

## **CHAPTER 6 STANDARDS FOR STATIONARY SOURCES**

### **Subchapter 1 – Air Quality Permits for Air Pollutant Sources**

#### **Rule 6.101 – Definitions**

For the purpose of this subchapter the following definitions apply:

- (1) “Air Quality Permit” or “permit” means a permit issued by the department for the construction, installation, alteration, or operation of any air pollution source. The term includes annual operating and construction permits issued prior to November 17, 2000.
- (2) “Commencement of construction” means the owner or operator has either:
  - (a) begun, or caused to begin, a continuous program of actual on-site construction of the source, to be completed within a reasonable time; or
  - (b) entered into binding agreements or contractual obligations, which cannot be canceled or modified without substantial loss to the owner or operator, to undertake a program of actual construction of the source to be completed within a reasonable time.
- (3) “Construct or Construction” means on-site fabrication, modification, erection or installation of a source or control equipment, including a reasonable period for startup and shakedown.
- (4) “Existing Source” means a source or stack associated with a source that is in existence and operating or capable of being operated or that had an air quality permit from the department or the Control Board on March 16, 1979.
- (5) “Major Emitting Facility” means a stationary source or stack associated with a source that directly emits, or has the potential to emit, 100 tons per year of any air pollutant, including fugitive emissions, regulated under the Clean Air Act of Montana.
- (6) “New or Altered Source” means a source or stack (associated with a source) constructed, installed or altered on or after March 16, 1979.
- (7) “Owner or Operator” means the owner of a source or the authorized agent of the owner, or the person who is responsible for the overall operation of the source.
- (8) “Portable source” means a source which is not stationary or fixed to a single location, and which is not fully self propelled. The term may include, but is not limited to, portable asphalt plants, portable gravel crushers and portable wood chippers
- (9) “Potential to Emit” means the maximum capacity of a source to emit a pollutant under its physical and operational design. Any physical or operational limitation on the capacity of the source to emit a pollutant, including air pollution control equipment and restrictions on hours of operation or on the type or amount of material combusted, stored, or processed, must be treated as part of its design only if the limitation or the effect it would have on emissions is federally enforceable. Secondary emissions do not count in determining the potential to emit of a source.
- (10) “Source” means a “stationary source” as defined by Rule 2.101(45).

#### **Rule 6.102 – Air Quality Permit Required**

- (1) A person may not construct, install, alter, operate or use any source without having a valid permit from the department when required by this rule to have a permit.
- (2) A permit is required for the following:
  - (a) any source that has the potential to emit 25 tons or more of any pollutant per year;
  - (b) Incinerators; asphalt plants; concrete plants; and rock crushers without regard to size;

- (c) Solid fuel burning equipment with the heat input capacity of 1,000,000 BTU/hr or more;
  - (d) A new stack or source of airborne lead pollution with a potential to emit five tons or more of lead per year;
  - (e) An alteration of an existing stack or source of lead pollution that increases the maximum potential of the source to emit airborne lead by 0.6 tons or more per year.
- (3) A portable source with a Montana Air Quality Permit issued pursuant to the Administrative Rules of Montana Title 17, Chapter 8, subchapter 7 may apply for a Temporary Missoula City-County Air Quality Permit. The department may issue a Temporary Missoula City-County Air Quality Permit to a source if the following conditions are met:
- (a) The applicant sends written notice of intent to transfer location to the department. Such notice must include documentation that the applicant has published a notice of the intended transfer in a legal publication in a newspaper of general circulation in the area into which the permit transfer is to be made. The notice must include the statement that the department will accept public comments for fifteen days after the date of publication; and
  - (b) The applicant has submitted a complete Missoula City-County Air Quality Permit application to the department prior to submitting an application for a Temporary Missoula City-County Air Quality Permit.
- (4) A source with a Temporary Missoula City-County Air Quality Permit is subject to the following conditions:
- (a) The emission control requirements of the Montana Air Quality Permit issued to the portable source are transferred verbatim, without augmentation, revision, or redaction to the Temporary Missoula City-County Air Quality Permit excluding conditions and addendums specific to PM<sub>10</sub> nonattainment areas. Missoula City-County Health Department air quality permitting policies and conditions for the Missoula Air Stagnation Zone replace the Montana Air Quality Permit addendums specific to PM<sub>10</sub> nonattainment areas; and
  - (b) The source may locate and operate in Missoula County after the department has approved the permit transfer; and
  - (c) A Temporary Missoula City-County Air Quality Permit expires in 180 days or upon completion of the Missoula City-County air quality permitting process required by Rule 6.102(3)(b), whichever occurs first; and
  - (d) The Department may revoke a Temporary Missoula City-County Air Quality Permit prior to the expiration of the time period set forth in 6.102(4)(c) if the portable source violates any provision of the Temporary Missoula City-County Air Quality Permit.
- (5) An air quality permit is not required for the following, except when the Control Board determines an air quality permit is necessary to insure compliance with the NAAQS and other provisions of this Program:
- (a) Any major stationary source or modification, as defined in 40 CFR 51.165 or 51.166, which is required to obtain an air quality permit from the MT DEQ in conjunction with ARM Title 17, Chapter 8, Subchapters 8, 9 or 10 that does not have the potential to emit 250 tons a year or more of any pollutant subject to regulation under Title 75, Chapter 2, MCA, including fugitive emissions;
  - (b) Residential, institutional, and commercial fuel burning equipment of less than 10,000,000 BTU/hr heat input if burning liquid or gaseous fuels, or 1,000,000 BTU/hr input if burning solid fuel;
  - (c) Residential and commercial fireplaces, barbecues and similar devices for recreational,

- cooking or heating use;
  - (d) motor vehicles, trains, aircraft or other such self-propelled vehicles;
  - (e) agricultural and forest prescription fire activities;
  - (f) emergency equipment installed in hospitals or other public institutions or buildings for use when the usual sources of heat, power and lighting are temporarily unattainable;
  - (g) routine maintenance or repair of equipment;
  - (h) public roads; and
  - (i) any activity or equipment associated with the planting, production or harvesting of agricultural crops.
- (6) A source that is exempt from obtaining an air quality permit by Rule 6.102(5) is subject to all other applicable provisions of this program, including but not limited to those regulations concerning outdoor burning, odors, motor vehicles, fugitive particulate and solid fuel burning devices.
- (7) A source not otherwise required to obtain an air quality permit may obtain such a permit for the purpose of establishing federally enforceable limits on its potential to emit.

