. include operating conditions that ensure that the facility will continue to emit mercury emissions less than 50 percent of the applicable standard if the waste combustor elects to conduct mercury emissions testing as allowed in part 7011.1270 and Minnesota Statutes, section 116.85.

Subp. 3. **Waste combustors of nonmixed municipal solid waste.** An air emissions permit for a waste combustor which does not combust mixed municipal solid waste or refuse-derived fuel must:

[For text of items A to E, see M.R.]

F. include operating conditions that ensure that the facility will continue to emit mercury emissions less than 50 percent of the applicable standard if the waste combustor elects to conduct annual mercury emissions testing as allowed in part 7011.1270 and Minnesota Statutes, section 116.85.

7007.0950 EPA REVIEW AND OBJECTION.

Subpart 1. **Review by EPA.**

A. The commissioner must provide to the administrator a copy of the following documents, unless the administrator agrees to accept a summary of the documents:

[For text of subitems (1) and (2), see M.R.]

B. In the case of a part 70 permit, the commissioner must provide to the administrator the proposed permit or permit amendment after the draft permit or permit amendment has been subject to public comment.

[For text of item C, see M.R.]

Subp. 2. **EPA objection.**

A. In the case of a part 70 permit, the agency shall not issue a permit or permit amendment if the administrator objects to its issuance in writing within 45 days of receipt of the proposed permit or permit amendment and any necessary supporting information.

B. In the case of a state permit, the agency shall not issue a permit, or an amendment for which EPA review is provided under subpart 1, if the administrator objects to its issuance in writing within 30 days of receipt of the draft permit or amendment and any necessary supporting information.

[For text of subps 3 and 4, see M.R.]

7007.1000 PERMIT ISSUANCE AND DENIAL.

Subpart 1. **Preconditions for issuance.** The following conditions must be satisfied for the agency to issue a permit or permit amendment:

A. the agency has received a complete application for a permit, permit amendment, or permit reissuance, except that a complete application need not be received before issuance of a general permit under part 7007.1100, subpart 4;

B. the agency has complied with the public participation procedures for permit issuance, if required by part 7007.0850;

C. the agency has complied with the procedures for notifying and responding to affected states, if required by part 7007.0900;

D. if the administrator's review is required by part 7007.0950, the administrator has received a copy of the permit and any notices required and has not objected to issuance of the permit within the time period specified, or the administrator has objected but the objection has been resolved to the administrator's satisfaction;

E. the conditions of the permit provide for compliance with all applicable requirements and the requirements of parts 7007.0100 to 7007.1850, or include a schedule to achieve such compliance;

F. the permit does not reflect a variance from any federally enforceable applicable requirement or requirement of parts 7007.0100 to 7007.1850;

G. the agency anticipates that the applicant will, with respect to the stationary source and activity to be permitted, comply with all conditions of the permit; and

H. all applicable provisions of Minnesota Statutes, chapter 116D, and the rules adopted under Minnesota Statutes, chapter 116D, have been fulfilled.

[For text of subps 2 and 3, see M.R.]

7007.1100 GENERAL PERMITS.

Subpart 1. **Criteria.** If the agency determines that numerous similar stationary sources are subject to the same or substantially similar regulatory requirements, the agency may issue a permit required under parts 7007.0200 and 7007.0250 in the form of a general permit applying to multiple sources following the procedures in subparts 2 to 7. The agency may also issue general permits under this part which apply only to specific portions of stationary sources, including air pollution control equipment, if the specific portions are subject to the same or substantially similar regulatory requirements. The agency shall specify in the notice in subpart 2 whether the general permit applies to an entire stationary source or to specific portions of a stationary source for the purpose of determining applicability under subpart 11. The agency shall not issue general permits for affected sources under the acid rain program unless general permits are authorized by regulations promulgated under title IV of the act (Acid Deposition Control).

[For text of subps 2 to 8, see M.R.]

Subp. 9. **Changes or modifications rendering stationary source ineligible for general permit.** The owner and operator of a stationary source that operates under an agency-issued general permit must submit a part 70, state, capped, or registration permit application before making a change or modification that results in the stationary source no longer qualifying for the general permit under this part. The owner or operator may not begin actual construction on the modification until the required part 70, state, capped, or registration permit for the stationary source is obtained or an installation and operation permit for the modification is obtained under part 7007.0750, subpart 5.

Subp. 10. **Regulatory change rendering stationary source ineligible for general permit.**

A. If a stationary source covered by a general permit becomes subject to a new regulatory requirement that results in the stationary source no longer being able to qualify for or meet the requirements of the general permit, then the owners and operators must:

(1) submit written notification to the commissioner within 30 days of the effective date of a new regulation that results in the stationary source no longer being able to qualify for or meet the requirements of the general permit. The notification must include a description of the regulatory change and a statement of what type of permit application the owners and operators will submit under subitem (2); and

(2) submit either a part 70, state, capped, or registration permit application within 180 days of the effective date of the regulatory change.

B. The owners and operators must submit the required permit application for the appropriate air emission permit within the time limits in item A. If the owners and operators fail to submit the required permit application in the time required, the owners and operators do not hold a valid permit and are in violation of part 7007.0150, subpart 1.

Subp. 11. **Parts that do not apply to certain general permits.** For general permits that cover an entire stationary source, parts 7007.1150 to 7007.1250 and 7007.1350 to 7007.1500 do not apply.

7007.1142 CAPPED PERMIT ISSUANCE AND CHANGE OF PERMIT STATUS.

Subpart 1. **Capped permit issuance, denial, and revocation.**

A. ~~The following conditions must be satisfied~~ To be eligible to receive a capped permit and for the commissioner to issue a capped permit ~~to~~, the owners and operators of a stationary source must meet the following conditions:

(1) the owners and operators have submitted a complete application for a capped permit;

(2) the commissioner determines that the stationary source qualifies for the capped permit option under parts 7007.1140 to 7007.1148 for which the application was submitted; and

(3) the commissioner has reason to believe that the stationary source will comply with the capped permit.

B. The commissioner shall deny an application for a capped permit if the commissioner determines that the stationary source does not qualify for the capped permit option under parts 7007.1140 to 7007.1148 for which the application was submitted or that the stationary source will not be able to comply with the capped permit. The grounds for permit denial in parts 7007.1000, subpart 1, item H, and part 7007.1000, subpart 2, items B to G, also constitute grounds for the commissioner to deny a capped permit application.

C. The commissioner may revoke a capped permit, if the commissioner finds that any of the grounds under subpart 6 or under part 7007.1700, subpart 1, exist, by following the procedure in part 7007.1700, subpart 2.

Subp. 1a. **Changes that trigger new source performance standards.** If a change or modification made at a stationary source that is operating under a capped permit results in the stationary source being subject to a new source performance standard listed under part 7007.1140, subpart 2, item E, or if the change or modification adds an emissions unit subject to the standards listed in part 7007.0300, the owner or operator must submit to the commissioner:

A. the information required by the standard by the time specified in the standard;

B. written notice that contains a description of the change; and

C. a copy of the applicable new source performance standard part, with the applicable portions of the new source performance standard highlighted, including the applicable parts of Code of Federal Regulations, title 40, part 60, subpart A, as amended, or a new source performance standard form provided by the commissioner that identifies applicable portions of the new source performance standard.

[For text of subps 2 to 7, see M.R.]

7007.1150 WHEN A PERMIT AMENDMENT IS REQUIRED.

[For text of items A and B, see M.R.]

C. A written notice to the agency shall be sent by any person who, at a permitted stationary source, makes a change that: (i) does not increase emissions of any regulated air pollutant; (ii) does not constitute a title I modification; and (iii) does not constitute any other type of modification, if the change is one of the following:

(1) installing air pollution control equipment;

(2) replacing a unit identified in the permit; or

(3) replacing existing air pollution control equipment with listed control equipment, as defined in part 7011.0060, subpart 4, ~~that meets the control equipment efficiencies for listed control equipment in part 7011.0070 and has an equivalent or better~~

~~control efficiency of regulated pollutants previously controlled with the control equipment being replaced.~~ provided that the replacement air pollution control equipment:

(a) attains at least the control equipment efficiency in part 7011.0070 for each applicable pollutant; and

(b) has a listed control efficiency in part 7011.0070 that is equivalent to or better than the control efficiency of the control equipment being replaced for each applicable pollutant.

The notice must be received by the agency at least seven working days prior to the installation or replacement. The permittee must submit the notice in a format specified by the commissioner. The notice must include all information needed to determine the applicability of a requirement or to impose any applicable requirement. The notice must be certified by a responsible official in the manner provided in part 7007.0500, subpart 3. The permittee and the agency shall attach the notice to the stationary source's permit. If the agency finds that the installation or replacement triggers new monitoring, record keeping, or reporting requirements under applicable requirements or parts 7007.0100 to 7007.1850, the agency shall initiate an amendment under part 7007.1400 or 7007.1500 to include the new requirements. If the installation or replacement constitutes a title I modification or other type of modification, this item does not apply, and the permittee shall follow the applicable procedures of part 7007.1250, 7007.1350, 7007.1450, or 7007.1500. If notice is provided as required by this item, the installation and operation of the additional equipment shall not be considered a violation of the permit.

[For text of items D to F, see M.R.]

7007.1250 INSIGNIFICANT MODIFICATIONS.

Subpart 1. **When an insignificant modification can be made.** The permittee may make a modification described in either item A or B at a permitted stationary source without getting a permit amendment, unless the modification is prohibited by

subpart 2. However, if the modification triggers new monitoring, record keeping, or reporting requirements under applicable requirements or parts 7007.0100 to 7007.1850, the permittee shall initiate an administrative amendment under part 7007.1400 to include the new requirements no more than 30 days after making the modification.

A. Construction or operation of any emissions unit, or undertaking any activity, that is on the insignificant activities list in part 7007.1300, subparts 2 and 3.

B. Any modification that will:

(1) result in an increase of a regulated air pollutant which is not listed in table 1; or

(2) result in an increase of an air pollutant which is listed in table 1, but in an amount less than the corresponding threshold.

Table 1

Pollutant		**Threshold**
NO_X	2.28	pounds per hour
SO_2	2.28	pounds per hour
VOCs	2.28	pounds per hour
PM-10	0.855	pounds per hour
CO	5.70	pounds per hour
Lead	0.025	pounds per hour

For purposes of this subpart, whether or not the modification will cause an increase in emissions shall be calculated as described in part 7007.1200. An owner or operator may not use control equipment efficiencies for listed control equipment determined by part 7011.0070 to qualify for an insignificant modification, unless the specifications for the control equipment are from a control equipment manufacturer, as defined in part 7011.0060, subpart 3. Modifications which would otherwise be insignificant under this part may be title I modifications, for which a major amendment is required, using the

methods of calculation required under title I of the act. Permittees are reminded to review the definition of title I modifications and the requirements of title I of the act.

[For text of subps 2 to 6, see M.R.]

7007.1300 INSIGNIFICANT ACTIVITIES LIST.

[For text of subp 1, see M.R.]

Subp. 2. **Insignificant activities not required to be listed.** The activities described in this subpart are not required to be listed in a permit application under part 7007.0500, subpart 2, item C, subitem (2). Calculation of emissions from these activities must be provided if required by the agency under part 7007.0500, subpart 2, item C, subitem (2). If emissions units listed in this subpart (a) are subject to additional requirements under section 114(a)(3) (Monitoring Requirements) or 112 (Hazardous Air Pollutants) of the act; (b) are part of a Title I modification; or (c) if accounted for, make a stationary source subject to a part 70 permit, then emissions from the emissions units must be provided in the permit application.

[For text of items A to C, see M.R.]

D. Processing operations:

(1) closed tumblers used for cleaning or deburring metal products without abrasive blasting;

(2) equipment for washing or drying fabricated glass or metal products, if no VOCs are used in the process, and no gas, oil, or solid fuel is burned; and

(3) blast cleaning operations using suspension of abrasive in water.

[For text of items E to K, see M.R.]

Subp. 3. **Insignificant activities required to be listed.** The activities described in this subpart must be listed in a permit application, and calculation of emissions from these

activities shall be provided if required by the agency, under part 7007.0500, subpart 2, item C, subitem (2). If emissions units listed in this subpart are subject to additional requirements under section 114(a)(3) of the act (Monitoring Requirements) or section 112 of the act (Hazardous Air Pollutants), or if part of a title I modification, or, if accounted for, make a stationary source subject to a part 70 permit, emissions from the emissions units must be calculated in the permit application.

[For text of item A, see M.R.]

B. Infrared electric ovens and indirect heating equipment:

(1) infrared electric ovens; and

(2) indirect heating equipment as defined in part 7011.0600, subpart 6, with a capacity less than 420,000 Btu per hour, but only if the total combined capacity of all indirect heating equipment at the stationary source with a capacity less than 420,000 Btu per hour is less than or equal to 1,400,000 Btu per hour. For example: Facility A has three furnaces, each with a capacity of 400,000 Btu per hour. The three units are all an insignificant activity to be listed under this subitem, because their combined capacity is less than 1,400,000 Btu per hour. Facility B has six furnaces, each with a capacity of 400,000 Btu per hour. None of the six units is an insignificant activity under this subitem, because their total combined capacity is greater than 1,400,000 Btu per hour. For purposes of this subitem, "indirect heating equipment" has the meaning given under part 7011.0500, subpart 9.

C. Fabrication operations: equipment used exclusively for forging, pressing, drawing, spinning, or extruding hot metals.

D. Processing operations:

(1) open tumblers with a batch capacity of 1,000 pounds or less; and

(2) equipment that vents particulate matter (PM), PM-10, or PM-2.5 inside a building, such as buffing, polishing, carving, cutting, drilling, machining, routing, sanding, sawing, surface grinding, or turning equipment, provided that emissions from the equipment are:

(a) vented inside of the building 100 percent of the time; and

(b) not vented through air filtering systems.

[For text of items E and F, see M.R.]

G. Emissions from a laboratory, as defined in this item. "Laboratory" means a place or activity devoted to experimental study or teaching in any science, or to the testing and analysis of drugs, chemicals, chemical compounds or other substances, or similar activities, provided that the activities described in this sentence are conducted on a laboratory scale. Activities are conducted on a laboratory scale if the containers used for reactions, transfers, and other handling of substances are designed to be easily and safely manipulated by one person. If an emission facility manufactures or produces products for profit in any quantity, it may not be considered to be a laboratory under this item. Support activities necessary to the operation of the laboratory are considered to be part of the laboratory. Support activities do not include the provision of power to the laboratory from sources that provide power to multiple projects or from sources which would otherwise require permitting, such as boilers that provide power to an entire facility.

H. Miscellaneous:

[For text of subitems (1) to (6), see M.R.]

(7) cleaning operations: alkaline/phosphate cleaners and associated cleaners.

[For text of items I to K, see M.R.]

Subp. 4. **Insignificant activities required to be listed in a part 70 application.** If the owners and operators are applying for the initial part 70 permit for a stationary source, emissions units with emissions less than all the following limits but not included in subpart 2 must be listed in the part 70 permit application:

[For text of items A to D, see M.R.]

