**Section 217.402 Control Requirements**

a) After May 30, 2004, an owner or operator of any cement kiln subject to the requirements of this Subpart shall not operate the kiln during the initial control period or any subsequent control period, unless the owner or operator complies with subsection (a)(1), (a)(2), (a)(3), (a)(5) or (a)(6) of this Section for kilns that commenced operation prior to January 1, 1996, or subsection (a)(4) or (a)(6) of this Section for kilns that commenced operation on or after January 1, 1996.

1) The kiln is operated with a low-NOx burner or a mid-kiln firing system;

2) The kiln shall not exceed the applicable NOx emission limitation in pounds per ton of clinker (lb/T), expressed in the rates listed below:

A) Long dry kilns – 5.1 lb NOx/T of clinker;

B) Long wet kilns – 6.0 lb NOx/T of clinker;

C) Preheater kilns – 3.8 lb NOx/T of clinker; or

D) Preheater/precalciner kilns – 2.8 lb NOx/T of clinker.

3) The kiln achieves a 30 percent or greater reduction from its uncontrolled baseline, established as set forth in this subsection (a)(3), and complies with the following:

A) Uncontrolled baseline emissions shall be determined using the following equation:

|  |  |  |
| --- | --- | --- |
| UBE | = | [EF x SPR] |
| 2000 lbs NOx/T |

Where:

|  |  |  |
| --- | --- | --- |
| UBE | = | Uncontrolled Baseline NOx emissions expressed in tons of NOx per control period; |
| EF | = | Emissions factor, expressed in lbs of NOx per ton of linker produced per control period, based on one of the methods in subsection (a)(3)(B) of this Section; and |
| SPR | = | Seasonal production rate, expressed in tons of clinker produced per control period, using the average of the two highest control period operating rates from the previous three-year period at the time the application for the permit with federally enforceable conditions is submitted to the Agency pursuant to subsection (a)(3)(C) of this Section. |

B) Emissions factors shall be determined using one of the following methods:

i) The average of the emission factors for the type of kiln from the Compilation of Air Pollutant Emission Factors (AP-42) and the Alternative Control Techniques Document – NOx Emissions from Cement Manufacturing, as incorporated by reference in Section 217.104 of this Part;

ii) The site-specific emission factor developed from representative emissions testing, pursuant to 40 CFR 60, Appendix A, Method 7, 7A, 7C, 7D, or 7E, incorporated by reference in Section 217.104 of this Part, based on a range of typical operating conditions. The owner or operator must establish that these operating conditions are representative, subject to approval by the Agency, and must certify that the emissions testing is being conducted under representative conditions; or

iii) An alternate method for establishing the emissions factors, when submitted with supporting data to substantiate such emissions factors and approved by the Agency as set forth in subsection (a)(3)(C) of this Section.

C) The owner or operator must submit an emission reduction plan to the Agency and obtain approval of that plan by the Agency. Such plan shall be effective only when contained as federally enforceable conditions in a permit. Such plan shall include any alternate procedures for monitoring, testing, reporting, or recordkeeping approved by the Agency, or other provisions as appropriate.

4) Any kiln subject to this Subpart that commenced operation on or after January 1, 1996, must meet the more stringent of the requirements of this Subpart or other CAA requirements, or rules promulgated thereunder, applicable to kilns. If a kiln is required to comply with a more stringent requirement pursuant to the CAA, and chooses to do so in lieu of complying with this Subpart, the owner or operator must submit an emissions reduction plan that demonstrates that compliance with the CAA requirement results in emissions reductions that are equal to or exceed the requirements of this Section and obtain a permit containing federally enforceable conditions addressing such CAA requirement.

5) The owner or operator obtains an alternate emissions standard for operating the kiln pursuant to Section 28.1 of the Act [415 ILCS 5/28.1], and in accordance with 35 Ill. Adm. Code 104, Subpart D, provisions for adjusted standards. An adjusted standard or alternate emissions standard with an alternate compliance schedule shall be granted by the Board to the extent consistent with federal law. Such alternate shall be effective only when included as a federally enforceable condition in a permit approved by USEPA or approved as a SIP revision. The adjusted standard shall include any alternate procedures for control, compliance, monitoring, operation, testing, reporting, or recordkeeping that are appropriate. In addition, the owner or operator must demonstrate, as justification for the adjusted standard, that the control requirements contained in this Subpart, as they apply to cement kilns, meet one or more of the following criteria:

A) Unreasonable cost of control resulting from plant, age, location or basic process design;

B) Physical impossibility of installing necessary control equipment; or

C) Other factors specific to the cement kiln that support an alternate emissions standard.

6) The owner or operator obtains approval by the Agency and USEPA to allow the kiln to participate in the federal NOx Trading Program. Such participation will be effective upon issuance of a permit containing all necessary federally enforceable permit conditions addressing the kiln's participation in the federal NOx Trading Program pursuant to 40 CFR 96 and the Illinois NOx Trading Program regulations at 35 Ill. Adm. Code 217. The owner or operator is not subject to the requirements of this Subpart for the duration of its participation in the NOx Trading Program, except for the requirement to submit the initial compliance report pursuant to Section 217.408(a) of this Subpart.

b) Notwithstanding any other provisions of this Subpart, a source and units at the source subject to the provisions of subsection (a) of this Section will become subject to this Subpart on *the first day of the control season subsequent to the calendar year in which all of the other states subject to the provisions of the NOx* *SIP Call (63 Fed. Reg. 57,355 (October 27, 1998))* *that are located in USEPA Region V or that are contiguous to Illinois have adopted regulations to implement NOx Trading programs and other required reductions of NOx emissions pursuant to the NOx SIP Call, and such regulations have received* *final approval by USEPA as part of the respective states' SIPS for ozone, or a final FIP for ozone promulgated by USEPA is effective for such other states.* [415 ILCS 5/9.9(f)]

(Source: Added at 25 Ill. Reg. 4597, effective March 15, 2001)