**Rule 6.103 – General Conditions**

- (1) An air quality permit must contain and permit holders must adhere to the following provisions:
- (a) requirements and conditions applicable to both construction and subsequent use including, but not limited to, applicable emission limitations imposed by subchapter 5 of this chapter, the Clean Air Act of Montana and the FCAA.
  - (b) such conditions as are necessary to assure compliance with all applicable provisions of this Program and the Montana SIP.
  - (c) a condition that the source shall submit information necessary for updating annual emission inventories.
  - (d) a condition that the permit must be available for inspection by the department at the location for which the permit is issued.
  - (e) a statement that the permit does not relieve the source of the responsibility for complying with any other applicable City, County, federal or Montana statute, rule, or standard not contained in the permit.
- (2) An air quality permit is valid for five years, unless:
- (a) additional construction that is not covered by an existing construction and operating permit begins on the source;
  - (b) a change in the method of operation that could result in an increase of emissions begins at the source;
  - (c) the permit is revoked or modified as provided for in Rules 6.108 and 6.109; or
  - (d) the permit clearly states otherwise.
- (3) A source whose permit has expired may not operate until it receives another valid permit from the department.
- (4) An air quality permit for a new or altered source expires 36 months from the date of issuance if the construction, installation, or alteration for which the permit was issued is not completed within that time. Another permit is required pursuant to the requirements of this subchapter for any subsequent construction, installation, or alteration by the source.
- (5) A new or altered source may not commence operation, unless the owner or operator demonstrates that construction has occurred in compliance with the permit and that the source can operate in

compliance with applicable conditions of the permit, provisions of this Program, and rules adopted under the Clean Air Act of Montana and the FCAA and any applicable requirements contained in the Montana SIP.

- (6) Commencement of construction or operation under a permit containing conditions is deemed acceptance of all conditions so specified, provided that this does not affect the right of the permittee to appeal the imposition of conditions through the Control Board hearing process as provided in Chapter 14.
- (7) Having an air quality permit does not affect the responsibility of a source to comply with the applicable requirements of any control strategy contained in the Montana SIP.

**Rule 6.104 – Reserved**

**Rule 6.105 – Air Quality Permit Application Requirements**

- (1) The owner or operator of a new or altered source shall, not later than 180 days before construction begins, or if construction is not required not later than 120 days before installation, alteration, or use begins, submit an application for an air quality permit to the department on forms provided by the department.
  - (a) An application submitted by a corporation must be signed by a principal executive officer of at least the level of vice president, or an authorized representative, if that representative is responsible for the overall operation of the source;
  - (b) An application submitted by a partnership or a sole proprietorship must be signed by a general partner or the proprietor respectively;
  - (c) An application submitted by a municipal, state, federal or other public agency must be signed by either a principal executive officer, appropriate elected official or other duly authorized employee; and
  - (d) An application submitted by an individual must be signed by the individual or his or her authorized agent.
- (2) The application must include the following:
  - (a) A map and diagram showing the location of the proposed new or altered source and each stack associated with the source, the property involved, the height and outline of the buildings associated with the new or altered source, and the height and outline of each stack associated with the new or altered source;
  - (b) A description of the new or altered source including data on maximum design production capacity, raw materials and major equipment components;
  - (c) A description of the control equipment to be installed;
  - (d) A description of the composition, volume and temperatures of the effluent stream, including the nature and extent of air pollutants emitted, quantities and means of disposal of collected pollutants, and the air quality relationship of these factors to conditions created by existing sources or stacks associated with the new or altered source;
  - (e) Normal and maximum operating schedules;
  - (f) Adequate drawings, blueprints, specifications or other information to show the design and operation of the equipment involved;
  - (g) Process flow diagrams containing material balances;
  - (h) A detailed schedule of construction or alteration of the source;
  - (i) A description of the shakedown procedures and time frames that will be used at the

- source;
- (j) Other information requested by the department that is necessary to review the application and determine whether the new or altered source will comply with applicable provisions of this Program; including but not limited to information concerning compliance with environmental requirements at other facilities;
  - (k) Documentation showing the city or county zoning office was notified in writing by the applicant that the proposed use requires an air quality permit;
  - (l) A valid city or county zoning compliance permit for the proposed use;
- (3) The department may waive the requirement that any of the above information must accompany a permit application.
  - (4) When renewing an existing permit, the owner or operator of a source is not required to submit information already on file with the department. However, the department may require additional information to ensure the source will comply with all applicable requirements.
  - (5) An application for a solid or hazardous waste incinerator must include the information specified in Rule 6.605.
  - (6) An owner or operator of a new or altered source proposing construction or alteration within any area designated as nonattainment in 40 CFR 81.327 for any regulated air pollutant shall demonstrate that all major emitting facilities located within Montana and owned or operated by such persons, or by an entity controlling, controlled by, or under common control with, such persons, are subject to emission limitations and are in compliance, or on a schedule for compliance, with all applicable air quality emission limitations and standards contained in ARM Title 17, Chapter 8.
  - (7) The owner or operator of a new or altered source shall, before construction is scheduled to end as specified in the permit, submit additional information on a form provided by the department. The information to be submitted must include the following:
    - (a) Any information relating to the matters described in Section (2) of this rule that has changed or is no longer applicable; and
    - (b) A certification by the applicant that the new or altered source has been constructed in compliance with the permit.
  - (8) An application is deemed complete on the date the department received it unless the department notifies the applicant in writing within thirty (30) days thereafter that it is incomplete. The notice must list the reasons why the application is considered incomplete and must specify the date by which any additional information must be submitted. If the information is not submitted as required, the application is considered withdrawn unless the applicant requests in writing an extension of time for submission of the additional information. The application is complete on the date the required additional information is received.