Subp. 5. **Hazardous air pollutant threshold table.**

CAS#	Chemical Name	De Minimis Level (tons/year)
57147	1,1-Dimethyl hydrazine	0.008
79005	1,1,2-~~Trichloroethan~~ Trichloroethane	1
79345	1,1,2,2-Tetrachloroethane	0.3
96128	1,2-Dibromo-3-chloropropane	0.01
122667	1,2-Diphenylhydrazine	0.09
106887	1,2-Epoxybutane	1
75558	1,2-Propylenimine (2-Methyl aziridine)	0.003
120821	1,2,4-Trichlorobenzene	10
106990	1,3-Butadiene	0.07
542756	1,3-Dichloropropene	1
1120714	1,3-Propane sultone	0.03
106467	1,4-Dichlorobenzene(p)	3
123911	1,4-Dioxane (1,4-Diethyleneoxide)	6
53963	2-Acetylaminofluorine	0.005
532274	2-Chloroacetophenone	0.06
79469	2-Nitropropane	1
540841	2,2,4-Trimethylpentane	5
1746016	2,3,7,8-Tetrachlorodibenzo-p-dioxin	6E-07
584849	2,4-Toluene diisocyanate	0.1
51285	2,4-Dinitrophenol	1
121142	2,4-Dinitrotoluene	0.02

94757	2,4-D, salts, esters (2,4-Dichlorophenoxy acetic acid)	10
95807	2,4-Toluene diamine	0.02
95954	2,4,5-Trichlorophenol	1
88062	2,4,6-Trichlorophenol	6
91941	3,3-Dichlorobenzidene	0.2
119904	3,3'-Dimethoxybenzidine	0.1
119937	3,3'-Dimethyl benzidine	0.008
92671	4-Aminobiphenyl	1
92933	4-Nitrobiphenyl	1
100027	4-Nitrophenol	5
101144	4,4-Methylene bis(2-chloroaniline)	0.2
101779	4,4'-Methylenedianiline	1
534521	4,6-Dinitro-o-cresol, and salts	0.1
75070	Acetaldehyde	9
60355	Acetamide	1
75058	Acetonitrile	4
98862	Acetophenone	1
107028	Acrolein	0.04
79061	Acrylamide	0.02
79107	Acrylic acid	0.6
107131	Acrylonitrile	0.3
107051	Allyl chloride	1
62533	Aniline	1
71432	Benzene	2
92875	Benzidine	0.0003
98077	Benzotrichloride	0.006
100447	Benzyl chloride	0.1
57578	beta-Propiolactone	0.1
92524	Biphenyl	10
117817	Bis(2-ethylhexyl)phthalate(DEHP)	5

542881	Bis(chloromethyl)ether	0.0003
75252	Bromoform	10
156627	Calcium cyanamide	10
133062	Captan	10
63252	Carbaryl	10
75150	Carbon disulfide	1
56235	Carbon tetrachloride	1
463581	Carbonyl sulfide	5
120809	Catechol	5
133904	Chloramben	1
57749	Chlordane	0.01
7782505	Chlorine	0.1
79118	Chloroacetic acid	0.1
108907	Chlorobenzene	10
510156	Chlorobenzilate	0.4
67663	Chloroform	0.9
107302	Chloromethyl methyl ether	0.1
126998	Chloroprene	1
1319773	Cresols/Cresylic acid (isomers and mixture)	1
95487	o-Cresol	1
108394	m-Cresol	1
106445	p-Cresol	1
98828	Cumene	10
334883	Diazomethane	1
132649	Dibenzofuran	5
72559	DDE (p,p'-Dichlorodiphenyldichloroethylene)	0.01
84742	Dibutylphthalate	10
111444	Dichloroethyl ether (Bis(2-chloroethyl)ether)	0.06
62737	Dichlorvos	0.2
11422	Diethanolamine	5

64675	Diethyl sulfate	1
60117	Dimethyl aminoazobenzene	1
79447	Dimethyl carbamoyl chloride	0.02
68122	Dimethyl formamide	1
131113	Dimethyl phthalate	10
77781	Dimethyl sulfate	0.1
106898	Epichlorohydrin	2
140885	Ethyl acrylate	1
100414	Ethyl benzene	10
51796	Ethyl carbamate (Urethane)	0.8
75003	Ethyl chloride	10
106934	Ethylene dibromide (Dibromoethane)	0.1
107062	Ethylene dichloride (1,2-Dichloroethane)	0.8
107211	Ethylene glycol	10
151564	Ethylene imine (Aziridine)	0.003
75218	Ethylene oxide	0.1
96457	Ethylene thiourea	0.6
75343	Ethylidene dichloride (1,1-Dichloroethane)	1
50000	Formaldehyde	2
76448	Heptachlor	0.02
118741	Hexachlorobenzene	0.01
87683	Hexachlorobutadiene	0.9
77474	Hexachlorocyclopentadiene	0.1
67721	Hexachloroethane	5
822060	Hexamethylene,-1,6-diisocyanate	0.02
680319	Hexamethylphosphoramide	0.01
110543	Hexane	10
302012	Hydrazine	0.004
7647010	Hydrochloric acid	10
7664393	Hydrogen fluoride	0.1

123319	Hydroquinone	1
78591	Isophorone	10
58899	Lindane (hexachlorcyclohexane, gamma)	0.01
108316	Maleic anhydride	1
67561	Methanol	10
72435	Methoxychlor	10
74839	Methyl bromide (Bromomethane)	10
74873	Methyl chloride (Chloromethane)	10
71556	Methyl chloroform (1,1,1-Trichloroethane)	10
60344	Methyl hydrazine	0.06
74884	Methyl iodide (Iodomethane)	1
108101	Methyl isobutyl ketone	10
624839	Methyl isocyanate	0.1
80626	Methyl methacrylate	10
1634044	Methyl tert-butyl ether	10
12108133	Methylcyclopentadienyl manganese	0.1
75092	Methylene chloride (Dichloromethane)	10
101688	Methylene diphenyl diisocyanate	0.1
91203	Naphthalene	10
98953	Nitrobenzene	1
62759	N-Nitrosodimethylamine	0.001
69892	N-Nitrosomorpholine	1
684935	N-Nitroso-N-methylurea	0.0002
121697	N,N-Dimethylaniline	1
90040	o-Anisidine	1
95534	o-Toluidine	4
56382	Parathion	0.1
82688	Pentachloronitrobenzene (Quintobenzene)	0.3
87865	Pentachlorophenol	0.7
108952	Phenol	0.1

75445	Phosgene	0.1
7803512	Phosphine	5
7723140	Phosphorous	0.1
85449	Phthalic anhydride	5
1336363	Polychlorinated biphenyls (Aroclors)	0.009
106503	p-Phenylenediamine	10
123386	Propionaldehyde	5
114261	Propoxur (Baygone)	10
78875	Propylene dichloride (1,2-Dichloropropane)	1
75569	Propylene oxide	5
91225	Quinoline	0.006
106514	Quinone	5
100425	Styrene	1
96093	Styrene oxide	1
127184	Tetrachloroethylene (Perchloroethylene)	10
7550450	Titanium tetrachloride	0.1
108883	Toluene	10
8001352	Toxaphene (chlorinated camphene)	0.01
79016	Trichloroethylene	10
121448	Triethylamine	10
1582098	Trifluralin	9
108054	Vinyl acetate	1
593602	Vinyl bromide (bromoethene)	0.6
75014	Vinyl chloride	0.2
75354	Vinylidene chloride (1,1-Dichloroethylene)	0.4
1330207	Xylenes (isomers and mixture)	10
108383	m-Xylenes	10
95476	o-Xylenes	10
106423	p-Xylenes	10
-	Arsenic and inorganic arsenic compounds	0.005

7784421	Arsine	0.1
-	Antimony compounds (except those specifically listed)*	5
1309644	Antimony trioxide	1
1345046	Antimony trisulfide	0.1
7783702	Antimony pentafluoride	0.1
28300745	Antimony potassium tartrate	1
-	Beryllium compounds (except Beryllium salts)	0.008
-	Beryllium salts	0.00002
-	Cadmium compounds	0.01
130618	Cadmium oxide	0.01
-	Chromium compounds (except Hexavalent and Trivalent)	5
-	Hexavalent Chromium compounds	0.002
-	Trivalent Chromium compounds	5
10025737	Chromic chloride	0.1
744084	Cobalt metal (and compounds, except those specifically listed)*	0.1
10210681	Cobalt carbonyl	0.1
62207765	Fluomine	0.1
-	Coke oven emissions	0.03
-	Cyanide compounds (except those specifically listed)*	5
143339	Sodium cyanide	0.1
151508	Potassium cyanide	0.1
-	Glycol ethers (except those specifically listed)*	5
110805	2-Ethoxy ethanol	10
111762	Ethylene glycol monobutyl ether	10
108864	2-Methoxy ethanol	10
-	Lead and compounds (except those specifically listed)*	0.01
75741	Tetramethyl lead	0.01
78002	Tetraethyl lead	0.01
7439965	Manganese and compounds (except those specifically listed)*	0.8

12108133	Methylcyclopentadienyl manganese	0.1
-	Mercury compounds (except those specifically listed)*	0.01
10045940	Mercuric nitrate	0.01
748794	Mercuric chloride	0.01
62384	Phenyl mercuric acetate	0.01
-	Elemental Mercury	0.01
-	Mineral fiber compounds (except those specifically listed)*	a
1332214	Asbestos	a
-	Erionite	a
-	Silica (crystalline)	a
-	Talc (containing asbestos from fibers)	a
-	Glass wool	a
-	Rock wool	a
-	Slag wool	a
-	Ceramic fibers	a
-	Nickel compounds (except those specifically listed)*	1
13463393	Nickel Carbonyl	0.1
12035722	Nickel refinery dust	0.08
-	Nickel subsulfide	0.04
-	Polycyclic organic matter-POM (except those specifically listed)*	0.01
56553	Benz(a)anthracene	0.01
50328	Benzo(a)pyrene	0.01
205992	Benzo(b)fluoranthene	0.01
57976	7,12-Dimethylbenz(a)anthracene	0.01
225514	Benz(c)acridine	0.01
218019	Chrysene	0.01
53703	Dibenz(ah)anthracene	0.01
189559	1,2:7,8-Dibenzopyrene	0.01
193395	Indeno(1,2,3-cd)pyrene	0.01
-	Dioxins & Furans (TCDD equivalent)**	-

7782492	Selenium and compounds (except those specifically listed)*	0.1
7488564	Selenium sulfide (mono and di)	0.1
7783075	Hydrogen selenide	0.1
10102188	Sodium selenite	0.1
13410010	Sodium selenate	0.1
99999918	Radionuclides (including radon)	b

* - For this chemical group, specific compounds or subgroups are named specifically in this table. For the remainder of the chemicals of the chemical group, a single de minimis value is listed, which applies to compounds which are not named specifically.

** - The "toxic equivalent factor" method in EPA/625/3-89-016 (U.S. EPA (1989) Interim procedures for estimating risk associated with exposure to mixtures) should be used for PCDD/PCDF mixtures. A different de minimis level will be determined for each mixture depending on the equivalency factors used which are compound specific. For purposes of this part, the document EPA/625/3-89-016, Interim Procedures for Estimating Risk Associated with Exposure to Mixtures, U.S. EPA (1989), is incorporated by reference. The Environmental Protection Agency is the author and publisher. This document is available at the University of Minnesota through the Minitex interlibrary loan system. This document is subject to frequent change.

a - De minimis values are zero. Currently available data do not support assignment of a "trivial" emission rate; therefore, the value assigned will be policy based.

b - The EPA relies on Code of Federal Regulations, title 40, part 61, subparts B and I, and Appendix E, and assigns a de minimis level based on an effective dose equivalent of 0.3 milliem per year for a seven-year exposure period that would result in a cancer risk of one per million. The individual radionuclides subject to de minimis levels are contained in Code of Federal Regulations, title 40, part 61.

7007.1350 CHANGES THAT CONTRAVENE CERTAIN PERMIT TERMS.

[For text of subp 1, see M.R.]

Subp. 2. **Procedure.** Changes authorized under this part may not be made until seven working days after the agency receives written notice of the change. The permittee must submit the notice in a format specified by the commissioner. The notice shall include a certification, consistent with part 7007.0500, subpart 3, by a responsible official describing the change to be made, identifying the term of the permit which is being contravened, stating that the change is authorized under this part, and briefly describing how it qualifies under this part. The permittee and the agency shall attach the notice to the stationary source's permit. If the agency finds that the proposed change is not authorized under this part, the agency shall notify the permittee of that finding and, if the proposed change could be made using other procedures, direct the permittee to those procedures.

[For text of subp 3, see M.R.]

7007.1400 ADMINISTRATIVE PERMIT AMENDMENTS.

Subpart 1. **Administrative amendments allowed.** The agency may make the permit amendments described in this subpart through the administrative permit amendment process described in this part. An owner or operator of a stationary source must apply for an administrative amendment if changes are to be made under item B or E:

[For text of items A to C, see M.R.]

D. an amendment to eliminate monitoring, record keeping, or reporting requirements if:

(1) the requirements are rendered meaningless because the only emissions to which the requirements apply will no longer occur;

(2) the requirements are technically incorrect and their elimination does not affect the accuracy of the data generated or of the monitoring information recorded or reported; or

(3) the emission unit to which the monitoring, record keeping, or reporting requirement applies no longer exists or has been permanently disabled from use at the stationary source;

[For text of item E, see M.R.]

F. an amendment to incorporate into a permit the requirements from preconstruction review permits issued by the agency;

[For text of items G to J, see M.R.]

K. an amendment to incorporate the extension of a deadline in a permit for construction authorization established under a new source review program under part C (Prevention of Significant Deterioration of Air Quality) of the act, provided the extension of the deadline for construction authorization has been approved by the commissioner prior to the submittal of the administrative amendment application.

Subp. 2. **Initiating an administrative amendment.** A permittee must submit an application for an administrative amendment in a format specified by the commissioner. The application must be certified by a responsible official in the manner provided in part 7007.0500, subpart 3. The permittee shall specify the section of the permit that is to be amended, and the reason for the amendment. The agency may also make an administrative amendment upon its own initiative. If an administrative amendment initiated by the agency would impose additional or different requirements on the permittee, the permittee shall be notified of the proposed amendment 30 days prior to its taking effect, unless the permittee consents to less notice. If the permittee objects to the amendment, the amendment shall not be made under this part, but the agency may reopen the permit under parts 7007.1500 and 7007.1600.

Subp. 3. **Timeline for final action.** The agency shall take no more than 60 days from receipt of an application for an administrative permit amendment to take final action on

the application. Amendments made by the agency under this part shall be made without public notice or an opportunity for public and affected states comment and hearing.

[For text of subps 4 to 6, see M.R.]

Subp. 7. **When permittee may make change.** Notwithstanding part 7007.0150, subpart 1, the permittee may make the change proposed in the administrative amendment application immediately after the application is received by the agency, if the change is described in subpart 1. However, if the change is of ownership or operational control, the new owner's or operator's right to operate the permitted stationary source under the previous sentence is contingent upon the new owner's or operator's compliance with the terms of the stationary source's permit.

7007.1500 MAJOR PERMIT AMENDMENTS.

Subpart 1. **Major permit amendment required.** A "major permit amendment" is required for any change to permit conditions or any modification at a permitted stationary source that is not allowed under parts 7007.1250 and 7007.1350 and for which an amendment cannot be obtained under the administrative permit amendment provisions of part 7007.1400, or the minor or moderate permit amendment provisions of part 7007.1450. The following always require major permit amendments:

A. any significant amendment to existing monitoring, reporting, or record keeping requirements in the permit other than:

(1) adding new requirements;

(2) eliminating the requirements if they are rendered meaningless because the only emissions to which the requirements apply will no longer occur;

(3) eliminating the requirements that are technically incorrect where the elimination does not affect the accuracy of the data generated or of the monitoring information recorded or reported; or

(4) eliminating the requirements for an emission unit that no longer exists or has been permanently disabled from use at the stationary source;

B. any amendment to establish or amend a permit condition that is based on a case-by-case determination of an emission limitation or other standard, on a source-specific determination of ambient impacts, or on a visibility or increment analysis;

[For text of items C to E, see M.R.]

