

1. 15A NCAC 2D .0524 "NEW SOURCE PERFORMANCE STANDARDS" - For each calciner and dryer at a mineral processing plant (NO EQUIPMENT SELECTED), the Permittee shall comply with all applicable provisions, including the notification, testing, reporting, recordkeeping, and monitoring requirements contained in Environmental Management Commission Standard 15A NCAC 2D .0524 "New Source Performance Standards" (NSPS) as promulgated in 40 CFR 60, Subpart UUU "Standards of Performance for Calciners and Dryers in Mineral Industries", including Subpart A "General Provisions."
  - a. NSPS Reporting Requirements - In addition to any other notification requirements to the Environmental Protection Agency (EPA), the Permittee is required to NOTIFY the Regional Supervisor, DAQ, in WRITING, of the following:
    - i. The date construction (40 CFR 60.7) or reconstruction (40 CFR 60.15) of an affected source is commenced, postmarked no later than 30 days after such date. This requirement shall not apply in the case of mass-produced facilities which are purchased in completed form.
    - ii. The actual date of initial start-up of an affected source, postmarked within 15 days after such date. If the affected source is permitted to burn multiple fuels, then the actual date of start-up, for each fuel, must be submitted and postmarked within 15 days after such date.
  - b. NSPS UUU Recordkeeping And Reporting Requirements - In addition to any other recordkeeping requirements of the EPA, the Permittee is required to meet recordkeeping and reporting requirements as follows:
    - i. Records of the measurements required in paragraph (e) shall be retained for at least 2 years.
    - ii. Each owner or operator who uses a wet scrubber to comply with paragraph (c) shall determine and record once each day, from the recordings of the monitoring devices in (e)(iv), an arithmetic average over a 2-hour period of both the change in pressure of the gas stream across the scrubber and the flowrate of the scrubbing liquid.
    - iii. Each owner or operator shall submit written reports semiannually of exceedances of control device operating parameters required to be monitored by paragraph (e) of this section. For the purpose of these reports, exceedances are defined as follows:
      - A. All 6-minute periods during which the average opacity from dry control devices is greater than 10 percent; or
      - B. Any daily 2-hour average of the wet scrubber pressure drop determined as described in paragraph (b)(ii) above that is less than 90 percent of the average value recorded according to the initial or most

recent performance test that demonstrated compliance with the particulate matter standard (see paragraph (d)); or

C. Each daily wet scrubber liquid flow rate recorded as described in paragraph (b)(ii) above that is less than 80 percent or greater than 120 percent of the average value recorded during the initial or most recent performance test that demonstrated compliance with the particulate matter standard.

c. NSPS Emissions Limitations - As required by 15A NCAC 2D .0524, the following permit limits shall not be exceeded:

Affected Source(s)	Pollutant	Emission Limit
(ID No. xx)	Particulate Matter	Contains particulate matter not in excess of 0.092 grams per dry standard cubic meter (g/dscm) [0.040 grains per dry standard cubic foot (gr/dscf)] for calciners and for calciners and dryers installed in series, and,  Not in excess of 0.057 g/dscm (0.025 gr/dscf) for dryers.
	Particulate Matter (Visible emissions)	Not greater than 10 percent opacity, unless the emissions are discharged from an affected facility using a wet scrubbing control device.

d. NSPS Performance Testing - As required by 15A NCAC 2D .0524, the following performance tests shall be conducted:

Affected Source(s)	Pollutant	Test Method
(ID No. xx)	Particulate Matter	Method 5 shall be used to determine the particulate matter concentration. The sampling time and volume for each test run shall be at least 2 hours and 1.70 dscm.
(ID No. xx)	Particulate Matter (Visible emissions)	Method 9