**Rule 6.106 – Public Review of Air Quality Permit Application**

- (1) The applicant shall notify the public, by means of legal publication in a newspaper of general circulation in the area affected by the application of its application for an air quality permit. The notice must be published not sooner than ten (10) days prior to submittal of an application nor later than ten (10) days after submittal of an application. The applicant shall use the department's format for the notice. The notice must include:
  - (a) the name and the address of the applicant;
  - (b) address and phone number of the premises at which interested persons may obtain further information, may inspect and may obtain a copy of the application;
  - (c) the date by which the department must receive written public comment on the

- application. The public must be given at least 30 days from the date the notice is published to comment on the application.
- (2) The department shall notify the public of its preliminary determination by means of legal publication in a newspaper of general circulation in the area affected by the application and by sending written notice to any person who commented on the application during the initial 30-day comment period. Each notice must specify:
    - (a) whether the department intends on issuing, issuing with conditions, or denying the permit;
    - (b) address and phone number of the premises at which interested persons may obtain further information, may inspect and may obtain a copy of the proposed permit;
    - (c) the date by which the department must receive written public comment on the application. The public must be given at least 15 days from the date the notice is published to comment on the application.
  - (3) A person who has submitted written comments and who is adversely affected by the department's final decision may request, in writing, a hearing before the Control Board within fifteen (15) days after the department's final decision. The request for hearing must state specific grounds why the permit should not be issued, should be issued, or why it should be issued with particular conditions. Department receipt of a request for a hearing postpones the effective date of the department's decision until the conclusion of the hearing process.
  - (4) Permit renewals are subject to this rule.

**Rule 6.107 – Issuance or Denial of an Air Quality Permit**

- (1) A permit may not be issued to a new or altered source unless the applicant demonstrates that the source:
  - (a) can be expected to operate in compliance with:
    - (i) the conditions of the permit,
    - (ii) the provisions of this Program;
    - (iii) rules adopted under the Clean Air Act of Montana) and the FCAA.; and
    - (iv) any applicable control strategies contained in the Montana SIP.
  - (b) will not cause or contribute to a violation of a Montana or NAAQS.
- (2) An air quality permit for a new or altered source may be issued in an area designated as nonattainment in 40 CFR 81.327 only if the applicable SIP approved in 40 CFR Part 52, Subpart BB is being carried out for that nonattainment area.
- (3) The department shall make a preliminary determination as to whether the air quality permit should be issued or denied within forty (40) days after receipt of a completed application.
- (4) The department shall notify the applicant in writing of its final decision within sixty (60) days after receipt of the completed application.
- (5) If the department's final decision is to issue the air quality permit, the department may not issue the permit until:
  - (a) fifteen (15) days have elapsed since the final decision and no request for a hearing before the Control Board has been received; or
  - (b) the end of the Control Board Hearing process as provided for in Chapter 14, if a request for a Control Board Hearing was received.
- (6) If the department denies the issuance of an air quality permit it shall notify the applicant in writing

of the reasons why the permit is being denied and advise the applicant of his or her right to request a hearing before the Control Board within fifteen (15) days after receipt of the department's notification of denial of the permit.

**Rule 6.108 – Revocation or Modification of an Air Quality Permit**

- (1) An air quality permit may be revoked for any violation of:
  - (a) A condition of the permit;
  - (b) A provision of this Program;
  - (c) An applicable regulation, rule or standard adopted pursuant to the FCAA;
  - (d) A provision of the Clean Air Act of Montana; or
  - (f) any applicable control strategies contained in the Montana SIP.
- (2) An air quality permit may be modified for the following reasons:
  - (a) Changes in any applicable provisions of this Program adopted by the Control Board, or rules adopted under the Clean Air Act of Montana;
  - (b) Changed conditions of operation at a source that do not result in an increase of emissions
  - (c) When the department or Control Board determines modifications are necessary to insure compliance with the provisions of this Program or an implementation plan approved by the Control Board.
- (3) The department shall notify the permittee in writing of its intent to revoke or modify the permit. The permit is deemed revoked or modified in accordance with the department's notice unless the permittee makes a written request for a hearing before the Control Board within fifteen (15) days of receipt of the department's notice. Departmental receipt of a written request initiates the appeals process outlined in Chapter 14 of this Program and postpones the effective date of the department's decision to revoke or modify the permit until the conclusion of the hearing process.

**Rule 6.109 – Transfer of Permit**

- (1) An air quality permit may not be transferred from one location to another or from one piece of equipment to another, except as allowed in (2) of this rule.
- (2) An air quality permit may be transferred from one location to another if:
  - (a) written notice of intent to transfer location is sent to the department, along with documentation that the permittee has published notice of the intended transfer by means of a legal publication in a newspaper of general circulation in the area to which the transfer is to be made. The notice must include the statement that public comment will be accepted by the department for fifteen days after the date of publication;
  - (b) the source will operate in the new location for a period of less than one year; and
  - (c) the source is expected to operate in compliance with:
    - (i) this Program;
    - (ii) the standards adopted pursuant to the Clean Air Act of Montana, including the Montana ambient air quality standards;
    - (iii) applicable regulations and standards promulgated pursuant to the FCAA, including the NAAQS; and
    - (iv) any control strategies contained in the Montana state implementation plan.
  - (d) the source has a valid city or county zoning compliance permit for the proposed use at the

- new location; and
- (e) the source pays the transfer fee listed in Attachment A.
- (3) An air quality permit may be transferred from one person to another if written notice of intent to transfer, including the names of the transferor and the transferee, is sent to the department.
- (4) The department will approve or disapprove a permit transfer within 30 days after receipt of a complete notice of intent as described in (2) or (3) of this rule.