[For text of subps 2 to 4, see M.R.]

7007.1600 PERMIT REOPENING AND AMENDMENT BY AGENCY.

Subpart 1. **Mandatory reopening.** The agency shall reopen and amend a permit when:

A. Additional federal applicable requirements become applicable to a stationary source with a remaining permit term of three or more years or with a permit which is nonexpiring. Such a reopening and amendment shall be completed not later than 18 months after promulgation of the federal applicable requirement. An affected permittee must submit a permit application as required under part 7007.0400, subpart 3, to provide the information needed to issue the amendment. No such reopening is required if the effective date of the requirement is later than the date on which the permit is due to expire.

[For text of items B to D, see M.R.]

[For text of subps 2 and 3, see M.R.]

7008.0100 DEFINITIONS.

[For text of subps 1 and 2, see M.R.]

Subp. 2a. **Material usage.** "Material usage" means an activity at a stationary source ~~when a material~~ such as ~~a~~ the application or use of ink, paint, coating, adhesive, or solvent ~~is applied or used~~ in a way that emits only VOC, hazardous air pollutants, particulate

matter, PM-10, PM-2.5, or a combination thereof and emissions of these pollutants can be calculated on a mass balance basis as described in part 7008.4100. Material usage does not include material processes such as sanding, milling, materials reacting to form new materials, fuel usage, or grain or other material handling.

Subp. 2b. **Recycling.** "Recycling" means the reclamation or reuse of waste VOC-containing or hazardous air pollutant-containing materials from material usage activities~~, as defined in part 7045.0020~~. For purposes of this subpart, "reclamation" has the meaning given in part 7045.0020, subpart 73c, and "reuse" has the meaning given in part 7045.0020, subpart 75a.

Subp. 2c. **Solids.** "Solids" means the nonvolatile portion of the material applied or used in a material usage activity.

[For text of subps 3 and 4, see M.R.]

Subp. 5. **Transfer efficiency.** "Transfer efficiency" means the ratio of the weight of ~~coating~~ solids ~~adhering~~ in the material that adheres to an object ~~being coated~~ to the total weight of ~~coating~~ solids in the material used in the application process. Transfer efficiency varies with the type of application method and is obtained from the application equipment manufacturer. If the manufacturer provides a range for the transfer efficiency, the transfer efficiency for calculating particulate matter, PM-10, and PM-2.5 emissions is the minimum specified in the range.

7008.4000 CONDITIONALLY INSIGNIFICANT ACTIVITIES.

If operated in compliance with this part and parts 7008.4100 and 7008.4110, the activities and operation of the emissions units listed in parts 7008.4100 and 7008.4110 are insignificant activities for purposes of parts 7007.0100 to 7007.1850. To qualify for the exemption from permitting in part 7007.0300, subpart 1, item D, subitem (2) or (3), the owner or operator of a stationary source that has the potential to emit any pollutant in excess of a permitting threshold in chapter 7007 must comply with the requirements

of parts 7008.4000 to 7008.4110. Listing in part 7008.4100 or 7008.4110 has no effect on any other law, including laws enforced by the agency other than parts 7007.0100 to 7007.1850, to which the activity may be subject.

The activities described in parts 7008.4100 and 7008.4110 must be listed in a permit application, and calculation of emissions from these activities shall be provided if required by the agency, under part 7007.0500, subpart 2, item C, subitem (2). If emissions units listed in part 7008.4100 or 7008.4110 are subject to additional requirements under section 114(a)(3) of the act (Monitoring Requirements) or section 112 of the act (Hazardous Air Pollutants), or if part of a title I modification, or, if accounted for, make a stationary source subject to a part 70 permit, emissions from the emissions units must be calculated in the permit application.

7008.4100 CONDITIONALLY INSIGNIFICANT MATERIAL USAGE.

Subpart 1. **Applicability.** This part applies to the owner or operator of a stationary source claiming material usage in coating and solvent cleaning operations as a conditionally insignificant activity. To qualify as a conditionally insignificant activity under this part, all material usage activities at the stationary source must be included in the limits under subpart 2. If lead is a component of any material usage activity at the stationary source, this part does not apply.

Subp. 2. **Material usage limits.** The owner or operator must ~~meet the limits in items A to C for~~ limit emissions from all material usage as provided in items A and B at the stationary source to qualify as a conditionally insignificant activity under this part.

A. VOCs. The owner or operator must limit VOC emissions ~~of VOCs from all material usage activities at the stationary source~~ to less than ~~200 gallons or~~ 2,000 pounds, or VOC usage to less than 200 gallons, in each calendar year period calculated according to the method in subpart 4. All VOC emissions from all material usage activities at the

stationary source must be accounted for in the annual calculation. This limit applies regardless of the hazardous air pollutant content of the VOC.

B. ~~The owner or operator must limit emissions of all hazardous air pollutants from all material usage activities at the stationary source to less than 200 gallons or 2,000 pounds in each calendar year period calculated according to the method in subpart 5. All hazardous air pollutant emissions from all material usage activities at the stationary source must be accounted for in the annual calculation.~~

~~C.~~ Particulate matter. The owner or operator must limit emissions of particulate matter, PM-10, and PM-2.5 to less than ~~2,000~~ 8,000 pounds each in each calendar year period calculated according to the method in subpart ~~6~~ 5. All particulate matter, PM-10, and PM-2.5 emissions from all material usage activities at the stationary source must be accounted for in the annual calculation. This limit applies regardless of the hazardous air pollutant content of the particulate matter.

Subp. 3. **Record keeping.** The owner or operator of a stationary source claiming material usage as a conditionally insignificant activity must:

A. maintain records for each calendar year of the number of gallons of VOC-containing materials purchased or used and the maximum VOC content of each material;

B. ~~maintain records for each calendar year of the number of gallons of hazardous air pollutant-containing materials purchased or used and the maximum hazardous air pollutant content of each material;~~

~~C.~~ B. maintain records for each calendar year of the number of gallons of solids-containing materials purchased or used and the maximum solids content of each material;

~~D.~~ C. maintain a record of the material safety data sheet (MSDS), or a signed statement from the supplier stating the maximum VOC content~~, the maximum hazardous air pollutant content,~~ and the maximum solids content for each material;

~~E.~~ D. if the owner or operator ships waste material from material usage activities off-site for recycling, keep records of the amount of material shipped off-site for recycling, the VOC content ~~and hazardous air pollutant content of the waste materials~~ shipped off-site for recycling, and the calculations done to determine the amount of VOC ~~and hazardous air pollutants~~ to subtract. Acceptable records include: the material safety data sheets, invoices, shipping papers, and/or hazardous waste manifests;

~~F.~~ E. if a material usage activity includes spray application of material and the owner or operator chooses to apply the transfer efficiency in calculations, maintain information on the type of spray application equipment and transfer efficiency; and

~~G.~~ F. if requested by the commissioner, calculate and record for any of the previous five calendar years:

(1) the VOC emissions using the method in subpart 4;

(2) ~~the hazardous air pollutant emissions using the method in subpart 5;~~

~~(3)~~ the particulate matter, PM-10, and PM-2.5 emissions using the method in subpart ~~6~~ 5;

~~(4)~~ (3) the calculation used to arrive at the total for each of subitems (1) ~~to (3)~~ and (2); and

~~(5)~~ (4) a list of the associated emissions units in which the material was used.

Subp. 4. **Calculating VOC emissions.** An owner or operator claiming material usage as a conditionally insignificant activity must calculate VOC emissions using one of the methods in item A or B. If the owner or operator ships waste material from material

usage activities off-site for recycling, the amount of VOC recycled may be subtracted from the amount of VOC calculated in item A or B:

A. gallons of VOC per calendar year equal gallons of VOC-containing material multiplied by the volume percentage of VOC; or

B. pounds of VOC per calendar year equal gallons of VOC-containing material purchased or used in a calendar year multiplied by the pounds of VOC per gallon or pounds of VOC-containing material purchased or used in a calendar year multiplied by weight percent of VOC.

~~Subp. 5. **Calculating total hazardous air pollutant emissions.** An owner or operator claiming material usage as a conditionally insignificant activity must calculate total hazardous air pollutant emissions using one of the methods in item A or B. If the owner or operator ships waste materials from material usage activities off-site for recycling, the amount of hazardous air pollutants recycled may be subtracted from the amount of total hazardous air pollutant calculated in item A or B:~~

~~A. gallons of hazardous air pollutants per calendar year equal gallons of hazardous air pollutant-containing material purchased or used in a calendar year multiplied by the volume percentage of hazardous air pollutants; or~~

~~B. pounds of hazardous air pollutants per calendar year equal gallons of hazardous air pollutant-containing material purchased or used in a calendar year multiplied by the pounds of hazardous air pollutants per gallon or pounds of hazardous air pollutant-containing material purchased or used in a calendar year multiplied by the weight percent of hazardous air pollutants.~~

Subp. ~~6~~ 5. **Calculating particulate matter, PM-10, and PM-2.5 emissions.** An owner or operator claiming material usage as a conditionally insignificant activity must calculate particulate matter, PM-10, and PM-2.5 emissions individually using one of the methods in item A or B:

A. pounds of particulate matter, PM-10, and PM-2.5 emissions per calendar year equal gallons of solids-containing material purchased or used in a calendar year multiplied by the pounds of solids per gallon; or

B. pounds of particulate matter, PM-10, and PM-2.5 emissions per calendar year equal pounds of solids-containing material purchased or used in a calendar year multiplied by weight percent of solids per gallon.

For material usage activities that involve spray application of materials, the owner or operator may apply a transfer efficiency in the calculation of particulate matter, PM-10, and PM-2.5 emissions by multiplying the result determined by item A or B by (1 - transfer efficiency).

7008.4110 CONDITIONALLY INSIGNIFICANT ~~FINISHING~~ PM AND PM-10 EMITTING OPERATIONS ~~THAT EMIT ONLY PM, PM-10, AND PM-2.5.~~

Subpart 1. **Applicability.** This part applies to ~~any~~ a stationary source claiming particulate matter (PM) or particulate matter of less than ten microns (PM10) venting equipment as a conditionally insignificant activity.

[For text of subp 2, see M.R.]

Subp. 3. **Monitoring and record keeping.** ~~An owner or operator of~~ A stationary source claiming ~~finishing operations that emit~~ PM~~,~~ or PM-10~~, or PM-2.5~~ venting equipment as a conditionally insignificant activity must:

A. operate the air cleaning system as required by the manufacturer's specification and part 7008.0200, item D;

B. inspect the air cleaning system as required by the manufacturer's specification;

C. maintain the air cleaning system according to the manufacturer's specification; and

D. maintain a record of inspection, maintenance, and repair activities for the air cleaning system for at least five years.

7009.0010 DEFINITIONS.

Subpart 1. **Scope.** For the purpose of parts 7009.0010 to 7009.0080, the following terms have the meanings given them.

Subp. 1a. **Averaging time.** "Averaging time" means the time period specified in part 7009.0080 over which air pollution concentration data are averaged in preparation for comparison to the ambient air quality standard. ~~The average is calculated by summing all data points for the time period and dividing by the number of data points.~~

Subp. 1b. **Form of the standard.** "Form of the standard" means the method used to determine whether ambient air quality pollutant concentrations exceed the numeric level of the applicable primary or secondary ambient air quality standard.

[For text of subps 2 and 3, see M.R.]

Subp. 4. **Total suspended particulate.** "Total suspended particulate" has the meaning given in Code of Federal Regulations, title 40, section 51.100 (ss), as amended.

7009.0020 PROHIBITED EMISSIONS.

No person shall emit any pollutant in such an amount or in such a manner as to cause or contribute to a violation of any Minnesota ambient air quality standard under part 7009.0080 beyond the person's property line, provided however, that in the event the general public has access to the person's property or portion thereof, the ambient air quality standards apply in those locations. The general public does not include employees or other categories of people who have been directly authorized by the property owner to enter or remain on the property for a limited period of time and for a specific purpose.

7009.0080 MINNESOTA AMBIENT AIR QUALITY STANDARDS.

The following table contains the state ambient air quality standards.

Air Pollutant	Level of Primary Standard	Level of Secondary Standard	Averaging Time	Form of the Standard
Hydrogen Sulfide	0.05 ppm by volume (70.0 micrograms per cubic meter)		30-minutes	30-minute average not to be exceeded more than two times in a year
	0.03 ppm by volume (42.0 micrograms per cubic meter)		30-minutes	30-minute average not to be exceeded more than two times in 5 consecutive days
Ozone	~~75~~ 70 ppb by volume (~~150~~ 137 micrograms per cubic meter)	Same as primary standard	8-hour	3-year average of the annual fourth high daily maximum 8-hour concentration does not exceed standard
Carbon Monoxide	9 ppm by volume (10 milligrams per cubic meter)		8-hour	Annual second-high 8-hour concentration does not exceed standard
	35 ppm by volume (40 milligrams per cubic meter)		1-hour	Annual second-high 1-hour concentration does not exceed standard
Sulfur Dioxide	30 ppb by volume (~~80~~ 79 micrograms per cubic meter)		Annual average	Annual average concentration does not exceed standard

	140 ppb (~~365~~ 367 micrograms per cubic meter)		24-hour	Annual second-high 24-hour concentration does not exceed standard
		500 ppb by volume (~~1,300~~ 1,310 micrograms per cubic meter)	3-hour	Annual second-high 3-hour concentration does not exceed the standard
	75 ppb (~~196~~ 197 micrograms per cubic meter)		1-hour	3-year average of the annual 99th-percentile of daily maximum 1-hour concentrations does not exceed standard
Total Suspended Particulate	75 micrograms per cubic meter	60 micrograms per cubic meter	Annual average	Annual ~~average~~ geometric mean concentration does not exceed standard
	260 micrograms per cubic meter	150 micrograms per cubic meter	24-hour	Annual second-high 24-hour concentration does not exceed standard
Nitrogen Dioxide	53 ppb by volume (100 micrograms per cubic meter)	Same as primary standard	Annual average	Annual average concentration does not exceed standard

	100 ppb by volume (188 micrograms per cubic meter)		1-hour	3-year average of the annual 98th-percentile of daily maximum 1-hour concentrations does not exceed standard
Lead	0.15 micrograms per cubic meter	Same as primary standard	Rolling 3-month average	Maximum 3-month rolling average from 3 consecutive years does not exceed the standard
PM-10	150 micrograms per cubic meter	Same as primary standard	24-hour	3-year average of the annual estimated exceedance days is less than or equal to 1
PM-2.5	35 micrograms per cubic meter	Same as primary standard	24-hour	3-year average of the annual 98th-percentile of 24-hour concentrations does not exceed the standard
	12.0 micrograms per cubic meter	15.0 micrograms per cubic meter	Annual average	3-year average of the annual ~~quarterly-~~ seasonally-weighted average does not exceed the standard

7009.0090 NATIONAL AMBIENT AIR QUALITY STANDARDS.

The following national ambient air quality standards, established pursuant to section 109 of the Clean Air Act, are adopted and incorporated by reference~~:~~. Interpretation of the standards and measurements made to determine compliance with these standards must be performed as specified in part 7009.0050:

A. sulfur dioxide (SO_2), Code of Federal Regulations, title 40, sections ~~50.4(b) and 50.5(a)~~ 50.4, 50.5, and 50.17, as amended;

