§45-5-1. General.

1.1. Scope. -- The purpose of this rule is to prevent and control air pollution from the operation of coal preparation plants, coal handling operations and coal refuse disposal areas.

1.2. Authority. -- W. Va. Code §22-5-1 et seq.

1.3. Filing Date. -- June 2, 2000.

1.4. Effective Date. -- August 31, 2000.

1.5. Repeal of Former Rule. -- This legislative rule repeals and replaces 45CSR1 “To Prevent and Control Air Pollution from Coal Refuse Disposal Areas” which was filed on January 1, 1965 and became effective on January 1, 1965.

1.6. Former Rules. -- This legislative rule amends 45CSR5 “To Prevent and Control Air Pollution from the Operation of Coal Preparation Plants and Coal Handling Operations” which was filed on April 28, 1995 and became effective May 1, 1995.

§45-5-2. Definitions.


2.2. "Air Pollution Control Equipment" means any equipment used for collecting gasborne particulate matter for the purpose of preventing or reducing particulate matter emissions into the open air.

2.3. "Air Table" means a device using a gaseous separating media for the primary purpose of improving the product quality.

2.4. "Coal Preparation Plant" means and includes any facility (excluding underground mining operations) that prepares coal by one or more of the following processes: screening, breaking, crushing, wet or dry cleaning and thermal drying, and further such definition of a coal preparation plant shall include all coal handling operations associated with the processes described above, but shall not include:

2.4.a. Any facility that is designed to process less than two hundred (200) tons of coal per day;

2.4.b. Any facility or equipment subject to the requirements of 45CSR2, 45CSR3, 45CSR7; or

2.4.c. Any facility which would be defined as a coal preparation plant solely because it incorporates a stationary grizzly or scalping screen to separate oversized refuse from coal.

2.5. “Coal Refuse” means any combination of carbonaceous waste with rock, shale, culm boney, slate, clay and related materials associated with or near a coal seam, which are either brought above ground or otherwise removed from the mine in the process of mining coal, or which are separated from coal during the cleaning or preparation operations: Provided that coal refuse shall not mean overburden from strip-mining operations or incombustible materials from mine shafts and mine tunnels.
2.6. “Coal Refuse Disposal Area” means any area or plot of land which is used as a place for dumping, storage or disposal of coal refuse. A coal refuse pile must be contained in a single coal refuse disposal area; however, a coal refuse disposal area may contain two (2) or more coal refuse piles if the area is so designated.

2.7. “Coal Refuse Pile” means any deposit of coal refuse on the surface which is intended as a permanent disposal of or long-term storage of such material. Continuous deposits of coal refuse and deposits, which are not separated, shall be considered a single coal refuse pile.

2.8. "Director" means the director of the division of environmental protection or such other person to whom the director has delegated authority or duties pursuant to W. Va. Code §§ 22-1-6 or 22-1-8.

2.9. "Division of Environmental Protection" or "DEP" means that Division of the West Virginia Division of Environmental Protection which is created by the provisions of W. Va. Code §22-1-1, et seq.

2.10. "Fuel" means a fuel such as a solid, gaseous or liquid fuel which is fired in fuel burning equipment.

2.11. "Fuel Burning Equipment" means and includes any chamber, apparatus, device, mechanism, stack or structure used in the process of burning fuel for the primary purpose of producing heat for a thermal dryer.

2.12. "Fugitive Dust" means any and all particulate matter generated, which, if not confined or suppressed by water or chemical treatment, would be emitted directly into the open air from points other than a stack outlet.

2.13. "Fugitive Dust Control System" means any equipment or method used to confine, collect and dispose of fugitive dust, including, but not limited to, hoods, bins, duct work, fans, air pollution control equipment and equipment used to prevent or minimize the emission of fugitive dust by water or chemical treatment.

2.14. "Handling Operation” means and includes, but is not limited to, all coal grinding, crushing, picking, screening, conveying, storing and stockpiling operations not associated with a coal preparation plant as defined in this rule, and which are not also subject to the emission control requirements of 45CSR2, 45CSR3 or 45CSR7.