**Subchapters 2, 3, 4 – reserved**

**Subchapter 5 – Emission Standards**

**Rule 6.501 – Emission Control Requirements**

- (1) For the purpose of this rule, Best Available Control Technology (BACT)” means an emission limitation (including a visible emission standard), based on the maximum degree of reduction for each pollutant subject to regulation under the FCAA or the Clean Air Act of Montana, that would be emitted from any proposed stationary source or modification that the department, on a case by case basis, taking into account energy, environmental, and economic impacts and other costs, determines is achievable for such source or modification through application of production processes or available methods, systems, and techniques, including fuel cleaning or treatment or innovative fuel combustion techniques for control of such pollutant. In no event may application of BACT result in emission of any pollutant that would exceed the emissions allowed by any applicable standard under Rules 6.506 or 6.507. If the department determines that technological or economic limitations on the application of measurement methodology to a particular class of sources would make the imposition of an emission standard infeasible, it may instead prescribe a design, equipment, work practice or operational standard or combination thereof, to require the application of BACT. Such standard must, to the degree possible, set forth the emission reduction achievable by implementation of such design, equipment, work practice or operation and must provide for compliance by means which achieve equivalent results.
- (2) The owner or operator of a new or altered source for which an air quality permit is required by subchapter 1 of this Chapter shall install on that source the maximum air pollution control capability that is technically practicable and economically feasible, except that:
  - (a) best available control technology must be used; and
  - (b) the lowest achievable emission rate must be met when required by the FCAA.
- (3) The owner or operator of any air pollution source for which an air quality permit is required by subchapter 1 of this Chapter shall operate all equipment to provide the maximum air pollution control for which it was designed.
- (4) The department may establish emission limits on a source based on an approved state implementation plan or maintenance plan to keep emissions within a budget.

**Rule 6.502 – Particulate Matter from Fuel Burning Equipment**

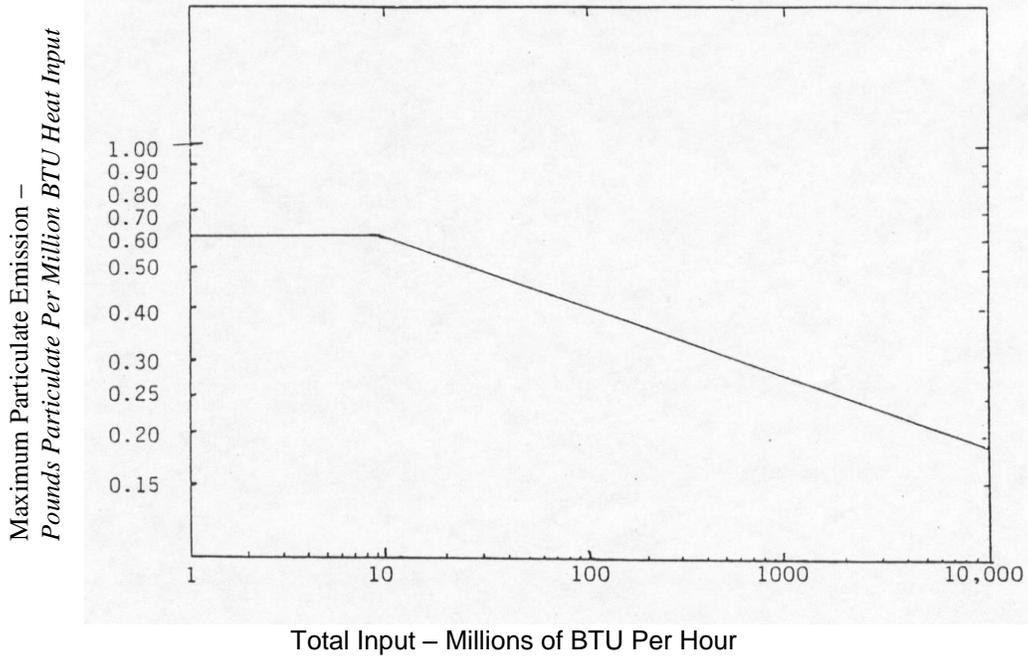
- (1) For the purpose of this rule “new fuel burning equipment” means any fuel burning equipment constructed or installed after November 23, 1968.
- (2) The following emission limits apply to solid fuel burning equipment constructed or installed after May 14, 2010 with a heat input capacity from 1,000,000 BTU/hr up to and including 10,000,000 BTU/hr.

- (a) Inside the Air Stagnation Zone, solid fuel burning equipment must meet LAER and a person may not cause or allow particulate matter emissions in excess of 0.1 pounds per million BTU heat input to be discharged from any stack, opening or chimney into the atmosphere.
  - (b) Outside the Air Stagnation Zone, solid fuel burning equipment must meet BACT and a person may not cause or allow particulate matter emissions in excess of 0.20 lbs per million BTU heat input to be discharged from any stack, opening or chimney into the atmosphere.
- (3) For devices or operations not covered in Rule 6.502(2), a person may not cause or allow particulate matter caused by the combustion of fuel to be discharged from any stack or chimney into the atmosphere in excess of the hourly rates set forth in the following table:

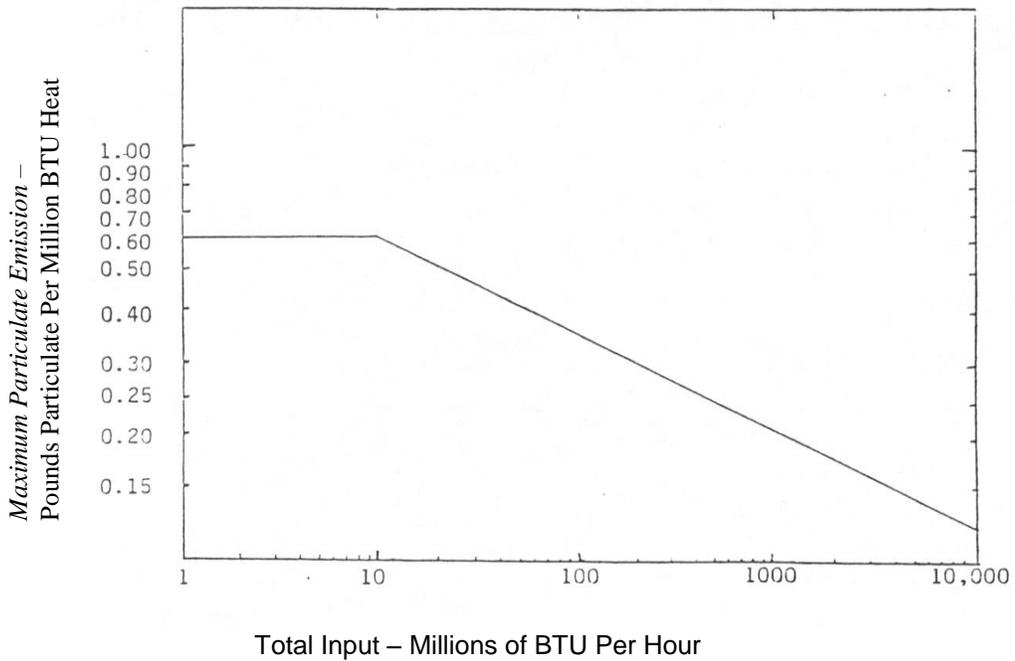
Heat Input (million BTUs/hr)	Maximum Allowable Emissions of Particulate Matter (lbs/million BTU's)	
	Existing Fuel Burning Equipment	New Fuel Burning Equipment
≤ 10	0.60	0.60
100	0.40	0.35
1,000	0.28	0.20
≥ 10,000	0.19	0.12

- (4) For a heat input between any two consecutive heat inputs stated in the preceding table, maximum allowable emissions of particulate matter are shown for existing fuel burning equipment on Figure 1 and for new fuel burning equipment on Figure 2. For the purposes hereof, heat input is calculated as the aggregate heat content of all fuels (using the upper limit of their range of heating value) whose products of combustion pass through the stack or chimney.
- (5) When two or more fuel burning units are connected to a single stack, the combined heat input of all units connected to the stack may not exceed that allowable for the same unit connected to a single stack.
- (6) This rule does not apply to:
- (a) emissions from residential solid fuel combustion devices, such as fireplaces and wood and coal stoves with heat input capacities less than 1,000,000 BTU per hour; and
  - (b) new stationary sources subject to Rule 6.506 for which a particulate emission standard has been promulgated.

**FIGURE 1**  
**Maximum Emission of Particulate Matter from Existing Fuel Burning Installations**



**FIGURE 2**  
**Maximum Emission of Particulate Matter from New Fuel Burning Installations**



**Rule 6.503 – Particulate Matter from Industrial Processes**

- (1) A person may not cause or allow particulate matter in excess of the amount shown in the following table to be discharged into the outdoor atmosphere from any operation, process or activity.

<u>Process (lb/hr)</u>	<u>Weight Rate (tons/hr)</u>	<u>Rate of Emission (lb/hr)</u>
100	0.0	0.551
200	0.10	0.877
400	0.20	1.40
600	0.30	1.83
800	0.40	2.22
1,000	0.50	2.58
1,500	0.75	3.38
2,000	1.00	4.10
2,500	1.25	4.76
3,000	1.50	5.38
3,500	1.75	5.96
4,000	2.00	6.52
5,000	2.50	7.58
6,000	3.00	8.56
7,000	3.50	9.49
8,000	4.00	10.4
9,000	4.50	11.2
10,000	5.00	12.0
12,000	6.00	13.6
16,000	8.00	16.5
18,000	9.00	17.9
20,000	10.00	19.2
30,000	15.00	25.2
40,000	20.00	30.5
50,000	25.00	35.4
60,000	30.00	40.0
70,000	35.00	41.3
80,000	40.00	42.5
90,000	45.00	43.6
100,000	50.00	44.6
120,000	60.00	46.3
140,000	70.00	47.8
160,000	80.00	49.0
200,000	100.00	51.2
1,000,000	500.00	69.0
2,000,000	1,000.00	77.6
6,000,000	3,000.00	92.7

- (2) When the process weight rate falls between two values in the table, or exceeds 3,000 tons per hour, the maximum hourly allowable emissions of particulate are calculated using the following equations:

- (a) for process weight rates up to 60,000 pounds per hour:

$$E = 4.10 P^{0.67}$$

- (b) for process weight rates in excess of 60,000 pounds per hour:

$$E = 55.0 P^{0.11} - 40$$

Where E = rate of emission in pounds per hour and P = process weight rate in tons per hour.

- (3) This rule does not apply to particulate matter emitted from:
- (a) the reduction cells of a primary aluminum reduction plant,
  - (b) those new stationary sources listed in Rule 6.506 for which a particulate emission standard has been promulgated,
  - (c) fuel burning equipment, and
  - (d) incinerators.

#### **Rule 6.504 – Visible Air Pollutants**

- (1) A person may not cause or allow emissions that exhibit an opacity of forty percent (40%) or greater averaged over six consecutive minutes to be discharged into the outdoor atmosphere from any source installed on or before November 23, 1968, the provisions of this rule do not apply to transfer of molten metals or emissions from transfer ladles.
- (2) A person may not cause or authorize emissions to be discharged into the outdoor atmosphere from any source installed after November 23, 1968, that exhibit an opacity of twenty percent (20%) or greater averaged over six consecutive minutes.
- (3) During the building of new fires, cleaning of grates, or soot blowing, the provisions of Sections (1) and (2) apply, except that a maximum average opacity of sixty percent (60%) is permissible for not more than one four minute period in any 60 consecutive minutes. Such a four-minute period means any four consecutive minutes.
- (4) This rule does not apply to emissions from:
  - (a) wood-waste burners;
  - (b) incinerators;
  - (c) motor vehicles;
  - (d) those new stationary sources listed in ARM 17.8.340 for which a visible emission standard has been promulgated; or
  - (e) residential solid-fuel burning devices.