B. PM-10, Code of Federal Regulations, title 40, section ~~50.6(a)~~ 50.6, as amended;

C. PM-2.5, Code of Federal Regulations, title 40, ~~section 50.7(a)~~ sections 50.13 and 50.18, as amended;

D. carbon monoxide (CO), Code of Federal Regulations, title 40, section ~~50.8(a)(1) and (2)~~ 50.8, as amended;

E. ozone (O_3), Code of Federal Regulations, title 40, sections ~~50.9(a) and 50.10 (a)~~ 50.9 and 50.19, as amended;

F. nitrogen dioxide (NO_2), Code of Federal Regulations, title 40, section ~~50.11 (a) and (b)~~ 50.11, as amended; and

G. lead (Pb), Code of Federal Regulations, title 40, section ~~50.12~~ 50.16, as amended.

7009.1060 TABLE 1.

	Alert	Warning	Emergency	Significant Harm
SO_2	300 ppb	600 ppb	800 ppb	1000 ppb
24 hr. avg.	800 $\mu g/m^3$	1600 $\mu g/m^3$	2100 $\mu g/m^3$	2620 $\mu g/m^3$
PM-10 24 hr. avg.	350 $\mu g/m^3$	420 $\mu g/m^3$	500 $\mu g/m^3$	600 $\mu g/m^3$

CO	15 ppm	30 ppm	40 ppm	50 ppm
8 hr. avg.	17 mg/m^3	34 mg/m^3	46 mg/m^3	57.5 mg/m^3
4 hr. avg.				86.3 mg/m^3
				75 ppm
1 hr. avg.				144 mg/m^3
				125 ppm
NO_2	150 ppb	300 ppb	400 ppb	500 ppb
24 hr. avg.	282 µg/m^3	565 µg/m^3	750 µg/m^3	938 µg/m^3
NO_2	600 ppb	1200 ppb	1600 ppb	2000 ppb
1 hr. avg.	1130 µg/m^3	2260 µg/m^3	3000 µg/m^3	3750 µg/m^3
Ozone	200 ppb	400 ppb	500 ppb	600 ppb
2 hr. avg.	400 µg/m^3	800 µg/m^3	1000 µg/m^3	1200 µg/m^3

7011.0065 APPLICABILITY.

Subpart 1. **Applicability.** The owner or operator of a stationary source ~~shall~~ must comply with parts 7011.0060 to 7011.0080 if the owner or operator elected to use the control equipment efficiencies for listed control equipment established pursuant to part 7011.0070 to calculate potential to emit, from emissions units that discharge through the listed control equipment, to:

[For text of items A to C, see M.R.]

D. qualify for registration permit option D under part 7007.1130;

E. qualify for a capped permit under parts 7007.1140 to 7007.1148; or

F. determine that a change triggers the notification requirement under part 7007.1150, item C, subitem (3).

Subp. 2. [Repealed, 32 SR 904]

7011.0070 LISTED CONTROL EQUIPMENT AND CONTROL EQUIPMENT EFFICIENCIES.

[For text of subp 1, see M.R.]

Subp. 1a. **Exceptions where control efficiency disallowed.** The owner or operator may not use a control efficiency listed in Table A if:

A. the commissioner determines that the listed efficiency is inapplicable or is not representative of the source due to complexity of the process or source of emissions, lack of reliable data, presence of a pollutant or constituent such as organic or inorganic condensable particulate matter or an organic compound significantly more difficult to control than the overall VOC gas stream that makes the categorical efficiency nonrepresentative, or other site-specific conditions; or

B. the commissioner determines that alternate site-specific requirements are necessary to ensure compliance with applicable requirements or to protect human health or the environment.

CONTROL EQUIPMENT EFFICIENCY - TABLE A

ID#	CONTROL EQUIPMENT DESCRIPTION	POLLUTANT	CONTROL EFFICIENCY		
			TOTAL ENCLOSURE	HOOD: CERTIFIED	HOOD: NOT CERTIFIED

Table A - Section 1 - Equipment Designed Primarily for Particulate Matter Control

	PM CONTROL CATEGORY-CYCLONES means a device where airflow is forced to spin in a vortex through a tube				
007	Centrifugal Collector (cyclone)-high efficiency means: a cyclonic device with parameters stated in drawing 1 and table 1	PM PM-10	90% 78%	72% 62%	54% 46%
008	Centrifugal Collector (cyclone)-medium efficiency means: a cyclonic device with parameters stated in drawing 1 and table 1	PM PM-10	80% 60%	64% 48%	48% 36%
009	Centrifugal Collector (cyclone)-low efficiency means: a cyclonic device with parameters stated in drawing 1 and table 1	PM PM-10	25% 25%	20% 20%	15% 15%
076	Multiple Cyclone without Fly Ash Reinjection means: a cyclonic device with more than one tube where fly ash is not reinjected	PM PM-10	90% 72%	72% 58%	54% 43%
057, 085	Wet Cyclone Separator or Cyclonic Scrubbers means: a cyclonic device that sprays water into a cyclone	PM, PM-10	84%	68%	51%
010, 011, 012, 146	PM CONTROL CATEGORY-ELECTROSTATIC PRECIPITATORS means: a control device in which the incoming particulate matter receives an electrical charge and is then collected on a surface with the opposite electrical charge				

	-assumed efficiency for boiler fly ash control	PM-10	40%	NA	NA
	-assumed efficiency for other applications	PM	98%	78%	59%
		PM-10	94%	75%	56%
	PM CONTROL CATEGORY - OTHER CONTROLS				
016, 017, 018	Fabric Filter means: a control device in which the incoming gas stream passes through a porous fabric filter forming a dust cake	PM	99%	79%	59%
		PM-10	93%	74%	56%
052	Spray Tower means: a control device in which the incoming gas stream passes through a chamber in which it contacts a liquid spray	PM	85%	68%	51%
		PM-10	84%	68%	51%
053	Venturi Scrubber means: a control device in which the incoming gas stream passes through a venturi into which a low pressure liquid is introduced	PM	94%	76%	57%
		PM-10	84%	68%	51%
055	Impingement Plate Scrubber means: a control device in which the incoming gas stream passes a liquid spray and is then directed at high velocity into a plate	PM	77%	62%	46%
		PM-10	77%	62%	46%
056, 113	Mechanically Aided Separator means: a device that relies on inertia for separating particles from a gas stream	PM	64%	52%	39%
		PM-10	5%	4%	3%

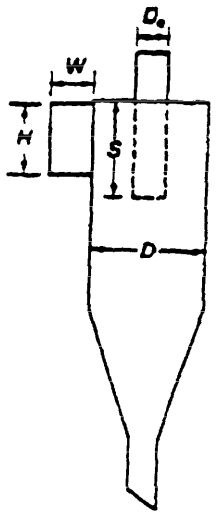
058, 086	Wall or Panel Filter means: a control device in which the exiting gas stream passes through a panel of coarse fibers. Other Wall Filters means removable panels for cleaning and replacement, or liquid curtains for particulate removal that provide little resistance to air flow	PM PM-10	85% 85%	68% 68%	51% 51%
101	HEPA Filter or ULPA Filter means: a high efficiency wall or panel filter designed for collection of submicron particles	PM PM-10	99.98% 99.98%	80% 80%	60% 60%
503	Charged Scrubber means: a control device in which electric power is used to precharge particulate matter in the gas stream as a means of increasing the scrubber's collection efficiency for fine particles	PM PM-10	94% 84%	76% 68%	57% 51%
517	Condensation Scrubber means: a control device in which steam is injected into a wet scrubber to create supersaturated conditions and promote condensation of water on fine particulate matter in the gas stream	PM PM-10	94% 84%	76% 68%	57% 51%

Table A - Section 2 - Equipment Designed for VOC Control (includes efficiencies for pollutants where there is a co-benefit of control)

VOC CONTROL CATEGORY

019, 020, 109	Catalytic Afterburners (catalytic oxidation) means: a device used to reduce VOCs to the products of combustion through catalytic (use of a catalyst) oxidation in a combustion chamber	VOC	94%	76%	57%
		PM	62%	50%	37%
		PM-10	62%	50%	38%
		CO	94%	76%	57%
021, 022, 131, 133	Thermal Afterburners (thermal oxidation) means: a device used to reduce VOCs to the products of combustion through thermal (high temperature) oxidation in a combustion chamber	VOC	97%	78%	58%
		PM	62%	50%	37%
		PM-10	62%	50%	37%
		CO	97%	78%	58%
023	Flaring or Direct Combustor means: a device in which air, combustible organic waste gases, and supplementary fuel (if needed) react in the flame zone (e.g., at the flare tip) to destroy the VOCs	VOC	98%	79%	59%
		PM	61%	50%	37%
		PM-10	61%	50%	37%
		CO	98%	79%	59%

Drawing 1



SOURCE: Lapple, 1951.

Table 1

Ratio Dimensions	Cyclone Type: High Efficiency	Medium Efficiency	Low Efficiency
Height of inlet, H/D	≤0.44	>0.44 and <0.8	≥0.8
Width of inlet, W/D	≤0.2	>0.2 and <0.375	≥0.375
Diameter of gas exit, D_e/D	≤0.4	>0.4 and <0.75	≥0.75
Length of vortex finder, S/D	≤0.5	>0.5 and <0.875	≥0.875

If one or more of the "ratio dimensions," as listed in table 1, are in a different efficiency category (high, medium, low), then the lowest efficiency category shall be applied.

[For text of subps 1b to 4, see M.R.]

7011.0080 MONITORING AND RECORD KEEPING FOR LISTED CONTROL EQUIPMENT.

The owner or operator of a stationary source ~~shall~~ must comply with the monitoring and record keeping required for listed control equipment by the table in this part. The owner or operator shall maintain the records required by this part for a minimum of five years from the date the record was made. Unless a specific format is required, the records may be maintained in either electronic or paper format. For certified hoods, the owner or operator shall comply with part 7011.0072.

Identification Number(s)	Pollution Control Equipment Type	Monitoring Parameter(s)	Record-keeping Requirement
A. Equipment designed for particulate matter control			
007, 008, 009, 076,	Centrifugal collector (cyclone)	Pressure drop	Record pressure drop every 24 hours if in operation

010, 011, 012, 146	Electrostatic precipitator	Voltage, secondary current, and, if used, conditioning agent flow rate	Continuous readout of voltage, and secondary current. If used, daily record of conditioning agent flow rate
016, 017	Fabric filter (bag house), high temperature (T>250°F), medium temperature (180°F> T<250°F)	Pressure drop	Record pressure drop every 24 hours if in operation
018	Fabric filter (bag house), low temperature (T<180°F)	Pressure drop or visible emissions observation from filter outlet during an entire cleaning cycle, unless the commissioner specifies pressure drop and/or visible emissions as the indicator(s) of fabric filter performance	Record pressure drop every 24 hours if in operation, or Record whether any visible emissions are observed and the time period of observation every 24 hours if in operation; or record both if the commissioner requires monitoring of both parameters
052	Spray tower	Liquid flow rate and pressure drop	Record each parameter every 24 hours if in operation
053, 055	Venturi scrubber, impingement plate scrubber	Pressure drop and liquid flow rate	Record each parameter every 24 hours if in operation
056, 113	Mechanically aided separator	Pressure drop	Record every 24 hours if in operation

058, 101	HEPA and other wall filters	Condition of the filters, including, but not limited to, alignment, saturation, and tears and holes	Record of filter(s) condition every 24 hours if in operation
057, 085	Wet cyclone separator	Pressure drop; and water pressure	Record each parameter every 24 hours if in operation
503	Charged scrubber	Pressure drop and liquid flow rate	Record each parameter every 24 hours if in operation
517	Condensation scrubber	Pressure drop and either steam supply rate or blowdown rate	Record each parameter every 24 hours if in operation

B. Equipment designed for volatile organic compound control

021, 022, 131, 133	Thermal afterburner	Combustion temperature or inlet and outlet temperatures	Record temperatures at least once every 15 minutes
019, 020, 109	Catalytic afterburner	Inlet and outlet temperatures; and catalyst bed reactivity as per manufacturer's specifications	Record temperatures or manual readings at least once every 15 minutes; and record results of catalyst bed reactivity
023	Flaring	Temperature indicating presence of a flame	Record temperatures at least once every 15 minutes

7011.0510 STANDARDS OF PERFORMANCE FOR EXISTING INDIRECT HEATING EQUIPMENT.

Subpart 1. **Particulate matter and sulfur dioxide.** No owner or operator of existing indirect heating equipment shall cause to be discharged into the atmosphere from said

equipment any gases that contain filterable particulate matter or sulfur dioxide in excess of the standards of performance shown in part 7011.0545.

[For text of subps 2 and 3, see M.R.]

7011.0515 STANDARDS OF PERFORMANCE FOR NEW INDIRECT HEATING EQUIPMENT.

Subpart 1. **Particulate matter, sulfur dioxide, and nitrogen oxides.** No owner or operator of new indirect heating equipment shall cause to be discharged into the atmosphere from said equipment any gases that contain filterable particulate matter, sulfur dioxide, or nitrogen oxides in excess of the standards of performance shown in part 7011.0550.

[For text of subps 2 and 3, see M.R.]

7011.0530 PERFORMANCE TEST METHODS.

Unless another method is approved by the commissioner, any person required to submit performance tests for indirect heating equipment must use the following test methods to demonstrate compliance:

A. Method 1 for selection of sampling site and sample traverses;

B. Method 3 for gas analysis;

C. Method 5 for concentration of filterable particulate matter and the associated moisture content;

D. Method 6 for concentration of SO_2;

E. Method 7 for concentration of NO_x; and

F. Method 9 for visual determination of opacity.

7011.0535 PERFORMANCE TEST PROCEDURES.

[For text of subps 1 and 2, see M.R.]

Subp. 3. **Method 5.** For Method 5, the sampling time for each run ~~shall~~ must be at least 60 minutes and the minimum sampling volume shall be 0.85 dscm (30 dscf) except that smaller sampling times or volumes, when necessitated by process variables or other factors, may be approved by the agency.

[For text of subps 4 to 9, see M.R.]

7011.0610 STANDARDS OF PERFORMANCE FOR FOSSIL-FUEL-BURNING DIRECT HEATING EQUIPMENT.

Subpart 1. **Particulate matter limitations.**

A. No owner or operator of any direct heating equipment shall cause to be discharged into the atmosphere from the direct heating equipment any gases that:

(1) contain the sum of filterable and organic condensable particulate matter in excess of the limits allowed by parts 7011.0700 to 7011.0735; or

[For text of subitem (2), see M.R.]

[For text of item B, see M.R.]

[For text of subp 2, see M.R.]

7011.0615 PERFORMANCE TEST METHODS.

Unless another method is approved by the agency, any person required to submit performance tests for direct heating equipment must use the following test methods to demonstrate compliance:

A. Method 1 for selection of sampling site and sample traverses;

B. Method 3 for gas analysis;

C. Method 5 for concentration of filterable particulate matter and the associated moisture content and Method 202 for concentration of organic condensable particulate matter;

D. Method 6 for concentration of SO_2; and

E. Method 9 for visual determination of opacity.

7011.0620 PERFORMANCE TEST PROCEDURES.

[For text of subps 1 and 2, see M.R.]

Subp. 3. **Sampling time for Methods 5 and 202.** For Methods 5 and 202, the sampling time for each run must be at least 60 minutes and the minimum sampling volume must be 0.85 dscm (30 dscf) except that owners or operators may, prior to testing, request approval from the commissioner for smaller sampling times or volumes, when necessitated by process variables or site-specific limitations.