2.15. "Opacity" means the degree to which emissions reduce the transmission of light and obscure the view of an object in the background.

2.16. “Operation of a Coal Refuse Disposal Area” means the act of disposing, depositing or dumping of coal refuse upon a coal refuse disposal area or of physically altering the coal refuse disposal area, except by removal of ashes, red dog or other material from a burned-out coal refuse pile.

2.17. "Particulate Matter" means any material, except uncombined water, that exists in a finely divided form as a liquid or solid.

2.18. "Person" means any and all persons, natural or artificial, including the state of West Virginia or any other state, the United States of America, any municipal, statutory, public or private corporation organized or existing under the laws of this or any other state or country, and any firm, partnership or association of whatever nature.


2.20. "Stack", for the purpose of this rule, means, but is not limited to, any duct, control equipment exhaust or similar apparatus, which vents gases containing particulate matter into the open air from operations including, but not limited to, furnaces, drying chambers and air separation (table) operations.

2.21. "Standard Cubic Foot" means one (1) cubic foot of dry gas, measured at standard conditions of sixty-eight degrees Fahrenheit (68°F) and 29.92 inches of mercury column.
2.22. "Thermal Dryer" means a device using fuel burning equipment for the primary purpose of reducing the moisture content of coal.

2.23. Other words and phrases used in this rule, unless otherwise indicated, shall have the meaning ascribed to them in W. Va. Code §22-5-1 et seq.


3.1. No person shall cause, suffer, allow or permit emission of particulate matter into the open air from any stack which is twenty percent (20%) opacity or greater, except as noted in subsection 3.2.

3.2. The provisions of subsection 3.1 shall not apply to particulate matter emitted, which is less than sixty percent (60%) opacity for a period or periods aggregating no more than five (5) minutes in any sixty (60) minute period during operation.

3.3. The provisions of subsections 3.1 and 3.2 shall not apply to particulate matter emitted, which is less than sixty percent (60%) opacity for a period of up to eight (8) minutes in any operating day for the purposes of building a fire of operating quality in the fuel burning equipment of a thermal dryer.

3.4. No person shall cause, suffer, allow or permit emission of particulate matter into the open air from any fugitive dust control system which is twenty percent (20%) opacity or greater.


4.1. No person shall cause, suffer, allow or permit particulate matter to be vented into the open air from any thermal dryer exhaust in excess of the following limitations:

4.1.a. Thermal dryers which commenced construction or modification after October 24, 1974, shall meet emission limitations set forth under 45CSR16.

4.1.b. Thermal dryers installed before October 24, 1974, that are not subject to subdivision 4.1.a, shall comply with the limitations and requirements set forth in the Appendix to this rule.

4.2. No person shall circumvent this rule by adding additional gas to any dryer exhaust or group of dryer exhausts for the purpose of reducing the grain loading.

4.3. No person shall cause, suffer, allow or permit the exhaust gases from a thermal dryer to be vented into the open air at an altitude of less than eighty (80) feet above the foundation grade of the structure containing the dryer or less than ten (10) feet above the top of said structure or any adjacent structure, whichever is greater. In determining the desirable height of a plant stack, due consideration shall be given to the local topography, meteorology, the location of nearby dwellings and public roads, the stack emission rate and good engineering practice as set forth in 45CSR20.

§45-5-5. Control and Prohibition of Particulate Emissions From an Air Table Operation of a Coal Preparation Plant.

5.1. No person shall cause, suffer, allow or permit particulate matter to be vented into the open air from any air table exhaust in excess of 0.05 grains per dry standard cubic foot of exhaust gases.

5.2. No person shall circumvent this rule by adding additional gas to any air table exhaust or group of air table exhausts for the purpose of reducing the grain loading.
§45-5-6. Control and Prohibition of Fugitive Dust Emissions From Coal Handling Operations and Preparation Plants.

6.1. No person shall cause, suffer, allow or permit a coal preparation plant or handling operation to operate that is not equipped with a fugitive dust control system. This system shall be operated and maintained in such a manner as to minimize the emission of particulate matter into the open air.