#### **Rule 6.505 – Fluoride Emissions**

- (1) A person may not cause or allow to be discharged into the outdoor atmosphere from any phosphate rock or phosphate processing equipment or equipment used in the production of elemental phosphorous, enriched phosphates, phosphoric acid, defluorinated phosphates, phosphate fertilizers or phosphate concentrates or any equipment used in the processing of fluorides or wastewater enriched fluorides, in a gaseous or particulate form or any combination of gaseous or particulate forms in excess of 0.3 pounds per ton of P<sub>2</sub>O<sub>5</sub> (phosphorous pentoxide) introduced into the process of any calcining, nodulizing, defluorinating or acidulating process or any combination of the foregoing, or any other process, except aluminum reduction, capable of causing a release of fluorides in the form or forms indicated in this rule.
- (2) Pond emissions:
  - (a) A person may not cause or allow fluorides in excess of 108 micrograms per square centimeter per 28 days (µg/cm<sup>2</sup>/28 days) to be released into the outdoor atmosphere from any storage pond, settling basin, ditch, liquid holding tank or other liquid holding or

- conveying device from operations outlined in Section (1). The concentration of fluorides is to be determined using the calcium formate paper method. Papers must be exposed in a standard Montana Box located not less than 18 inches or more than 48 inches above the level of the liquid in the devices herein enumerated and not more than 16 inches laterally from the liquid's edge. Other locations may be permitted if approved by the department.
- (b) At least four such sampling stations must be placed at locations designated by the department. Two or more calcium formate papers, as designated by the department, must be exposed in the standard Montana Box for a period designated by the department. Regardless of the duration of the sampling period, the values determined must be corrected to 28 days.
  - (c) A minimum of two calcium formate papers for each sampling period from each sample box must be provided to the department, if requested, within ten days from the date of the request.
- (3) Preparation, exposure and analysis:
- (a) Preparation of calcium formate papers:
    - (i) Soak Whatman #2, 11 cm. filter papers in a 10 percent solution of calcium formate for five minutes.
    - (ii) Dry in a forced air oven at 80°C. Remove immediately when dryness is reached.
  - (b) Exposure of calcium formate papers:
    - (i) Two papers, or more, if directed, are suspended in a standard Montana Box on separate hangers at least two inches apart.
    - (ii) Exposure must be for 28 days + 3 days unless otherwise indicated by the department.
    - (iii) Calcium formate papers must be kept in an air tight container both before and after exposure until the time of analysis.
  - (c) Analysis of calcium formate papers is adapted from Standard Methods for the Examination of Water and Waste Water; using Willard-Winter perchloric acid distillations and the Spadns-Zirconium Lake method for fluoride determination.

**Rule 6.506 – New Source Performance Standards**

- (1) For the purpose of this rule, the following definitions apply:
  - (a) “Administrator”, as used in 40 CFR Part 60, means the department, except in the case of those duties that cannot be delegated to the local program by the state and the EPA, in which case “administrator” means the administrator of the EPA.
  - (b) “Stationary source” means any building, structure, facility, or installation that emits or may emit any air pollutant subject to regulation under the Federal Clean Air Act.
- (2) The terms and associated definitions specified in 40 CFR 60.2, apply to this rule, except as specified in subsection (1)(a) above.
- (3) The owner and operator of any stationary source or modification, as defined and applied in 40 CFR Part 60, shall comply with the standards and provisions of 40 CFR Part 60.
- (4) For the purpose of this rule, the Control Board hereby adopts and incorporates by reference 40 CFR Part 60, which pertains to standards of performance for new stationary sources and modifications.

**Rule 6.507 – Hazardous Air Pollutants**

- (1) For the purpose of this rule, the terms and associated definitions specified in 40 CFR 61.02 apply, except that:
  - (a) “Administrator”, as used in 40 CFR Part 61, means the department, except in the case of those duties that cannot be delegated to the local program by the state and the EPA in which case “administrator” means the administrator of the EPA.
- (2) The owner or operator of any existing or new stationary source, as defined and applied in 40 CFR Part 61, shall comply with the standards and provisions of 40 CFR Part 61.
- (3) For the purpose of this rule, the Control Board hereby adopts and incorporates by reference 40 CFR Part 61, which pertains to emission standards for hazardous air pollutants.

**Rule 6.508 – Hazardous Air Pollutants for Source Categories**

- (1) For this rule, the following definitions apply:
  - (a) “112(g) exemption” means a document issued by the department on a case-by-case basis, finding that a major source of HAP meets the criteria contained in 40 CFR 63.41 [definition of “construct a major source”, (2)(i) through (vi)], and is thus exempt from the requirements of 42 USC 7412(g).
  - (b) “Beginning actual construction” means, in general, initiation of physical on-site construction activities of a permanent nature. Such activities include, but are not limited to, installing building supports and foundations, laying underground pipework, and constructing permanent storage structures.
  - (c) “Construct a major source of HAP” means:
    - (i) to fabricate, erect, or install a major source of HAP; or
    - (ii) to reconstruct a major source of HAP, by replacing components at an existing process or production unit that in and of itself emits or has the potential to emit 10 tons per year of any HAP or 25 tons per year of any combination of HAP, whenever:
      - (A) the fixed capital cost of the new components exceeds 50% of the fixed capital cost that would be required to construct a comparable process or production unit; and
      - (B) it is technically and economically feasible for the reconstructed major source to meet the applicable MACT emission limitation for new sources established under 40 CFR 63 subpart B.
  - (d) “Greenfield site” means a contiguous area under common control that is an undeveloped site.
  - (e) “MACT standard” means a standard that has been promulgated pursuant to 42 USC 7412(d), (h), or (j).
  - (f) “Major source of HAP” means:
    - (i) at any greenfield site, a stationary source or group of stationary sources that is located within a contiguous area and under common control and emits or has the potential to emit 10 tons per year of any HAP or 25 tons per year of any combination of HAP; or
    - (ii) at any developed site, a new process or production unit which in and of itself emits or has the potential to emit 10 tons per year of any HAP or 25 tons per year of any combination of HAP.