[For text of subps 4 to 6, see M.R.]

7011.0710 STANDARDS OF PERFORMANCE FOR PRE-1969 INDUSTRIAL PROCESS EQUIPMENT.

Subpart 1. **Prohibited discharge of gases.** No owner or operator of any industrial process equipment that was in operation before July 9, 1969, shall cause to be discharged into the atmosphere from the industrial process equipment any gases that:

A. in any one hour contain the sum of filterable and organic condensable particulate matter in excess of the amount permitted in part 7011.0730 for the allocated process weight; provided that the owner or operator shall not be required to reduce the particulate matter emission below the concentration permitted in part 7011.0735 for the appropriate source gas volume; provided further that regardless of the mass emission permitted by part 7011.0730, the owner or operator shall not be permitted to emit the sum of filterable and organic condensable particulate matter in a concentration in excess of 0.30 grains per standard cubic foot of exhaust gas; or

[For text of item B, see M.R.]

[For text of subps 2 and 3, see M.R.]

7011.0715 STANDARDS OF PERFORMANCE FOR POST-1969 INDUSTRIAL PROCESS EQUIPMENT.

Subpart 1. **Prohibited discharge of gases.** No owner or operator of any industrial process equipment that was not in operation before July 9, 1969, shall cause to be discharged into the atmosphere from the industrial process equipment any gases that:

A. in any one hour contain the sum of filterable and organic condensable particulate matter in excess of the amount permitted in part 7011.0730 for the allocated process weight; provided that the owner or operator shall not be required to reduce the particulate matter emission below the concentration permitted in part 7011.0735 for the appropriate source gas volume; provided that regardless of the mass emission permitted by part 7011.0730, the owner or operator shall not be permitted to emit the sum of filterable and organic condensable particulate matter in a concentration in excess of 0.30 grains per standard cubic foot of exhaust gas; or

B. exhibit greater than 20 percent opacity.

[For text of subps 2 and 3, see M.R.]

7011.0720 PERFORMANCE TEST METHODS.

Unless another method is approved by the agency, any owner or operator required to submit performance tests for any industrial process equipment must use the following test methods to demonstrate compliance:

A. Method 1 for sample and velocity traverses;

B. Method 2 for velocity and volumetric flow rate;

C. Method 3 for gas analysis;

D. Method 5 for the concentration of filterable particulate matter and associated moisture content and Method 202 for the concentration of organic ~~condensibles~~ condensables; and

E. Method 9 for visual determination of the opacity of emissions from stationary sources.

7011.0905 STANDARDS OF PERFORMANCE FOR EXISTING HOT MIX ASPHALT PLANTS.

No owner or operator of an existing hot mix asphalt plant shall cause to be discharged into the atmosphere from the hot mix asphalt plant any gases that:

A. contain the sum of filterable and organic condensable particulate matter in excess of the limits allowed by parts 7011.0700 to 7011.0735; or

B. exhibit greater than 20 percent opacity.

7011.1105 STANDARDS OF PERFORMANCE FOR CERTAIN COAL HANDLING FACILITIES.

The owner or operator of any new coal handling facility, or an existing coal handling facility located within the Minneapolis-Saint Paul Air Quality Control Region or within the boundaries of the city of Duluth, ~~shall~~ must perform the following abatement measures unless otherwise exempt by portions of these parts:

[For text of items A to E, see M.R.]

F. Stockpiles, stockpile construction, and reclaiming.

(1) Control fugitive particulate emissions by dust suppression methods on such operations so that fugitive particulate emissions are minimized.

(2) In the alternative, use an underground bottom feed (plow) of coal to an underground conveyor system provided the exhaust gases from the enclosed spaces do not contain filterable particulate matter in excess of 0.020 grains per dry standard cubic foot (gr/dscf).

G. Enclosed coal handling facilities or emissions units not specifically covered by any other provision in parts 7011.1100 to 7011.1140. If exhaust gases from any

enclosed coal handling facility exceed 20 percent opacity, then the owner or operator of the facility must select and implement one of the following further controls:

(1) install exhaust air system and control exhaust gases so that filterable particulate emissions in such gases do not exceed 0.020 gr/dscf;

(2) control exhaust gases using dust suppression methods so that particulate emissions do not exhibit greater than 20 percent opacity.

[For text of items H and I, see M.R.]

7011.1115 STANDARDS OF PERFORMANCE FOR PNEUMATIC COAL-CLEANING EQUIPMENT AND THERMAL DRYERS AT ANY COAL HANDLING FACILITY.

Subpart 1. **Pneumatic coal-cleaning equipment.** The owner or operator of a coal handling facility shall not cause to be discharged into the atmosphere from any pneumatic coal-cleaning equipment any gases that:

A. contain filterable particulate matter in excess of 0.040 g/dscm (0.018 gr/dscf); or

B. exhibit ten percent opacity or greater.

Subp. 2. **Thermal dryers.** The owner or operator of a coal handling facility shall not cause to be discharged into the atmosphere from any thermal dryer any gases that:

A. contain filterable particulate matter in excess of 0.070 g/dscm (0.031 gr/dscf); or

B. exhibit 20 percent opacity or greater.

[For text of subps 3 and 4, see M.R.]

7011.1130 PERFORMANCE TEST METHOD.

Unless another method is approved by the commissioner, an owner or operator required to submit performance tests for coal handling facilities must use the following test methods to demonstrate compliance:

A. Method 1 for sample and velocity traverses;

B. Method 5 for the concentration of filterable particulate material and moisture content;

C. Method 9 for the visual determination of the opacity of emission from stationary sources.

7011.1135 PERFORMANCE TEST PROCEDURES.

Subpart 1. **In general.** Performance tests ~~shall~~ must be conducted according to the requirements of this part and parts 7017.2001 to 7017.2060.

Subp. 2. **Special procedures.** For Method 5, the sampling time for each run ~~shall~~ must be at least 60 minutes and the minimum sampling volume ~~shall~~ must be 0.85 dscm (30 dscf) except that owners or operators may, prior to testing, request approval from the commissioner for smaller sampling times or volumes, when necessitated by process variables or site-specific limitations. Sampling ~~shall~~ must not be started until at least 30 minutes after ~~start up~~ start-up and ~~shall~~ must be terminated before shutdown procedures commence. The owner or operator ~~shall~~ must eliminate cyclonic flow during performance tests.

7011.1227 TABLE 1.

The table in this part governs emission limitations for Class A and C waste combustor units. For acid gas limitations, either the applicable percent reduction or the parts per million by volume emission limitation, whichever is less stringent, is the emission limitation for the waste combustor.

	Class C	Class A
Particulate Matter		
Filterable		0.011 gr/dscf
The sum of filterable and organic condensable	0.020 gr/dscf	0.020 gr/dscf
PCDD/PCDF		
Total	500 ng/dscm	30 ng/dscm
Acid Gases:		
Hydrogen chloride	NA	95% control or 29 ppm
Sulfur dioxide	NA	75% control or 29 ppm
Carbon Monoxide		
Modular starved air	50 ppm	50 ppm
Modular excess air	50 ppm	50 ppm
Mass burn waterwall	100 ppm	100 ppm
Mass burn refractory	100 ppm	100 ppm
Mass burn rotary refractory	100 ppm	100 ppm
Mass burn rotary waterwall	250 ppm	250 ppm
Bubbling fluidized bed	100 ppm	100 ppm
Circulating fluidized bed	100 ppm	100 ppm
Pulverized coal/refuse-derived fuel mixed fuel-fired combustor	NA	150 ppm
Spreader stoker coal/refuse-derived fuel mixed fuel-fired combustor	NA	200 ppm
RDF stoker	150 ppm	200 ppm
Opacity	10%	10%
Mercury (short-term)		
For all waste combustors	100 µg/dscm or 85% removal	50 µg/dscm or 85% removal

Mercury (long-term)		
For all waste combustors except those combusting RDF in spreader stokers	60 µg/dscm or 85% removal	50 µg/dscm or 85% removal
Waste combustor units combusting RDF in spreader stokers (90-day test interval)	NA	30 µg/dscm or 85% removal
Waste combustor units combusting RDF in spreader stokers (12-month test interval)	NA	30 µg/dscm or 85% removal
Cadmium	NA	35 µg/dscm
Lead	NA	400 µg/dscm

7011.1229 TABLE 2.

The table in this part governs emission limitations for a Class II waste combustor. For acid gas limitations, either the applicable percent reduction or the parts per million by volume emission limitation, whichever is less stringent, is the emission limitation for the waste combustor.

Size	Class II
Particulate Matter	
Filterable	0.015 gr/dscf
The sum of filterable and organic condensable	0.020 gr/dscf
PCDD/PCDF	
(total)	30 ng/dscm
Acid Gases	
HCl	90% control or 25 ppm
SO_2	80% control or 30 ppm
Carbon monoxide	
Modular	50 ppm

Mass burn or fluidized bed	100 ppm
RDF stoker	150 ppm
Opacity	10%
NO_x	NA
Mercury (short-term)	
Modular	100 µg/dscm or 85% removal
Mass Burn	100 µg/dscm or 85% removal
RDF (90-day test interval)	50 µg/dscm or 85% removal
FBC	100 µg/dscm or 85% removal
Mercury (long-term)	
Modular	60 µg/dscm or 85% removal
Mass burn	60 µg/dscm or 85% removal
RDF (90-day test interval)	30 µg/dscm or 85% removal
FBC	60 µg/dscm or 85% removal
RDF (12-month test interval)	30 µg/dscm or 85% removal

7011.1231 TABLE 3.

The table in this part governs emission limitations for Class III waste combustors.

Size	Class III
Particulate Matter	
The sum of filterable and organic condensable	0.020 gr/dscf
PCDD/PCDF	
Total	60 ng/dscm
Carbon monoxide	
Modular	50 ppm
RDF	275 ppm
Opacity	10%
Mercury	

	Short-term	500 µg/dscm or 85% removal
	Long-term	300 µg/dscm or 85% removal

7011.1233 TABLE 4.

The table in this part governs emissions from Class IV waste combustors.

Use	Metal Recovery
Particulate Matter	
The sum of filterable and organic condensable	0.035 gr/dscf
Opacity	20%
Carbon Monoxide	50 ppm

7011.1265 REQUIRED PERFORMANCE TESTS, METHODS, AND PROCEDURES.

[For text of subp 1, see M.R.]

Subp. 2. **Performance test methods for criteria pollutants.** An owner or operator of a waste combustor required to conduct performance tests for particulate matter, sulfur dioxide, or nitrogen oxides ~~shall~~ must use test methods as described in items A to D.

A. For particulate matter, except that for Class I, II, A, and C waste combustors, the minimum sample volume ~~shall~~ must be 1.7 dscm, and the probe and filter holder heating systems in the sample train ~~shall~~ must be set to provide a gas temperature no greater than 160 degrees Celsius, plus or minus 14 degrees. For Class III and IV waste combustors, the minimum sample volume ~~shall~~ must be 0.85 dscm. Owners or operators may request approval for smaller sampling times or volumes from the commissioner prior to testing, when necessitated by process variables or site-specific limitations. An oxygen or carbon dioxide measurement ~~shall~~ must be obtained simultaneously with each Method

5 test run for particulate matter. Particulate matter emissions, expressed in gr/dscf, ~~shall~~ must be corrected to seven percent oxygen by using the following formula:

$$c_7 = \frac{14c}{(21-\%O_2)}$$

where: c_7 is the concentration of particulate matter corrected to seven percent oxygen;

c is the concentration of particulate matter as measured by Code of Federal Regulations, title 40, part 60, Appendix A-3, Method 5 and Code of Federal Regulations, title 40, part 51, Appendix M, Method 202; and

$\%O_2$ is the percentage of oxygen as measured by Code of Federal Regulations, title 40, part 60, Appendix A-2, Method 3, as amended.

(1) Filterable particulate matter emission is the concentration of particulate matter as measured by Code of Federal Regulations, title 40, part 60, Appendix A-3, Method 5, as amended.

(2) The sum of filterable and organic condensable particulate matter is the concentration of particulate matter as described in part 7017.2060, subpart 3, item B.

For each sample run employing Method 5 as provided in Appendix A-3 of Code of Federal Regulations, title 40, part 60, ~~Appendix A-3, Method 5,~~ as amended, ~~run,~~ the emission rate ~~shall~~ must be determined using:

(a) oxygen or carbon dioxide measurements;

(b) dry basis F factor; and

(c) dry basis emission rate calculation procedures in Code of Federal Regulations, title 40, part 60, Appendix A-7, Method 19, as amended.

[For text of items B to D, see M.R.]

[For text of subps 3 to 11, see M.R.]

7011.1270 PERFORMANCE TEST, WASTE COMPOSITION STUDY, AND ASH SAMPLING FREQUENCY.

The owner or operator of a waste combustor shall conduct the performance tests required in part 7011.1265, subpart 5, based on the schedules in items A to E.

A. Class A waste combustors shall conduct performance tests as described in subitems (1) to (6).

[For text of subitems (1) to (4), see M.R.]

(5) From Class A waste combustors that are not burning RDF, for mercury emissions every three months.

The facility may implement testing for mercury not less than once every 12 months under the following conditions: the facility has demonstrated that mercury emissions have been below 50 percent of the facility's permitted long-term limit for three consecutive years~~; and the owner or operator has submitted a request for an administrative amendment according to the procedures of part 7007.1400~~.

Waste combustors combusting RDF may choose to conduct performance tests for mercury every 12 months. If a test shows that an emission limit for mercury from a waste combustor combusting RDF is exceeded, the commissioner shall require testing every three months thereafter until compliance with the standard is demonstrated.

(6) A waste composition study every five years.

B. Class II and C waste combustors shall conduct performance tests as described in subitems (1) to (4).

(1) Once within the normal start-up, except as provided in subitem (3)~~(b)~~.

[For text of subitem (2), see M.R.]

(3) For mercury emissions, Class C waste combustors shall commence testing June 20, 1995, and continue testing every 90 days until August 1, 1997. Thereafter,

Class C waste combustors that are not burning RDF shall conduct mercury emissions testing every three months.

The facility may implement testing for mercury not less than once every three years or according to federal applicable requirements, whichever is more stringent, under the following conditions: the facility has demonstrated that mercury emissions have been below 50 percent of the facility's permitted long-term limit for three consecutive years~~;~~ ~~and the owner or operator has submitted a request for an administrative amendment according to the procedures of part 7007.1400~~.

If a facility is granted testing for mercury not less than once every three years or according to federal applicable requirements, whichever is more stringent, and a mercury performance test shows mercury emissions greater than 50 percent of the facility's permitted mercury limit, the facility shall conduct annual mercury stack sampling until emissions are below 50 percent of the facility's permitted mercury limit. Once the facility demonstrates that mercury emissions are again below 50 percent of the facility's permitted limit, the facility may resume testing every three years, upon notifying the commissioner in writing.

Waste combustors combusting RDF may choose to conduct performance tests for mercury emissions every 12 months. If a test shows that emission limits for mercury from a waste combustor combusting RDF are exceeded, the commissioner shall require performance testing every three months until compliance is demonstrated.

(4) A waste composition study every five years.

C. Class III and D waste combustors shall conduct performance tests as described in subitems (1) to (6).

[For text of subitems (1) and (2), see M.R.]

(3) For Class III waste combustors, emissions of mercury, every three months.