6.2. The owner or operator of a coal preparation plant or handling operation shall maintain dust control of the premises and owned, leased or controlled access roads by paving, or other suitable measures. Good operating practices shall be observed in relation to stockpiling, car loading, breaking, screening and general maintenance to minimize dust generation and atmospheric entrainment.

6.3. Fugitive emissions from coal preparation plants and handling operations which are subject to this rule shall be exempt from the provisions of 45CSR17, provided that such sources shall not be exempt from the provisions of W. Va. Code §§22-5-1 et seq., including the provisions of W. Va. Code §22-5-3 relating to statutory air pollution.

6.4. Owners or operators of coal handling operations and coal preparation plants located in the area of Brooke County west of State Route 2, north of an extension of the southern boundary of Steubenville Township in Jefferson County, Ohio, and south of the Market Street Bridge shall comply with the following fugitive dust control provisions:

6.4.a. Particulate matter mass emissions shall not exceed 0.001 pounds per ton of coal input from any coal crusher or coal screening operation.

6.4.b. Visible particulate emissions shall not exceed five percent (5%) opacity from any coal crushing or screening operation or from any coal conveying system.

6.4.c. A definitive, approvable plan to control fugitive dust entrainment and emissions from vehicular traffic and activity areas including, but not limited to, paved and unpaved haulroads, stockpile areas, haulway berms and plant access roads to public streets and highways shall be submitted to the Director and such a plan shall be embodied in a consent order approved by the Director. For plants or handling operations in existence on the effective date of this rule, the plan shall be submitted to the Director on or before May 1, 1993. For plants or handling operations not in existence on the effective date of this rule, the plan shall be deemed filed upon filing of an application for construction, modification or relocation pursuant to section 10.

6.4.c.1. Provide specific scheduled treatment frequencies for all areas of vehicular activity and stockpiling using water and/or chemical dust suppressants at sufficient application rates and intensities and wet flushing and vacuum sweeping for paved surfaces so as to reduce uncontrolled fugitive dust emissions by at least ninety-five percent (95%) as determined by methods and procedures in the document, "Control of Open Fugitive Dust Sources" (EPA 450/3-88-008, September, 1988) or other measures which achieve equivalent emission reductions as determined in accordance with the reference document.

6.4.c.2. Provide for daily monitoring and recordkeeping and not less than monthly reporting of dust control measures to the Director, including, but not limited to, water and chemical usage rates; chemical dust suppressant dilution ratios; accurate water and/or chemical flow rates or volumes through stationary or mobile dust suppression equipment and system pressures; beginning and ending times for treatment; traffic rates and types of vehicles using plant haulways, access roads and other vehicle activity areas; meteorological conditions relevant to control program requirements and equipment maintenance and downtime records.

6.4.c.3. Provide that no coal be unloaded from trucks which are not, upon entry to the plant or handling facility, tarped or otherwise covered to prevent dust entrainment, spillage or reentrainment.
6.4.c.4. Provide that the wheels, tires and underbodies of all coal trucks be fully cleaned by an automatic washing system or equivalently effective system prior to exiting onto paved streets or highways from the premises of the plant or coal handling operation if such trucks travel over unpaved or soiled areas within the plant or coal handling operation.

6.4.c.5. Provide that all paved traffic areas be water flushed and vacuum or broom swept daily or alternatively be treated with water and/or chemical dust suppressants in accordance with paragraph 6.4.c.1.

6.4.c.6. Provide that all reports required under this section be certified to be true and accurate by the owner or operator prior to submission to the Director.

6.4.c.7. Provide that the design of dust suppression systems or equipment, including but not limited to, number of trucks and truck tank capacity, spray bar or header volumes and pressures, spray system pump specifications, type of chemicals used, number and design of vacuum trucks maintained and other similar information be clearly incorporated.

6.4.d. The Director may consider or incorporate exceptional provisions to the fugitive dust control plans or schedules approved pursuant to subdivision 6.4.c. taking into consideration such conditions as rainfall, snow cover and freezing weather.

§45-5-7. Standards for Coal Refuse Disposal Areas.