- (g) “Maximum achievable control technology” or “MACT” means the emission limitation that is not less stringent than the emission limitation achieved in practice by the best controlled similar source, and that reflects the maximum degree of reduction in emissions that the department, taking into consideration the cost of achieving such emission reduction, and any non-air quality health and environmental impacts and energy requirements, determines is achievable by the constructed or reconstructed major source of HAP.
  - (h) “Notice of MACT approval” means a document issued by the department containing all federally enforceable conditions necessary to enforce MACT or other control technologies such that the MACT emission limitation is met.
  - (i) “Process or production unit” means any collection of structures and/or equipment, that processes, assembles, applies or otherwise uses material inputs to produce or store an intermediate or final product. A single facility may contain more than one process or production unit.
- (2) The owner or operator of any affected source, as defined and applied in 40 CFR Part 63, shall comply with the requirements of 40 CFR 63, incorporated by reference in this rule. All references in 40 CFR 63, Subpart B to “permitting authority” refers to the department.
- (3) Any owner or operator who constructs a major source of HAP is required to obtain from the department a notice of MACT approval or a 112(g) exemption pursuant to this rule, prior to beginning actual construction, unless:
- (a) the major source has been specifically regulated or exempted from regulation under a MACT standard issued pursuant to 42 USC 7412(d), (h) or (j) and incorporated into 40 CFR Part 63;
  - (b) the owner or operator of the major source has already received all necessary air quality permits for such construction as of (the effective date of this rule); or
  - (c) the major source has been excluded from the requirements of 42 USC 7412(g) under 40 CFR 63.40(c), (e) or (f).
- (4) Unless granted a 112(g) exemption under (6) below, at least 180 days prior to beginning actual construction, an owner or operator who constructs a major source of HAP shall apply to the department for a notice of MACT approval. The application must be made on forms provided by the department, and must include all information required under 40 CFR 63.43(e).
- (5) When acting upon an application for a notice of MACT approval, the department shall comply with the principles of MACT determination specified in 40 CFR 63.43(d).
- (6) The owner or operator of a new process or production unit that in and of itself emits or has the potential to emit 10 tons per year of any HAP or 25 tons per year of any combination of HAP, may apply to the department for a 112(g) exemption, if the process or production unit meets the criteria contained in 40 CFR 63.41 [definition of “construct a major source” (2)(i) through (vi)]. Application must be made on forms provided by the department, at least 180 days prior to beginning actual construction. The application must include such information as may be necessary to demonstrate that the process of production unit meets the criteria referenced herein.
- (7) As further described below, and except as expressly modified by this rule, the procedural requirements of Chapter 6, subchapter 1 apply to an application for a notice of MACT approval or 112(g) exemption. For the purpose of this rule:
- (a) all references in applicable provisions of Chapter 6, subchapter 1 to “permit”, or “air quality permit” mean “notice of MACT approval” or “112(g) exemption,” as appropriate;
  - (b) all references in applicable provisions of Chapter 6, subchapter 1 to “new or altered source” mean “major source of HAP.”
- (8) The following rules govern the application, review and final approval or denial of a notice of MACT approval or 112 (g) exemption: Rules 5.112, 6.103(2), 6.103(4)-(7), 6.106, 6.107(1) and

6.107(6);

- (9) The department shall notify the applicant in writing of any final approval or denial of an application for a notice of MACT approval or 112(g) exemption.
- (10) A notice of MACT approval must contain the elements specified in 40 CFR 63.43(g). The notice expires if fabrication, erection, installation or reconstruction has not commenced within 18 months of issuance, except that the department may grant an extension which may not exceed an additional 12 months.
- (11) An owner or operator of a major source of HAP that receives a notice of MACT approval or a 112(g) exemption from the department shall comply with all conditions and requirements contained in the notice of MACT approval or 112(g) exemption.
- (12) If a MACT standard is promulgated before the date an applicant has received a final and legally effective determination for a major source of HAP subject to the standard, the applicant shall comply with the promulgated standard.
- (13) The department may revoke a notice of MACT approval or 112(g) exemption if it determines that the notice or exemption is no longer appropriate because a MACT standard has been promulgated. In pursuing revocation, the department shall follow the procedures specified in Rule 6.108. A revocation under this section may not become effective prior to the date an owner or operator is required to be in compliance with a MACT standard, unless the owner or operator agrees in writing otherwise.

### **Subchapter 6 – Incinerators**

#### **Rule 6.601 – Minimum Standards**

- (1) A person may not cause or authorize to be discharged into the outdoor atmosphere from any incinerator, particulate matter in excess of 0.10 grains per standard cubic foot of dry flue gas, adjusted to twelve percent (12%) carbon dioxide and calculated as if no auxiliary fuel had been used.
- (2) A person may not cause or authorize to be discharged into the outdoor atmosphere from any incinerator emissions that exhibit an opacity of ten percent (10%) or greater averaged over six consecutive minutes.
- (3) An incinerator may not be used to burn solid or hazardous waste unless the incinerator is a multiple chamber incinerator or has a design of equal effectiveness approved by the department prior to installation or use.
- (4) The department or Control Board shall place additional requirements on the design, testing and operation of incinerators constructed after March 20, 1992. This requirement does not apply to incinerators that burn paper waste or function as a crematorium or are in compliance with Lowest Achievable Emission Rate as defined in Rule 2.101(25) for all regulated air pollutants.

#### **Rule 6.602 – Hours of Operation**

- (1) The department may, for purposes of evaluating compliance with this rule, direct that a person may not operate or authorize the operation of any incinerator at any time other than between the hours of 8:00 AM and 5:00 PM, except that incinerators that burn only gaseous materials will not be subject to this restriction.
- (2) When the operation of incinerators is prohibited by the department, the owner or operator of the incinerator shall store the solid or hazardous waste in a manner that will not create a fire hazard or arrange for the removal and disposal of the waste in a manner consistent with ARM Title 17, Chapter 50, Subchapter 5.

### **Rule 6.603 – Performance Tests**

- (1) The provisions of this chapter apply to performance tests for determining emissions of particulate matter from incinerators. All performance tests must be conducted while the affected facility is operating at or above the maximum refuse charging rate at which such facility will be operated and the material burned must be representative of normal operation and under such other relevant conditions as the department shall specify based on representative performance of the affected facility. Test methods set forth in 40 CFR, Part 60, or equivalent methods approved by the department must be used.