The facility may implement testing for mercury not less than once every three years or according to federal applicable requirements, whichever is more stringent, under the following conditions: the facility has demonstrated that mercury emissions have been below 50 percent of the facility's permitted long-term limit for three consecutive years~~;~~ ~~and the owner or operator has submitted a request for an administrative amendment according to the procedures of part 7007.1400~~.

If a facility is granted testing for mercury not less than once every three years or according to federal applicable requirements, whichever is more stringent, and mercury performance test shows mercury emissions greater than 50 percent of the facility's permitted mercury limit, the facility shall conduct annual mercury stack sampling until emissions are below 50 percent of the facility's permitted mercury limit. Once the facility demonstrates that mercury emissions are again below 50 percent of the facility's permitted limit, the facility may resume testing every three years, upon notifying the commissioner in writing.

[For text of subitems (4) to (6), see M.R.]

[For text of item D, see M.R.]

E. Class I waste combustors shall conduct performance tests for mercury emissions every three months for waste combustors that are not burning RDF.

The facility may implement testing for mercury not less than once every 12 months under the following conditions: the facility has demonstrated that mercury emissions have been below 50 percent of the facility's permitted long-term limit for three consecutive years~~; and the owner or operator has submitted a request for an administrative amendment according to the procedures of part 7007.1400~~.

Waste combustors combusting RDF may choose to conduct performance tests for mercury every 12 months. If a test shows that an emission limit for mercury from a waste combusting RDF is exceeded, the commissioner shall require testing every three months thereafter until compliance with the standard is demonstrated.

Class I waste combustors shall conduct a waste composition study every five years.

7011.1280 OPERATOR CERTIFICATION.

[For text of subps 1 to 4, see M.R.]

Subp. 5. **Examinations.**

A. The commissioner must approve an examination for the different classes of waste combustors and must not delegate this responsibility. The examination must be administered as a written closed book examination.

[For text of items B to E, see M.R.]

[For text of subp 6, see M.R.]

Subp. 7. **Renewal.**

A. A certified individual shall apply for certificate renewal no later than 30 days prior to certificate expiration. The application for renewal must include evidence that the person has, during the preceding three years, earned credit for attending training courses in the direct operation and maintenance of and environmental compliance for a waste combustor, including personnel training described in part 7011.1275, for the number of hours as identified as follows:

(1) Class I, II, III, A, or C, ~~or D,~~ 24 hours; and

(2) Class IV, eight hours.

An individual whose certificate has expired must comply with item B or C to renew the certificate.

B. If an individual applies for certificate renewal within one year following the expiration of the certificate, ~~the commissioner may renew the certificate without examination. To be recertified without an examination,~~ the individual must meet the training requirements of item A or subpart 3 at the time of application for renewal before

the certificate will be renewed without an examination. ~~If the individual does not have training to meet the requirements of item A, the individual must comply with subpart 3.~~

C. If an individual applies for certificate renewal more than one year following the expiration of the certificate, the individual is eligible for recertification when the individual complies with subpart 3.

Subp. 8. [See repealer.]

[For text of subps 9 and 10, see M.R.]

Subp. 11. **Record keeping.** A waste combustor owner or operator shall maintain a record of personnel who complete either the Environmental Protection Agency municipal waste combustor operator training course, or an equivalent course. The record shall include documentation of training completion.

7011.1282 CERTIFIED MUNICIPAL WASTE COMBUSTOR EXAMINER CERTIFICATE.

[For text of subp 1, see M.R.]

Subp. 2. **Certification process for a certified municipal waste combustor examiner.**

A. When the commissioner determines that the applicant has submitted a complete application, and has determined that the applicant has demonstrated a satisfactory compliance history as an operator at a municipal waste combustor, the commissioner shall schedule an oral examination of the applicant.

[For text of item B, see M.R.]

Subp. 3. **Examination for certified municipal waste combustor examiner.**

[For text of items A and B, see M.R.]

C. The board of examiners consists of three members. The three members are a member of the municipal waste combustor industry, a member who is or has been employed at a power operation facility using combustion or air pollution control technologies comparable to the facility where the applicant is employed, and a member able to discharge the functions of the board of examiners, under the conditions specified by the commissioner.

The commissioner may appoint additional board members if the facility for which the applicant seeks certification is complex and the commissioner determines that additional examiners will help the board determine the applicant's technical knowledge, problem-solving ability, and understanding of plant operations.

Additional Pollution Control Agency representatives, a representative from the facility, a representative of an industry trade group, or a member of the public shall be allowed by the commissioner to observe the examination.

[For text of subps 4 and 5, see M.R.]

7011.1305 STANDARDS OF PERFORMANCE FOR EXISTING SEWAGE SLUDGE INCINERATORS.

No owner or operator of an existing sewage sludge incinerator shall allow to be discharged into the atmosphere from the sewage sludge incinerator any gases that:

A. contain filterable particulate matter in excess of 0.3 gr/dscf corrected to 12 percent CO_2 if the incinerator has a burning capacity of less than 200 pounds per hour;

B. contain filterable particulate matter in excess of 0.2 gr/dscf corrected to 12 percent CO_2 if the incinerator has a burning capacity of 200 to 2,000 pounds per hour;

C. contain filterable particulate matter in excess of 0.1 gr/dscf corrected to 12 percent CO_2 if the incinerator has a burning capacity of greater than 2,000 pounds per hour.

No owner or operator of an existing sewage sludge incinerator shall cause to be discharged into the atmosphere from the incinerator any gases that exhibit greater than 20

percent opacity, except for one six-minute period per hour of not more than 33 percent opacity. An exceedance of this opacity standard occurs whenever any one-hour period contains two or more six-minute periods during which the average opacity exceeds 20 percent or whenever any one-hour period contains one or more six-minute periods during which the average opacity exceeds 33 percent.

No owner or operator of an existing sewage sludge incinerator shall operate the incinerator unless the incinerator uses auxiliary fuel burners that maintain a minimum temperature of 1,200 degrees Fahrenheit for a minimum retention time of 0.3 second or other method of odor control as approved by the commissioner.

For the purposes of this part, "existing sewage sludge incinerator" means a sewage sludge incinerator on which construction, modification, or reconstruction did not commence after June 11, 1973.

7011.1310 STANDARDS OF PERFORMANCE FOR NEW SEWAGE SLUDGE INCINERATORS.

No owner or operator of a new sewage sludge incinerator shall allow to be discharged into the atmosphere from the incinerator any gases that:

A. contain filterable particulate matter in excess of 0.65 g/kg dry sludge input (1.30 lb/ton dry sludge input); or

B. exhibit 20 percent opacity or greater.

No owner or operator of a new sewage sludge incinerator shall operate the incinerator unless the incinerator uses auxiliary fuel burners that maintain a minimum temperature of 1,200 degrees Fahrenheit for a minimum retention time of 0.3 second or other method of odor control as approved by the commissioner.

For the purposes of this part, "new sewage sludge incinerator" means a sewage sludge incinerator on which construction, modification, or reconstruction commenced after June 11, 1973.

7011.1320 PERFORMANCE TEST METHODS.

Unless another method is approved by the agency, an owner or operator required to submit performance tests for a sewage sludge incinerator must use the following test methods to demonstrate compliance:

A. Method 1 for sample and velocity traverses;

B. Method 2 for volumetric flow rate;

C. Method 3 for gas analysis; and

D. Method 5 for concentration of filterable particulate matter and associated moisture content.

7011.1400 DEFINITIONS.

[For text of subps 1 to 10, see M.R.]

Subp. 11. **Process gas.** "Process gas" means any gas generated by a petroleum refinery process unit, except fuel gas.

Subp. 12. [See repealer.]

[For text of subps 13 and 14, see M.R.]

7011.1405 STANDARDS OF PERFORMANCE FOR EXISTING AFFECTED FACILITIES AT PETROLEUM REFINERIES.

Subpart 1. **Fluid catalytic cracking unit catalyst regenerator and incinerator-waste heat boiler.** No owner or operator of an existing fluid catalytic cracking unit catalyst regenerator or its incinerator-waste heat boiler at a petroleum refinery shall allow to be discharged into the atmosphere from the regenerator or its incinerator-waste heat boiler any gases that:

A. contain filterable particulate matter in excess of 10.0 lb/1000 lb (10.0 kg/1000 kg) of coke burn-off in the catalyst regenerator; or

[For text of item B, see M.R.]

Subp. 2. **Fuel gas combustion device and indirect heating equipment.** Flares subject to the conditions of Code of Federal Regulations, title 40, part 60, subpart Ja, are not subject to the limits of this subpart. No owner or operator of existing fuel gas combustion devices and indirect heating equipment at a petroleum refinery shall cause to be discharged into the atmosphere from such devices and equipment any gases which contain sulfur dioxide in excess of 1.75 pounds per million Btu (3.15 grams per million cal) heat input. The total emissions of sulfur dioxide from all existing fuel gas combustion devices and all indirect heating equipment shall be divided by the total heat input of all such devices and equipment to determine compliance with this section; provided that no owner or operator shall cause to be discharged from any one fuel gas combustion device or any one unit of indirect heating equipment any gases which contain sulfur dioxide in excess of 3.0 pounds per million Btu (5.4 grams per million cal) heat input.

Subp. 3. **Indirect heating equipment.** The standards of performance in parts 7011.0500 to 7011.0530 for indirect heating equipment do not apply to indirect heating equipment at a petroleum refinery. Only the standards of performance for indirect heating equipment in this part apply to indirect heating equipment. No owner or operator of existing indirect heating equipment at a petroleum refinery shall allow to be discharged into the atmosphere from the equipment any gases that:

A. contain filterable particulate matter in excess of 0.4 pounds per million Btu (0.72 grams per million cal) heat input; or

[For text of item B, see M.R.]

[For text of subp 4, see M.R.]

7011.1410 STANDARDS OF PERFORMANCE FOR NEW AFFECTED FACILITIES AT PETROLEUM REFINERIES.

Subpart 1. **Fluid catalytic cracking unit catalyst regenerator and incinerator-waste heat boiler.** No owner or operator of a new fluid catalytic cracking unit catalyst regenerator or its incinerator-waste heat boiler at a petroleum refinery shall allow to be discharged into the atmosphere from the regenerator or incinerator-waste heat boiler any gases that:

A. contain filterable particulate matter in excess of 1.0 lb/1000 lb (1.0 kg/1000 kg) of coke burn-off in the catalyst regenerator; or

[For text of item B, see M.R.]

Subp. 2. **Fuel gas combustion device.** Flares subject to the conditions of Code of Federal Regulations, title 40, part 60, subpart Ja, are not subject to the limits of this subpart. No owner or operator of a new fuel gas combustion device at a petroleum refinery shall burn in any such device any fuel gas which contains H_2S in excess of 0.10 gr/dscf, (230 mg/dscm) except as provided herein. The owner or operator may elect to treat the gases resulting from the combustion of fuel gas in a manner which limits the release of SO_2 to the atmosphere if it is shown to the satisfaction of the commissioner that this prevents SO_2 emissions as effectively as compliance with the H_2S restriction set forth above.

Subp. 3. **Indirect heating equipment.** The standards of performance in parts 7011.0500 to 7011.0530 for indirect heating equipment do not apply to indirect heating equipment at a petroleum refinery. Only the standards of performance for indirect heating equipment in this subpart apply to indirect heating equipment.

[For text of item A, see M.R.]

B. No owner or operator of new indirect heating equipment at a petroleum refinery shall allow to be discharged into the atmosphere from the equipment any gases that:

(1) contain filterable particulate matter in excess of 0.4 pounds per million Btu (0.72 grams per million cal) heat input; or

[For text of subitem (2), see M.R.]

C. The owner or operator of a new steam generating unit of more than 250 million Btu per hour (63 million cal per hour) heat input at a petroleum refinery shall comply with the following requirements:

(1) No gases shall be discharged from the steam generating unit that contain filterable particulate matter in excess of 0.1 pounds per million Btu (0.18 grams per million cal) heat input.

[For text of subitems (2) and (3), see M.R.]

[For text of subp 4, see M.R.]

7011.1425 PERFORMANCE TEST METHODS.

Subpart 1. **In general.** Unless another method is approved by the commissioner, a person required to submit performance tests for a petroleum refinery must use the test methods in this part to demonstrate compliance.

Subp. 2. **Gases released to atmosphere from fluid catalytic cracking unit catalyst regenerator.** For gases released to the atmosphere from the fluid catalytic cracking unit catalyst regenerator:

A. Method 1 for sample and velocity traverses;

B. Method 2 for velocity and volumetric flow rate;

C. Method 5 for the concentration of filterable particulate matter and moisture content;

D. Method 9 for visual determination of the opacity of emissions from stationary sources;

E. Method 10 for carbon monoxide.

[For text of subps 3 and 4, see M.R.]

Subp. 5. **Gases to atmosphere from combustion.** For gases released to the atmosphere from the combustion of fuel gas, fossil fuel, and the combination of fuel gas and fossil fuel:

A. Method 1 for sample and velocity traverses;

B. Method 2 for velocity and volumetric flow rate;

C. Method 5 for the concentration of filterable particulate matter and moisture content;

D. Method 6 for concentration of SO_2;

E. Method 9 for visual determination of the opacity of emissions from stationary sources.

7011.1435 INCORPORATION BY REFERENCE OF NEW SOURCE PERFORMANCE STANDARDS ~~BY REFERENCE~~.

The following New Source Performance Standards are adopted and incorporated by reference:

A. Code of Federal Regulations, title 40, part 60, subpart J, as amended, entitled "Standards of Performance for Petroleum Refineries," except that decisions made by the administrator under Code of Federal Regulations, title 40, sections 60.105(a)(13)(iii) and 60.106(i)(12), are not delegated to the commissioner and must be made by the administrator.

B. Code of Federal Regulations, title 40, part 60, subpart GGG, as amended, entitled "Standards of Performance for Equipment Leaks of VOC in Petroleum Refineries," except that decisions made by the administrator under Code of Federal Regulations, title 40, section 60.592(c), are not delegated to the commissioner and must be made by the administrator.

C. Code of Federal Regulations, title 40, part 60, subpart QQQ, as amended, entitled "Standards of Performance for VOC Emissions from Petroleum Refinery Wastewater Systems," except that decisions made by the administrator under Code of Federal Regulations, title 40, section 60.694, are not delegated to the commissioner and must be made by the administrator.

D. Code of Federal Regulations, title 40, part 60, subpart Ja, as amended, entitled "Standards of Performance for Petroleum Refineries for Which Construction, Reconstruction, or Modification Commenced After May 14, 2007," except that decisions made by the administrator under Code of Federal Regulations, title 40, section 60.109a(b), are not delegated to the commissioner and must be made by the administrator.

E. Code of Federal Regulations, title 40, part 60, subpart GGGa, as amended, entitled "Standards of Performance for Equipment Leaks of VOC at Petroleum Refineries for Which Construction, Reconstruction, or Modification Commenced After November 7, 2006."

7011.1730 INCORPORATION BY REFERENCE OF NEW SOURCE PERFORMANCE STANDARDS ~~BY REFERENCE~~.

A. Code of Federal Regulations, title 40, part 60, subpart G, as amended, entitled "Standards of Performance for Nitric Acid Plants," is adopted and incorporated by reference.

B. Code of Federal Regulations, title 40, part 60, subpart Ga, as amended, entitled "Standards of Performance for Nitric Acid Plants for Which Construction, Reconstruction, or Modification Commenced After October 14, 2011," is incorporated by reference.