7.1. In order to prevent and control air pollution from coal refuse disposal areas, the operation of coal refuse disposal areas shall be conducted in accordance with the standards established by this section.

7.2. Coal refuse is not to be deposited on any coal refuse disposal area unless the coal refuse is deposited in such a manner as to minimize the possibility of ignition of the coal refuse.

7.3. Coal refuse disposal areas shall not be so located with respect to mine openings, tipples or other mine buildings, unprotected coal outcrops or steam lines, that these external factors will contribute to the ignition of the coal refuse on such coal refuse disposal areas.

7.4. Vegetation and combustible materials shall not be left on the ground at the site where a coal refuse pile is to be established, unless it is rendered inert before coal refuse is deposited on such site.

7.5. Coal refuse shall not be dumped or deposited on a coal refuse pile known to be burning, except for the purpose of controlling the fire or where the additional coal refuse will not tend to ignite or where such dumping will not result in statutory air pollution.

7.6. Materials with low ignition points used in the production or preparation of coal, including, but not limited to, wood, brattice cloth, waste paper, rags, oil and grease, shall not be deposited on any coal refuse disposal area or in such proximity as will reasonably contribute to the ignition of a coal refuse disposal area.

7.7. Garbage, trash, household refuse and like materials shall not be deposited on or near any coal refuse disposal area.

7.8. The deliberate ignition of a coal refuse disposal area or the ignition of any materials on such an area by any person or persons is prohibited.


8.1. Each burning coal refuse disposal area which allegedly causes air pollution shall be investigated by the Director.

8.2. Each burning coal refuse disposal area which causes air pollution shall be considered on an individual basis by the Director. Consistent with the declaration of policy and purpose set forth in W. Va. Code §22-5-1, as well as the established facts and circumstances of the particular case, the Director shall determine and may order the effectuation of those air pollution control measures which are adequate for each such
coal refuse disposal area.

8.3. With respect to all burning coal refuse disposal areas, the person responsible for the coal refuse disposal areas or the land on which the coal refuse disposal areas are located shall use due diligence to control air pollution from the coal refuse disposal areas. Consistent with the declaration of policy and purpose set forth in W. Va. Code §22-5-1, the Director shall determine what constitutes due diligence with respect to each such burning coal refuse disposal area. When a study of any burning coal refuse disposal area by the Director establishes that air pollution exists or may be created, the person responsible for the coal refuse disposal area or the land on which the coal refuse disposal area is located shall submit to the Director a report setting forth satisfactory methods and procedures to eliminate, prevent or reduce the air pollution. The report shall be submitted within such time as the Director shall specify. The report for the elimination, prevention or reduction of air pollution shall contain sufficient information, including, completion dates, to establish that the corrective measures can be executed with due diligence. If approved by the Director, the corrective measures and completion dates shall be embodied in a consent order issued pursuant to W. Va. Code §§ 22-5-1 et seq. If the report is not submitted as requested or if the Director determines that the methods and procedures set forth in the report are not adequate to reasonably control the air pollution he or she shall issue an order requiring the elimination, prevention or reduction of the air pollution.


9.1. Thermal dryers subject to subsection 4.1 shall meet the monitoring and calibration requirements set forth under 45CSR16.

9.2. The owner or operator of a thermal dryer subject to subdivision 4.1.b shall install, calibrate, maintain and continuously operate monitoring devices, as set forth in the Appendix to this rule.

§45-5-10. Construction, Modification and Relocation Permits.

10.1. No person shall construct, modify or relocate any coal preparation plant or coal handling operation without first obtaining a permit in accordance with the provisions of W. Va. Code §§22-5-1 et seq. and the Director's rules for review and permitting of new or modified sources, except that coal handling operations which are not "stationary sources" as defined by subdivision 2.25.b of 45CSR13 are not required to obtain a permit under 45CSR13. The terms "construction", "modification" and "relocation" shall have the meaning ascribed to them in 45CSR13.

§45-5-11. Operating Permits.

11.1. The owner or operator of each coal preparation plant shall submit a complete application for an operating permit to the Director.