### **Rule 6.604 – Hazardous Waste Incinerators**

Effective March 20, 1992, a new permit may not be issued to incinerate hazardous wastes as listed in ARM Title 17, Chapter 54, Subchapter 3, inside the Air Stagnation Zone.

### **Rule 6.605 – Additional Air Quality Permit Requirements**

- (1) In addition to the permitting requirements of Chapter 6, subchapter 1, an application for an air quality permit for a solid or hazardous waste incinerator must include the following:
  - (a) A human health risk assessment protocol (hereafter “protocol”) detailing the human health risk assessment procedures; and
  - (b) A human health risk assessment (hereafter “assessment”) that shows that ambient concentrations of pollutants from emissions constitute no more than a negligible risk to the public health, safety, and welfare and to the environment.
- (2) The protocol must include, at a minimum, methods used in compiling the emission inventory, ambient dispersion models and modeling procedures used, toxicity values for each pollutant, exposure pathways and assumptions, any statistical analysis applied and any other information necessary for the department to review the adequacy of the assessment.
- (3) The assessment must include, at a minimum, the following:
  - (a) a list of potential emissions of all pollutants specified in the federal Clean Air Act Hazardous Air Pollutants List (as defined in section 112(b) of the FCAA) from the following sources:
    - (i) emitting unit(s) to be permitted;
    - (ii) existing incineration unit(s) at the facility;
    - (iii) new or existing emitting units solely supporting any incineration unit at the facility (such as fugitive emissions from fuel storage); and
    - (iv) existing units that partially support the incineration unit if the type or amount of any emissions under an existing permit will be changed. If an existing emitting unit, wholly or partially supporting the incineration facility, increases the types or amount of its emissions, so that a permit alteration is required, that portion of the emissions increase attributable to the support of the incineration facility must be considered in the human health risk assessment.
  - (b) a characterization of emissions and ambient concentrations of air pollutants, including hazardous air pollutants, from any existing emission source at the facility; and
  - (c) an assessment of impacts of all pollutants inventoried in (a) above, except pollutants may be excluded if the department determines that exposure from inhalation is the only appropriate pathway to consider and if:

- (i) the potential to emit the pollutant is less than  $1.28 \times 10^{-13}$  grams per second; the source has a stack height of at least 2 meters, a stack velocity of at least 0.645 meters per second, and a stack exit temperature of at least 800°F; and the stack is at least 5 meters from the property boundary; or
  - (ii) the ambient concentrations of the pollutants (calculated using the potential to emit; enforceable limits or controls may be considered) are less than the levels specified in ARM 17.8.770 (See Tables 1 and 2 in Appendix C).
- (4) The assessment must address risks from all appropriate pathways. Incineration facilities that do not emit or emit only minute amounts of hazardous air pollutants contained in Tables 3 or 4 in Appendix C need only address impact from the inhalation exposure pathway and may use a department supplied screening model to assess human health risk.
- (5) The assessment must be performed in accordance with accepted human health risk assessment practices, or state or federal guidelines in effect when the assessment is performed, and must address impacts on sensitive populations. The human health risk must be calculated using the source's potential to emit. Enforceable limits or controls may be considered. The department may approve alternative procedures if site-specific conditions warrant.
- (6) The department may impose additional requirements for the assessment, on a case-by-case basis, if the department reasonably determines that the type or amount of material being incinerated, the proximity to sensitive populations, short-term emissions variations, acute health impact, or the local topographical or ventilation conditions require a more detailed assessment to adequately define the potential public health impact. Additional requirements for the assessment may include, but are not limited to, specific emission inventory procedures for determining emissions from the incineration facility, requiring use of more sophisticated air dispersion models or modeling procedures and consideration of additional exposure pathways.
- (7) The department shall include a summary of the protocol in the permit analysis. The summary must clearly define the scope of the assessment, must describe the exposure pathways used and must specify any pollutants identified in the emission inventory that were not required to be included in the assessment. The summary must also state whether, and to what extent, the impacts of existing emissions, or the synergistic effect of combined pollutants, were considered in the final human health risk level calculated to determine compliance with the negligible risk standard. The summary must also state that environmental effects unrelated to human health were not considered in determining compliance with the negligible risk standard, but were evaluated in determining compliance with all applicable rules or requirements requiring protection of public health, safety and welfare and the environment.

## **Subchapter 7 – Wood Waste Burners**

### **Rule 6.701 – Opacity Limits**

A person may not cause or authorize to be discharged into the outdoor atmosphere from any wood-waste burner any emissions that exhibit an opacity of twenty percent (20%) or greater averaged over six (6) consecutive minutes. The provisions of this section may not be exceeded for more than sixty (60) minutes in eight consecutive hours for building of fires in wood-waste burners.

### **Rule 6.702 – Operation**

- (1) A thermocouple and a recording pyrometer or other temperature measurement and recording device approved by the department must be installed and maintained on each wood-waste burner. The thermocouple must be installed at a location near the center of the opening for the exit gases, or at another location approved by the department.

- (2) A minimum temperature of 700°F must be maintained during normal operation of all wood-waste burners. A normal start-up period of one (1) hour is allowed during which the 700°F minimum temperature does not apply. The burner must maintain 700°F operating temperature until the fuel feed is stopped for the day.
- (3) The owner or operator of a wood-waste burner shall maintain a daily written log of the wood-waste burner's operation to determine optimum patterns of operations for various fuel and atmospheric conditions. The log must include, but not be limited to, the time of day, draft settings, exit gas temperature, type of fuel, and atmospheric conditions. The log or a copy of it must be submitted to the department within ten (10) days after it is requested.

**Rule 6.703 – Fuels**

- (1) A person may not use a wood-waste burner for the burning of other than normal production process wood-waste transported to the burner by continuous flow conveying methods.
- (2) Materials that cannot be disposed of through outdoor burning, as specified in Rule 7.103 (1), (2), (4) and (5), may not be burned in a wood-waste burner.