7011.1905 STANDARDS OF PERFORMANCE FOR SECONDARY BRASS AND BRONZE INGOT PRODUCTION PLANTS.

No owner or operator of a secondary brass or bronze ingot production plant shall allow to be discharged into the atmosphere from a reverberatory furnace any gases that:

A. contain filterable particulate matter in excess of 50 mg/dscm (0.022 gr/dscf);

[For text of item B, see M.R.]

7011.1910 PERFORMANCE TEST METHODS.

Unless another method is approved by the agency, an owner or operator required to submit performance tests for a brass or bronze ingot production plant must use the following test methods to demonstrate compliance:

A. Method 1 for sample and velocity traverses;

B. Method 2 for velocity and volumetric flow rate;

C. Method 3 for gas analysis;

D. Method 5 for the concentration of filterable particulate matter and the associated moisture content.

7011.2005 STANDARDS OF PERFORMANCE FOR IRON AND STEEL PLANTS.

No owner or operator of an iron and steel plant shall allow to be discharged into the atmosphere from any basic oxygen process furnace any gases that contain filterable particulate matter in excess of 50 mg/dscm (0.022 gr/dscf).

7011.2010 PERFORMANCE TEST METHODS.

Unless another method is approved by the agency, an owner or operator required to submit performance tests for an iron and steel plant must use the following test methods to demonstrate compliance:

A. Method 1 for sample and velocity traverses;

B. Method 2 for volumetric flow rate;

C. Method 3 for gas analysis;

D. Method 5 for concentration of filterable particulate matter and associated moisture content.

7011.2300 STANDARDS OF PERFORMANCE FOR STATIONARY INTERNAL COMBUSTION ENGINES.

[For text of subp 1, see M.R.]

Subp. 2. **Sulfur dioxide.**

A. No owner or operator of a stationary internal combustion engine shall allow to be discharged into the atmosphere from the engine any gases that contain sulfur dioxide in excess of 0.5 pounds per million Btu actual heat input unless an alternative limit is established in an air emission permit after demonstration through modeling of compliance with the sulfur dioxide standards in part 7009.0080.

B. No later than January 31, 2018, owners or operators of a stationary internal combustion engine must not allow any gases that contain sulfur dioxide in excess of 0.0015 pounds per million Btu actual heat input to be discharged into the atmosphere from the engine unless the agency establishes an alternative sulfur dioxide emission limit in an air emission permit that includes a demonstration through modeling of compliance with the sulfur dioxide standards in part 7009.0080.

[For text of subp 3, see M.R.]

7011.2375 INCORPORATION BY REFERENCE OF NEW SOURCE PERFORMANCE STANDARD FOR STATIONARY COMBUSTION TURBINES.

Code of Federal Regulations, title 40, part 60, subpart KKKK, as amended, entitled "Standards of Performance for Stationary Combustion Turbines," is adopted and incorporated by reference, except that decisions made by the administrator under Code of Federal Regulations, title 40, section 60.737(b), are not delegated to the commissioner and must be made by the administrator.

7011.2450 STANDARDS OF PERFORMANCE FOR NEW KRAFT PULP MILLS.

A. Code of Federal Regulations, title 40, part 60, subpart BB, as amended, entitled "Standards of Performance for Kraft Pulp Mills," is adopted and incorporated by reference.

B. Code of Federal Regulations, title 40, part 60, subpart BBa, as amended, entitled "Standards of Performance for Kraft Pulp Mill Affected Sources for Which Construction, Reconstruction, or Modification Commenced After May 23, 2013," is adopted and incorporated by reference.

7011.2900 INCORPORATION BY REFERENCE OF NEW SOURCE PERFORMANCE STANDARDS ~~BY REFERENCE~~.

The following New Source Performance Standards are adopted and incorporated by reference:

A. Code of Federal Regulations, title 40, part 60, subpart VV, as amended, entitled "Standards of Performance for Equipment Leaks of VOC in the Synthetic Organic Chemicals Manufacturing Industry," except that decisions made by the administrator under Code of Federal Regulations, title 40, section 60.482-1(c)(2), are not delegated to the commissioner and must be made by the administrator.

B. Code of Federal Regulations, title 40, part 60, subpart III, as amended, entitled "Standards of Performance for Volatile Organic Compound (VOC) Emissions from the Synthetic Organic Chemical Manufacturing Industry (SOCMI) Air Oxidation Unit Processes," except that decisions made by the administrator under Code of Federal Regulations, title 40, section 60.613(e), are not delegated to the commissioner and must be made by the administrator.

C. Code of Federal Regulations, title 40, part 60, subpart NNN, as amended, entitled "Standards of Performance for Volatile Organic Compound (VOC) Emissions From Synthetic Organic Chemical Manufacturing Industry (SOCMI) Distillation

Operations," except that decisions made by the administrator under Code of Federal Regulations, title 40, section 60.663(e), are not delegated to the commissioner and must be made by the administrator.

D. Code of Federal Regulations, title 40, part 60, subpart VVa, as amended, entitled "Standards of Performance for Equipment Leaks of VOC in the Synthetic Organic Chemicals Manufacturing Industry for Which Construction, Reconstruction, or Modification Commenced After November 7, 2006." With this incorporation, reporting requirements of Code of Federal Regulations, title 40, section 60.487a, remain unchanged.

7011.7050 INDUSTRIAL, COMMERCIAL, AND INSTITUTIONAL BOILERS AND PROCESS HEATERS; MAJOR SOURCES.

Code of Federal Regulations, title 40, part 63, subpart DDDDD, as amended, entitled "National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers and Process Heaters," is incorporated by reference, except that the authorities identified in Code of Federal Regulations, title 40, section ~~63.313(d)~~ 63.7570(b), are not delegated to the commissioner and are retained by the administrator.

7011.7185 GASOLINE DISPENSING FACILITIES.

Code of Federal Regulations, title 40, part 63, subpart CCCCCC, as amended, entitled "National Emission Standards for Hazardous Air Pollutants for Source Category: Gasoline Dispensing Facilities," is adopted and incorporated by reference, except that the authorities identified in Code of Federal Regulations, title 40, part 63.11131 (c), are not delegated to the commissioner and are retained by the administrator.

~~**7011.7630 PORTLAND CEMENT KILNS.**~~

~~Code of Federal Regulations, title 40, part 63, subpart LLL, as amended, entitled "National Emission Standards for Hazardous Air Pollutants From the Portland Cement Manufacturing Industry," is adopted and incorporated by reference, except that the~~

~~decisions made by the administrator under Code of Federal Regulations, title 40, section 63.1358 (c), are not delegated to the commissioner and must be made by the administrator.~~

7017.1002 DEFINITIONS.

[For text of subps 1 to 7, see M.R.]

Subp. 7a. **Grace period.** "Grace period" applies to monitor quality control audits and means a period of unit or stack operating hours beginning with the first unit or stack operating hour following the calendar quarter in which an audit was due. All operating hours apply toward the grace period regardless of whether the hours are consecutive.

[For text of subps 8 to 11, see M.R.]

Subp. 11a. **Quality assurance operating quarter.** "Quality assurance operating quarter" or "QA operating quarter" means a calendar quarter in which there are at least 168 unit operating hours.

[For text of subp 12, see M.R.]

Subp. 13. **Stack operating hour.** "Stack operating hour" means a clock hour during which flue gases flow through a particular stack or duct for the entire hour or for any part of the hour. Clock hour has the meaning given in Code of Federal Regulations, title 40, section 60.13 (h)(2)(i), as amended.

Subp. 14. **Unit operating hour.** "Unit operating hour" means a clock hour during which an emission unit operates for the entire hour or for any part of the hour. Clock hour has the meaning given in Code of Federal Regulations, title 40, section 60.13 (h)(2)(i), as amended.

7017.1080 CERTIFICATION TEST REPORT REQUIREMENTS.

Subpart 1. **Report required.** The owner or operator of the emission facility must prepare and submit a certification test report in a format specified by the commissioner. A report must be submitted for any certification test that was required, whether or not the test

data indicate compliance with the appropriate performance specifications, and whether or not the test was completed according to the approved test plan.

[For text of subp 2, see M.R.]

Subp. 3. [See repealer.]

[For text of subp 4, see M.R.]

7017.1110 EXCESS EMISSIONS REPORTS.

[For text of subp 1, see M.R.]

Subp. 2. **Contents of excess emissions report.** The excess emissions report must contain the information in items A to E.

[For text of items A to C, see M.R.]

D. Summary of the cylinder gas audit and relative accuracy test audit required by parts 7017.1180 and 7017.1220 if the audits were completed in the previous quarter.

E. If applicable, notifications of exceptions of applicability from audit frequencies as allowed in parts 7017.1170, subparts 4a and 5a, and 7017.1215.

7017.1120 SUBMITTALS.

Subpart 1. **Address.** The owner or operator of the facility must send all submittals required under parts 7017.1002 to 7017.1220 to the agency in a physical or electronic format as specified by the commissioner and to the address identified on the required form or as provided by the agency.

Subp. 2. [See repealer.]

Subp. 3. **Date.** Submittals must be postmarked or received by the date specified in the applicable regulation or compliance document.

Subp. 4. **Certification.** All submittals, except for certification test-plans and relative accuracy test audits notifications, must be accompanied by a certification statement in a

format specified by the commissioner and signed by a responsible official, pursuant to part 7007.0500, subpart 3.

7017.1170 QUALITY ASSURANCE AND CONTROL REQUIREMENTS FOR CEMS.

Subpart 1. [See repealer.]

Subp. 1a. **Applicability.** The quality assurance and control requirements in this part apply to each CEMS unless otherwise specified by another applicable standard. If multiple CEMS standards apply to a single CEMS unit, the requirements of all applicable standards must be met.

Subp. 2. **Quality assurance plan required.** The owner or operator of the facility must develop and implement a written quality assurance plan that covers each CEMS. The plan must be on site and available for inspection within 30 days after monitor certification. The plan must be revised as needed to keep the plan up to date with the facility's current policies and procedures. The plan must contain all of the information required by Code of Federal Regulations, title 40, part 60, appendix F, section 3, or Code of Federal Regulations, title 40, part 75, Appendix B, as amended. The plan must include the manufacturer's spare parts list for each CEMS and require that those parts be kept at the facility unless the commissioner gives written approval to exclude specific spare parts from the list. The commissioner may approve requested exclusions if the commissioner determines that it is not reasonable to keep a specific part on site after consideration of the consequences of a malfunction of the part, the likelihood of a malfunction, the time required to obtain the part, and other pertinent factors.

Subp. 3. **Daily calibration drift assessment and adjustment.** The facility owner or operator must conduct daily calibration drift assessments and make adjustments as needed according to the procedure listed in items A and B, Code of Federal Regulations, title 40, section 60.13(d)(1), or Code of Federal Regulations, title 40, part 75, Appendix

B, section 2.1, as amended, as applicable, for each pollutant concentration and diluent monitor. The calibration drift assessment must be conducted on each monitor range. The span value specified in the applicable requirement or compliance document must be used to determine the zero and span calibration points. If no span value is specified in the applicable requirement or compliance document, the owner or operator must use a span value equivalent to 1.5 times the emission limit.

[For text of items A and B, see M.R.]

Subp. 4. [See repealer.]

Subp. 4a. **Cylinder gas audit.**

A. The owner or operator must complete the initial cylinder gas audit (CGA) within 180 days following certification of the CEMS. The owner or operator must conduct subsequent CGAs on each concentration and diluent monitor on each CEMS no later than the end of every ~~other~~ second QA operating quarter, regardless of whether the quarters are consecutive ~~calendar quarters. The audit must be performed~~, according to Code of Federal Regulations, title 40, part 60, Appendix F, section 5.1.2, or Code of Federal Regulations, title 40, part 75, Appendix A, section 6.2, as amended. As part of each quarterly excess emission report, the owner or operator must submit notification of any exception to CGA frequency that it used during the reporting period. A CGA is not required during any ~~calendar half year~~ quarter in which a relative accuracy test audit was performed on the CEMS.

B. If the unit being monitored by the CEMS is not in operation on the CGA due date, the owner or operator has a grace period of 168 operating hours in which to perform a CGA on that monitor. If, at the end of the 168-operating-hour grace period, the CGA has not been completed, data from the CEMS is invalid beginning with the first unit operating hour following expiration of the grace period. Nothing in this subpart relieves the owners'

or operators' obligation to comply with quality assurance provisions imposed by other applicable standards or compliance documents.

C. The audit frequency in Code of Federal Regulations, title 40, part 60, Appendix F, as amended, applies only if the unit is subject to Code of Federal Regulations, title 40, part 60.

Subp. 5. [See repealer.]

Subp. 5a. **Relative accuracy test audits.** The owner or operator must complete relative accuracy test audits (RATAs) as required by this subpart.

A. RATAs must be conducted using the applicable procedures in Code of Federal Regulations, title 40, part 60, Appendix B, or Code of Federal Regulations, title 40, part 75, Appendix A, sections 6.5 to 6.5.2.2, and Appendix B, sections 2.3.1.3 and 2.3.1.4, as amended, as applicable.

B. The owner or operator must complete a RATA on each CEMS within 365 days following certification of the CEMS. Subsequent RATAs must be conducted on each ~~monitor range of a~~ CEMS no later than the end of every fourth QA operating quarter, regardless of whether the operating quarters are consecutive ~~calendar quarters~~, unless the conditions in item C apply.

C. The owner or operator may conduct less frequent RATAs as described in subitems (1) and (2). The owner or operator must include notification of the reduced frequency or delay in performing a RATA to the commissioner in each quarterly excess emission report during which a RATA would have been due. Nothing in this subpart relieves the owners' or operators' obligation to comply with quality assurance provisions imposed by other applicable requirements or compliance documents.

(1) If a RATA demonstrates less than 75 percent of the performance specification under the applicable performance standard of Code of Federal Regulations,

title 40, part 60, Appendix B, as amended, the next RATA is due before the end of the sixth subsequent QA operating quarter.

(2) If the unit is not in operation at the RATA due date, the owner or operator has a grace period of 720 operating hours in which to perform a RATA on that monitor. If, at the end of the 720-operating-hour grace period, the RATA has not been completed, data from the CEMS is invalid beginning with the first unit operating hour following expiration of the grace period.

Subp. 6. **Criteria for excessive CEMS audit inaccuracy.** The criteria for excessive inaccuracy are:

A. for RATAs, the relative accuracy value specified in the appropriate Performance Specification of Code of Federal Regulations, title 40, part 60, Appendix B, and Code of Federal Regulations, title 40, part 75, Appendix A, section 3.3, as amended, as applicable; and

B. for CGAs, the average audit value must be within 15 percent of the cylinder gas value or five ppm, whichever is greater.

Subp. 7. **Calibration gases.** Gas mixtures must not be used after the manufacturer's certification expiration data. The expiration date must be clearly labeled on the container of each gas.

Subp. 8. **Out of control periods.** Data is not considered valid and may not be used for ~~emissions calculations~~ compliance demonstration during out of control periods as defined in part 7017.1002. The out of control period is considered downtime and the owner or operator must follow the requirements of Code of Federal Regulations, title 40, part 60, Appendix F, sections 4.3.2 and 5.2.2, as amended. An owner or operator may not apply the data substitution procedures in Code of Federal Regulations, title 40, part 75, as amended, to comply with this part.

7017.1215 QUALITY ASSURANCE AND CONTROL REQUIREMENTS FOR COMS.

For quality assurance and control requirements for COMS, the facility owner or operator must conduct quality assurance and quality control as specified in Procedure 3 - Quality Assurance Requirements for Continuous Opacity Monitoring Systems at Stationary Sources, Code of Federal Regulations, title 40, part 60, Appendix F, as amended, which is adopted and incorporated by reference.