11.1.a. The operating permit application shall contain sufficient information as in the judgement of the Director is necessary to enable him to determine whether the preparation plant and air pollution control equipment or measures comply with this rule and other applicable rules. Information to be furnished in the permit application shall include but not be limited to:

11.1.a.1. A description of the nature, location, design capacity and typical and maximum operating schedules of the facility, including, specifications and drawings showing its design and plant lay-out; and

11.1.a.2. A detailed description as to what systems of continuous emission reduction are employed by the facility, emission estimates and any other information as necessary to determine the required emissions control technology or measures that must be applied.

11.2. It shall be unlawful for any person to operate a coal preparation plant, which was in existence on May 1, 1995, that has not submitted a completed operating permit application to the Director in accordance with this section by August 1, 1995.

11.3. Any owner or operator of a coal preparation plant which is constructed, modified or relocated after May 1, 1995 pursuant to a preconstruction permit as provided under section
11.4. No owner or operator of a coal preparation plant shall be deemed to be in violation of this section during the pendency of the Director's operating permit review period, provided that such owner or operator has submitted a complete operating permit application in accordance with this section and is otherwise in compliance with the Code and the rules promulgated thereunder.

11.4.a. The owner or operator shall expeditiously correct any deficiencies and errors found in the permit application or provide necessary omitted or supplemental information identified to the owner or operator by the Director or his or her duly authorized representative.

11.4.b. The owner or operator shall submit a written and certified response to any written Notice of Deficiency (NOD) forwarded by the Director or his or her duly authorized representative within twenty (20) days of receipt of the NOD.

11.5. If, after any investigation made by the Director, or his designated representative, the Director shall be of the opinion that an operating permit holder is violating the provisions of this rule, the Director may issue an order suspending or revoking the operating permit in the manner provided under W. Va. Code §22-5-5. Such order shall be considered a cease and desist order for purposes of administrative and judicial review.

11.6. The possession of an operating permit by any person shall in no way relieve the holder thereof of the obligation to comply with the provisions of this or any other rule or W. Va. Code §22-5-1 et seq.; provided:

11.6.a. That the owner or operator of a source for which an operating permit is required under this rule and under 45CSR30 shall only be required to submit an operating permit application and to obtain an operating permit pursuant to 45CSR30; and

11.6.b. That the owner or operator of a source for which an operating permit is required under this rule who chooses to obtain a general permit relating to coal preparation plants and coal handling operations pursuant to 45CSR13 shall only be required to submit the required registration and obtain coverage under the general permit.

11.7. Upon determination by the Director that the applicant for a permit for a coal preparation plant may violate applicable emissions standards or other applicable rules or may cause violations of ambient air standards the Director shall issue an order denying an operating permit for such facility in the manner provided under W. Va. Code §22-5-12. Such order shall be considered a cease and desist order for purposes of administrative and judicial review.

11.8. The Director shall not issue an operating permit to any person who has not paid in full all fees required under 45CSR22 or any other applicable fee rule. Failure to pay applicable fees shall be cause for operating permit denial, suspension or revocation, provided that the payment of fees required under 45CSR22 and possession of a 45CSR22 certificate to operate shall not constitute possession of a valid operating permit as required under this rule.

11.9. Operating permits issued under this rule shall be continuous unless revised, renewed, revoked, suspended or otherwise changed under the provisions of this rule or any other applicable legislative rule.

11.10. If not previously submitted, a complete application for an operating permit shall be submitted to the Director at least sixty (60) days prior to the date that an inactive plant subject to this section is to be reactivated.

§45-5-12. Reporting and Testing.
12.1. At such reasonable times as the Director may designate, the owner or operator of a coal preparation plant may be required to conduct or have conducted stack tests to determine the dust loading in exhaust gases and mass emission rates of particulate matter. All tests to determine compliance with exhaust gas dust concentrations and particulate matter mass emission rates shall be conducted in accordance with Methods 1-5 of 40 CFR Part 60, Appendix A provided that all compliance tests must consist of not less than three (3) test runs, test run duration shall not be less than sixty (60) minutes, and not less than thirty (30) standard cubic feet of exhaust gas must be sampled during each test run. Should the Director exercise his option to conduct such tests, the operator will provide all necessary sampling connections and sampling ports to be located in such manner as the Director may require, power for test equipment and the required safety equipment such as scaffolding, railings, ladders, etc., to comply with generally accepted good safety practices.