- i. During the initial performance test of a wet scrubber, the owner or operator shall use the monitoring devices of paragraph (e) (iv) to determine the average change in pressure of the gas stream across the scrubber and the average flowrate of the scrubber liquid during each of the particulate matter runs. The arithmetic averages of the three runs shall be used as the baseline average values for the purposes of paragraph (b) (iii) above.
  - ii.
    - A. All performance tests shall be conducted in accordance with EPA Reference Methods, contained in 40 CFR 60, Appendix A.
    - B. The EPA Administrator retains the exclusive right to approve equivalent and alternative test methods, continuous monitoring procedures, and reporting requirements.
    - C. Within 60 days after achieving the maximum production rate at which the source(s) will be operated, but not later than 180 days after the initial start-up of the affected source, for each fuel permitted, the Permittee shall conduct the required performance test(s) and submit two copies of a written report of the test results to the Regional Supervisor, DAQ.
    - D. The Permittee shall be responsible for ensuring, within the limits of practicality, that the equipment or process being tested is operated at or near its maximum normal production rate or at a lesser rate if specified by the Director or his delegate.
    - E. All associated testing costs are the responsibility of the Permittee.
    - F. At least 45 days prior to performing any required emissions testing, the Permittee must submit two copies of a testing protocol to the Regional Supervisor, DAQ for review and approval. All testing protocols must be approved by the DAQ prior to performing such tests.
    - G. To afford the Regional Supervisor, DAQ, the opportunity to have an observer present, the Permittee shall PROVIDE the Regional Office, in WRITING, at least 15 days notice of any required performance test(s).
- e. NSPS Monitoring of emissions and operations.
- i. With the exception of the process units described in paragraphs (ii), (iii), and (iv) below of this section, the owner or operator of an affected facility subject to the provisions of this subpart who uses a dry control device to comply with the mass emission standard shall install, calibrate, maintain, and operate a continuous opacity monitoring (COM) system to measure and record the opacity of emissions discharged into the atmosphere from the control device.

- ii. In lieu of a continuous opacity monitoring system, the owner or operator of a ball clay vibrating grate dryer, a bentonite rotary dryer, a diatomite flash dryer, a diatomite rotary calciner, a feldspar rotary dryer, a fire clay rotary dryer, an industrial sand fluid bed dryer, a kaolin rotary calciner, a perlite rotary dryer, a roofing granules fluid bed dryer, a roofing granules rotary dryer, a talc rotary calciner, a titanium dioxide spray dryer, a titanium dioxide fluid bed dryer, a vermiculite fluid bed dryer, or a vermiculite rotary dryer who uses a dry control device may have a certified visible emissions observer measure and record three 6-minute averages of the opacity of visible emissions to the atmosphere each day of operation in accordance with Method 9 of Appendix A of part 60.
  - iii. The owner or operator of a ball clay rotary dryer, a diatomite rotary dryer, a feldspar fluid bed dryer, a fuller's earth rotary dryer, a gypsum rotary dryer, a gypsum flash calciner, gypsum kettle calciner, an industrial sand rotary dryer, a kaolin rotary dryer, a kaolin multiple hearth furnace, a perlite expansion furnace, a talc flash dryer, a talc rotary dryer, a titanium dioxide direct or indirect rotary dryer or a vermiculite expansion furnace who uses a dry control device is exempt from the monitoring requirements of this section.
  - iv. The owner or operator of an affected facility subject to the provisions of this subpart who uses a wet scrubber to comply with the mass emission standard for any affected facility shall install, calibrate, maintain, and operate monitoring devices that continuously measure and record the pressure loss of the gas stream through the scrubber and the scrubbing liquid flow rate to the scrubber. The pressure loss monitoring device must be certified by the manufacturer to be accurate within 5 percent of water column gauge pressure at the level of operation. The liquid flow rate monitoring device must be certified by the manufacturer to be accurate within 5 percent of design scrubbing liquid flow rate.
- f. Reconstruction.

The cost of replacement of equipment subject to high temperatures and abrasion on processing equipment shall not be considered in calculating either the “fixed capital cost of the new components” or the “fixed capital cost that would be required to construct a comparable new facility” under §60.15. Calciner and dryer equipment subject to high temperatures and abrasion are: end seals, flights, and refractory lining.