7017.2015 INCORPORATION OF FEDERAL TESTING REQUIREMENTS BY REFERENCE.

[For text of subps 1 to 3, see M.R.]

Subp. 4. **Document submission.** All requests, reports, applications, submittals, and other communications to the administrator pursuant to subparts 2 and 3 must be submitted to the person identified in part 7017.2017, except that for those sections identified in this part as not delegated to the commissioner, the request, report, application, or submittal must be submitted to the EPA administrator.

7017.2017 SUBMITTALS.

All submittals required under parts 7017.2015 to 7017.2060 must be submitted in a physical or electronic format as specified by the commissioner and sent to the address identified on the required form or provided by the commissioner.

7017.2025 OPERATIONAL REQUIREMENTS AND LIMITATIONS.

[For text of subps 1 to 3, see M.R.]

Subp. 3a. **Compliance with new operating limits.** If a new operating limit is imposed pursuant to subpart 3, it shall be implemented according to items A to C, unless otherwise defined in an applicable requirement or compliance document.

[For text of items A and B, see M.R.]

C. For new operating limits and pollution control equipment limits not specified in item A or B, the averaging time and any extension of the range of values must be defined in the test plan approved under part 7017.2030, subpart 2.

[For text of subp 3b, see M.R.]

Subp. 4. **Failure to demonstrate compliance.**

[For text of item A, see M.R.]

B. The owner or operator may receive an extension to the schedule in item A if the owner or operator demonstrates in writing to the commissioner that one of the following special circumstances applies:

[For text of subitems (1) to (5), see M.R.]

(6) the owner or operator needs additional time to complete corrective actions or procedural changes to the affected emission unit or units before retesting.

[For text of item C, see M.R.]

Subp. 5. **Failure of retest.** If the owner or operator has conducted a retest under subpart 4 and the commissioner provides written notice to the owner or operator of the emission facility that the retest provides a second demonstration of noncompliance with an applicable emission limit, the owner or operator must comply with this subpart.

A. Unless item B applies, the owner or operator must demonstrate to the commissioner that corrective actions or procedural changes have been made that will be applied consistently and that will, when properly executed, ensure that the emission units will demonstrate compliance at all times with all applicable emission limits and capture, removal, or destruction efficiency requirements.

(1) If the owner or operator identifies such corrective actions or procedural changes and receives the commissioner's written approval of the required demonstration, the owner or operator may continue to operate the affected emissions units, provided the

owner or operator continues to implement the approved actions or changes. If required by parts 7007.1150 to 7007.1500, the owner or operator must apply for a permit amendment to incorporate the approved actions or changes into the facility permit.

(2) If the owner or operator cannot identify such corrective actions or procedural changes, the owner or operator must comply with item B.

B. If the owner or operator cannot first make the demonstration specified in item A and does not receive written approval to operate according to item A, the owner or operator must propose terms and conditions to the commissioner, in writing, that will ensure compliance with all conditions or requirements underlying each limit that the owner or operator failed.

(1) If the commissioner determines that the terms and conditions will ensure compliance at all times with the conditions or requirements underlying each limit that the owner or operator failed, the owner or operator must apply for the appropriate permit amendment to incorporate the terms and conditions into the facility permit.

(2) If the commissioner determines that the terms and conditions will not ensure compliance with the conditions or requirements underlying each limit that the owner or operator failed, the owner or operator must shut down the affected emission unit or units and must not restart the unit or units until the owner or operator corrects all deficiencies in the proposal and the commissioner approves the proposal.

[For text of subp 6, see M.R.]

7017.2035 PERFORMANCE TEST REPORTING REQUIREMENTS.

[For text of subp 1, see M.R.]

Subp. 2. **Submittal schedule.** The performance test report must be postmarked or received within 45 days following completion of the performance test unless an alternate schedule is given in the applicable compliance document. The owner or operator of the

emission facility may request in the test plan that the submittal deadline be extended by up to 15 days if the complexity of the test schedule or the laboratory analysis is such that submittal within 45 days is impractical.

Subp. 3. **Complete report.** The report must include the following elements:

[For text of items A to C, see M.R.]

D. Summary of results:

(1) emission results, expressed in the same units as the emission limits or in units prescribed in any applicable compliance document as defined in part 7017.2005, subpart 2;

[For text of subitems (2) to (6), see M.R.]

[For text of items E to I, see M.R.]

7017.2050 PERFORMANCE TEST METHODS.

Subpart 1. **Test methods.** Unless a different method is given in an applicable requirement or compliance document, the owner or operator of an emission facility shall conduct performance tests using the methods incorporated by reference in part 7017.2010 and following the requirements in part 7017.2060, unless an alternative or equivalent method is approved or required by the commissioner in accordance with subpart 2. If the methods incorporated by reference include exemptions and exclusions that do not meet the requirements of parts 7017.2001 to 7017.2060, the exemptions and exclusions do not apply.

[For text of subp 2, see M.R.]

7017.2060 PERFORMANCE TEST PROCEDURES.

[For text of subps 1 and 2, see M.R.]

Subp. 3. **Particulate matter determination.** The owner or operator must conduct particulate matter emission tests as required in this subpart.

A. Unless the commissioner has approved an equivalent method, the owner or operator must use Method 5, Code of Federal Regulations, title 40, part 60, Appendix A-3, as amended, and Method 202, Code of Federal Regulations, title 40, part 51, Appendix M, as amended.

B. The owner or operator must report:

(1) the results for filterable, organic condensable, and inorganic condensable particulate matter separately; and

(2) the sum of filterable and organic condensable particulate matter.

C. An emission facility's compliance status is based on a comparison of the sum of filterable and organic condensable particulate matter to the applicable limit, unless otherwise required under chapter 7011.

D. When submitting a proposed test plan, an owner or operator may apply to the commissioner to exclude organic condensable particulate matter from a performance test for particulate matter. The ~~commissioner shall approve the exclusion if the~~ owner or operator ~~demonstrates~~ must demonstrate:

(1) through previous performance test results that the emissions unit is not a source of organic condensable particulate matter emissions; or

(2) that an exception in Method 202, section 1.4(h), as amended, applies.

Subp. 4. **PM-10 determination.** The owner or operator must conduct PM-10 emission tests as required in this subpart.

A. Unless the commissioner has approved an equivalent method, the owner or operator must use Method 201 or 201A, Code of Federal Regulations, title 40, part 51, Appendix M, as amended, and Method 202, Code of Federal Regulations, title 40, part 51, Appendix M, as amended.

B. The owner or operator must report:

(1) the results for filterable, organic condensable, and inorganic condensable PM-10 separately; and

(2) the sum of filterable, organic condensable, and inorganic condensable PM-10.

C. An emission facility's compliance status is based on a comparison of the sum of filterable, organic condensable, and inorganic condensable PM-10 to the applicable PM-10 limit, unless otherwise required under chapter 7011.

D. When submitting a proposed test plan, an owner or operator may apply to the commissioner to exclude organic and inorganic condensable particulate matter from a performance test for PM-10. The ~~commissioner shall approve the exclusion if the~~ owner or operator ~~demonstrates~~ must demonstrate:

(1) through previous performance test results that the emissions unit is not a source of organic or inorganic condensable particulate matter emissions; or

(2) that an exception in Method 202, section 1.4(h), as amended, applies.

Subp. 4a. **PM-2.5 determination.** The owner or operator must conduct PM-2.5 emission tests as required in this subpart.

A. Unless the commissioner has approved an equivalent method, the owner or operator must use Method 201A, Code of Federal Regulations, title 40, part 51, Appendix M, as amended, and Method 202, Code of Federal Regulations, title 40, part 51, Appendix M, as amended.

B. The owner or operator must report:

(1) the results for filterable, organic condensable, and inorganic condensable PM-2.5 separately; and

(2) the sum of filterable, organic condensable, and inorganic condensable PM-2.5.

C. An emission facility's compliance status is based on a comparison of the sum of filterable, organic condensable, and inorganic condensable to the applicable PM-2.5 limit, unless otherwise required under chapter 7011.

D. When submitting a proposed test plan, an owner or operator may apply to the commissioner to exclude organic and inorganic condensable particulate matter from a performance test for PM-2.5. The ~~commissioner shall approve the exclusion if the~~ owner or operator ~~demonstrates~~ must demonstrate:

(1) through previous performance test results that the emissions unit is not a source of organic or inorganic condensable particulate matter emissions; or

(2) that an exception in Method 202, section 1.4(h), as amended, applies.

[For text of subps 5 to 7, see M.R.]

7019.3020 CALCULATION OF ACTUAL EMISSIONS FOR EMISSION INVENTORY.

[For text of items A and B, see M.R.]

C. Owners or operators of emission reporting facilities that hold an air emission permit under part 7007.1115, registration permit option A, must report actual emissions calculated for the calendar year for which emissions are being reported in a format specified by the commissioner.

D. All owners or operators of emission reporting facilities which have obtained an air emission permit under part 7007.1125, registration permit option C, shall report the quantity of each fuel purchased or used (whichever was stated in the facility's registration permit application) in the year for which emissions are being calculated. The report shall apportion the quantity of fuel burned with the type of combustion unit (indirect heating units or internal combustion engines) in which it was burned. The owner or operator shall report the quantity of VOC-containing materials purchased or used (whichever is stated

in the facility's registration permit application) in the year for which emissions are being calculated. The owners or operators reporting VOC-containing materials purchases or usage shall also report the weight factor (WF) of the VOC in the materials (weight of VOC per weight of VOC-containing materials) and the density of the materials. The actual emissions shall be calculated by the commissioner.

E. All owners or operators of emission reporting facilities which have obtained an air emission permit under part 7007.1130, registration permit option D, shall report the actual emissions calculated for purposes of compliance demonstration required in part 7007.1130, subpart 3, item E, for the calendar year for which emissions are being reported in a format specified by the commissioner.

F. All owners or operators of emission reporting facilities which have obtained an air emission permit under parts 7007.1140 to 7007.1148, capped permit, shall report the actual emissions calculated for purposes of compliance demonstration required in part 7007.1146, subpart 2, item H, for the calendar year for which emissions are being reported for all emission units in a format specified by the commissioner.

G. All owners or operators of an emission reporting facility submitting an emission inventory based in whole, or in part, on a material balance calculation shall submit a sample material balance calculation with the emission inventory. Such facilities shall also maintain a record of the material safety data sheets or vendor certification of the VOC, mercury, or sulfur content of the material for each material or fuel used and the material balance calculations for a period of five years after the date of submittal of the emission inventory.

H. The emission inventory may be based on the use of control equipment only if the use of the specific control equipment is required under conditions of a permit or applicable requirement as defined in part 7007.0100, subpart 6b, or is included in a notification received by the agency under part 7007.1150, item C. This item applies upon

issuance under chapter 7007 of a registration, state, capped, general, or part 70 permit to a stationary source but no earlier than the date three years after EPA grants full program approval of the agency's permit program under title 5 of the Clean Air Act.

7030.0010 INCORPORATION BY REFERENCE.

For the purpose of chapter 7030, American National Standards Institute, Specification for Sound Level Meters, S1.4-1983 is incorporated by reference. This publication is available from the American National Standards Institute, 1430 Broadway, New York, N.Y. 10018 and can be found at: the offices of the Minnesota Pollution Control Agency, 520 Lafayette Road North, Saint Paul, Minnesota 55155; the Government Documents Section, Room 409, Wilson Library, University of Minnesota, 309 19th Avenue South, Minneapolis, Minnesota 55454; and the State of Minnesota Law Library, 25 Rev. Dr. Martin Luther King Jr. Blvd., Saint Paul, Minnesota 55155. This document is not subject to frequent change.

The Federal Highway Administration publication, Sound Procedures for Measuring Highway Noise: Final Report, FHWA-DP-45-1R (August 1981) is incorporated by reference. This publication is available from the United States Department of Transportation, Federal Highway Administration, 1000 North Globe Road, Arlington, Virginia 22201 and can be found at: the offices of the Minnesota Pollution Control Agency, 520 Lafayette Road North, Saint Paul, Minnesota 55155; the Government Documents Section, Room 409, Wilson Library, University of Minnesota, 309 19th Avenue South, Minneapolis, Minnesota 55454; and the State of Minnesota Law Library, 25 Rev. Dr. Martin Luther King Jr. Blvd., Saint Paul, Minnesota 55155. This document is not subject to frequent change.

7030.0050 NOISE AREA CLASSIFICATION.

[For text of subp 1, see M.R.]

Subp. 2. **Noise area classifications.** The noise area classifications and the activities included in each classification are listed below:

Noise Area Classification	Land Use Activities
1	Household Units (includes farm houses)
	Hotels, motels, or other overnight lodging
	Mobile home parks or courts
	Other residential units
	Motion picture production
	Medical and other health services
	Correctional institutions
	Educational services
	Religious activities
	Cultural activities and nature exhibitions
	Entertainment assembly
	Camping and picnicking areas (designated)
	Resorts and group camps
	Other cultural, entertainment, and recreational activities.
2	Railroad terminals (passenger and freight)
	Rapid rail transit and street railway passenger terminals
	Bus passenger terminals (intercity and local)
	Other motor vehicle transportation
	Airport and flying field terminals (passenger and freight)
	Marine terminals (passenger and freight)
	Automobile parking
	Transportation services and arrangements
	Wholesale trade
	Retail trade – including restaurants and bars
	Finance, insurance, and real estate services
	Personal services
	Business, legal, or other professional services
	Repair services
	Contract construction services

		Governmental services (except correctional institutions)
		Miscellaneous services (except religious activities)
		Public assembly (except entertainment assembly and race tracks)
		Amusements (except fairgrounds and amusement parks)
		Recreational activities (except designated camping and picnicking areas)
		Parks
	3	Manufacturing
		Transportation (except passenger terminals)
		Highway and street right-of-way
		Communication
		Utilities
		Race tracks
		Fairgrounds and amusement parks
		Agricultural and related activities
		Forestry activities and related services (including commercial forest land, timber production, and other related activities)
		Fishing activities and related services
		Mining activities and related services
		Other resource production and extraction
		All other activities not otherwise listed.
	4	Undeveloped and unused land area
		Noncommercial forest development
		Water areas
		Vacant floor area
		Under construction

[For text of subp 3, see M.R.]

RENUMBERING AND RELETTERING. In each part of Minnesota Rules referred to in column A, the reference in column B is deleted and the reference in column C is inserted.

Column A	Column B	Column C
~~7007.0150, subp. 5~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
7007.0325, subp. 2	7019.3020, items B, C, and D	7019.3020, items B, D, and E
7007.0325, subp. 2	7019.3020, item E	7019.3020, item F
7007.0800, subp. 6	7007.0500, subp. 2, item K, subitem (4)	7007.0500, subp. 2, item K, subitem (5)
~~7007.0800, subp. 10~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
~~7007.1300, subp. 2~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
~~7007.1400, subp. 1~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
~~7007.1500, subp. 1~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
~~7007.1750~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
~~7008.2000~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
~~7017.0100, subp. 1~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
~~7017.2005, subp. 1a~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~
~~7019.1000, subp. 6~~	~~7007.0100, subp. 7~~	~~7007.0100, subp. 6a~~

REPEALER. Minnesota Rules, parts 7007.0325; 7009.0070; 7011.0725; 7011.1280, subpart 8; 7011.1400, subpart 12; 7011.1415; 7017.1080, subpart 3; 7017.1120, subpart 2; 7017.1170, subparts 1, 4, and 5; 7017.1210; 7017.2001, subpart 2; and 7017.2018, are repealed.