12.2. The Director, or his duly authorized representative, may conduct such other tests as he may deem necessary to evaluate air pollution emissions other than those noted in subsection 12.1.

12.3. The owner or operator shall submit a test protocol for the Director’s approval not less than thirty (30) days prior to any test to determine compliance with this rule and shall provide at least fifteen (15) days notice of all compliance tests to the Director.

12.4. Tests to determine compliance with the visible emission limitations of sections 3 and 6 shall be conducted by certified visible emission observers in accordance with Method 9 of 40 CFR Part 60, Appendix A.

12.5. Nothing in subsection 12.4, however, shall preclude any owner or operator or the Director from using opacity data from a properly installed, calibrated, maintained and operated continuous opacity monitor from being used as evidence to demonstrate compliance or a violation of visible emission requirements of this rule.

12.6. Any stack venting thermal dryer exhaust gases and/or air table exhaust gases or exhaust gases or air from any air pollution control device shall include straight runs of sufficient length to establish flow patterns consistent with acceptable stack sampling procedures. Flow straightening devices shall be required where cyclonic gas flow would exist in the absence of such devices.


13.1. Due to unavoidable malfunctions of equipment, emissions exceeding those set forth in this rule may be permitted by the Director, upon specific application to the Director, for periods not to exceed ten (10) days. Such application shall be made within twenty-four (24) hours of the malfunction.

13.2. In the case of major equipment failure, an additional time period may be granted by the Director provided a corrective program including a final compliance date is submitted to the Director by the applicant. Upon determination by the Director that a variance beyond ten (10) days should be granted, the Director shall cause to be published in the State Register and within the county wherein the source lies and all contiguous West Virginia counties a Class I legal advertisement of notice that such a variance has been granted. Within fifteen (15) days of the publication of the later of either the State Register notice or Class I legal advertisement notice, any person whose interest may be affected by the granting of such variance may request a conference with the Director to show cause why the variance should be terminated. After such conference or, if no conference is requested, fifteen (15) days after publication of the later of either the State Register notice or Class I legal advertisement notice, the Director may issue an order terminating such variance. If the Director determines that additional time shall not be granted the Director shall provide prompt notice in writing to the applicant of this determination.

13.3. Any person, whose interest may be affected by the granting of a variance in excess of ten (10) days and who requests a conference with the Director pursuant to the provisions of subsection 13.2, may appeal an order of variance.
to the Air Quality Board in the same manner as appeals of cease and desist orders under the provisions of W. Va. Code §22-5-5. Any person, whose interest may be affected by the termination of a variance or the denial of a variance in excess of ten (10) days, pursuant to the provisions of subsection 13.2, may appeal such action to the Air Quality Board in the same manner as appeals of cease and desist orders under the provisions of W. Va. Code §22-5-5.

§45-5-14. Transfer of Permits.

14.1. Any person holding a valid operating permit under this rule may request that the Director transfer the operating permit to another person providing the following conditions are met:

14.1.a. The permit holder describes, in writing, the reasons for or circumstances of the transfer, lists all relevant air quality permit numbers and certifies that the facility to which the permit pertains is in compliance with all air permits issued by the Director and all applicable rules of the Director;

14.1.b. The transferee identifies and acknowledges, in writing, that it accepts and will comply with all permit(s) issued by the Director as identified in the notice of transfer filed pursuant to subdivision 14.1.a and that it will comply with all applicable rules; and

14.1.c. The permit holder or transferee pays, at the time of the request for transfer, a transfer fee of two hundred dollars ($200) payable to the Air Pollution Control Fund. Such payment satisfies the requirement of subsection 4.2 of 45CSR22.

14.2. Once the permittee and proposed transferee have complied with subsection 14.1, such a transfer shall be deemed approved unless the Director notifies the permittee and proposed transferee in writing, within thirty (30) days, that:

14.2.a. Additional information is required in order to process and act on the transfer; or

14.2.b. Such a transfer is denied, in which event the supporting findings of fact and legal authority for said denial shall be set forth in writing.

14.2.b.1. Any such denial may be appealed in the same manner as an appeal from permit denial under W. Va. Code §22-5-14 and applicable rules.

§45-5-15. Inconsistency Between Rules.

15.1. In the event of any inconsistency between this rule and Appendix and any other existing rule of the West Virginia Division of Environmental Protection, such inconsistency shall be resolved by the determination of the Director and such determination shall be based upon the application of the more stringent provision, term, condition, method or rule.
Appendix
Particulate Emission Limitations and Operational Monitoring Requirements
Applicable to Thermal Dryers Installed Before October 25, 1974

Particulate Emission Limitations

1.1. Thermal dryers installed on or before March 1, 1970, shall not exceed the emission limitations of the following table:

<table>
<thead>
<tr>
<th>Total Plant Volumetric Flow Rate (Standard Cubic Feet Per Minute)</th>
<th>Maximum Allowable Particulate Loading (Grains Per Standard Cubic Foot)</th>
</tr>
</thead>
<tbody>
<tr>
<td>120,000 or less</td>
<td>0.12</td>
</tr>
<tr>
<td>172,000</td>
<td>0.11</td>
</tr>
<tr>
<td>245,000</td>
<td>0.10</td>
</tr>
<tr>
<td>351,000</td>
<td>0.09</td>
</tr>
<tr>
<td>500,000 and above</td>
<td>0.08</td>
</tr>
</tbody>
</table>

1.2. Thermal dryers installed after March 1, 1970, but before October 24, 1974 shall not exceed the emission limitations of the following table:

<table>
<thead>
<tr>
<th>Total Plant Volumetric Flow Rate (Standard Cubic Feet Per Minute)</th>
<th>Maximum Allowable Particulate Loading (Grains Per Standard Cubic Foot)</th>
</tr>
</thead>
<tbody>
<tr>
<td>75,000 or less</td>
<td>0.10</td>
</tr>
<tr>
<td>111,000</td>
<td>0.09</td>
</tr>
<tr>
<td>163,000</td>
<td>0.08</td>
</tr>
<tr>
<td>240,000 and above</td>
<td>0.07</td>
</tr>
</tbody>
</table>

1.3. For the volumetric flow rate between any two consecutive volumetric flow rates stated in subsection 1.1. and subsection 1.2. of this Appendix, limitations shall be as determined by linear interpolation. For the purpose hereof, the total volumetric flow rate shall be the total standard cubic feet of dry gas passed through all thermal dryers at one plant location. This value shall be determined by methods which are acceptable to the Director.

1.4. When modifications were made to plants after March 1, 1970 but before October 24, 1974, that resulted in a significant increase in the total gas volume passing through a thermal dryer(s), said dryer(s) will be subject to the emission limitations of subsection 1.2. of this Appendix even though such modifications do not include the installation of a new thermal dryer(s).

Monitoring of Operations

2.1 A monitoring device for the continuous measurement of the temperature of the gas stream at the exit of the thermal dryer. The monitoring device is to be certified by the manufacturer to be accurate within plus or minus three degrees Fahrenheit (±3°F).
Appendix
Particulate Emission Limitations and Operational Monitoring Requirements
Applicable to Thermal Dryers Installed Before October 25, 1974

2.2 For thermal dryers that use venturi scrubber emissions control equipment:

2.2.a. A monitoring device for the continuous measurement of the pressure loss through the venturi constriction of the control equipment. The monitoring device is to be certified by the manufacturer to be accurate within plus or minus one inch (± 1 in.) water gauge.

2.2.b. A monitoring device for the continuous measurement of the water supply pressure to the control equipment. The monitoring device is to be certified by the manufacturer to be accurate within plus or minus five percent (±5%) design water supply pressure. The pressure sensor must be located close to the water discharge point or at such point as approved by the Director.

2.3. All monitoring devices required under subsection 2.2. of this Appendix are to be recalibrated at least once annually.