217/782-2113

CONSTRUCTION PERMIT – NSPS and NESHAP

DRAFT

PERMITTEE

Tate & Lyle Ingredients Americas, Inc.
Attn: Richard L. Dickinson
2200 East Eldorado Street
Decatur, Illinois 62525

Application No.: 07050046 I.D. No.: 115015ABX
Applicant's Designation: 123-14 & 15 Date Received: May 21, 2007
Subject: New Boilers #3 and #4 replacing Existing Boilers #23 and #25
Date Issued: TBD
Location: 2200 East Eldorado Street, Decatur, Macon County

Permit is hereby granted to the above-designated Permittee to CONSTRUCT emission source(s) and/or air pollution control equipment consisting of two new boilers (183.9 mmBtu/hr nominal rated capacity, each) equipped with low-NOx burners and flue gas recirculation system, fired with natural gas as a primary fuel and distillate oil as backup fuel (affected boilers) as described in the above-referenced application. This Permit is subject to standard conditions attached hereto and the following special condition(s):

1.1 New Source Performance Standards

a. Each affected boiler is an affected facility under the federal New Source Performance Standard (NSPS) for Industrial-Commercial-Institutional Steam Generating Units, 40 CFR 60, Subpart Db. As an affected facility, the Permittee must comply with applicable requirements of the NSPS, 40 CFR 60 Subpart Db, and related requirements of 40 CFR 60, Subpart A, General Provisions, for the affected boilers. The Illinois EPA is administering NSPS in Illinois on behalf of the United States EPA under a delegation agreement.

b. Pursuant to the NSPS, 40 CFR 60.43b(h), if an affected boiler burns oil that contains more than 0.3 weight percent sulfur, the emissions of particulate matter (PM) from the boiler shall not exceed 0.030 lb/mmBtu of actual heat input. As provided by 40 CFR 60.43b(g) and 60.46b(a), this limit applies at all times except during periods of startup, shutdown, or malfunction, as defined at 40 CFR 60.2. However, exceedances during such periods shall be reported as deviations.

c. Pursuant to the NSPS, 40 CFR 60.43b(f), opacity from each affected boiler shall not exceed 20 percent, as measured on a six minute average, except for one six minute period per hour of not more than 27 percent. As provided by 40 CFR 60.43b(g) and 60.46b(a), this limit apply at all times except during periods of startup, shutdown, or malfunction, as defined at 40 CFR 60.2. However, exceedances during such periods shall be reported as deviations.

d. Pursuant to the NSPS, 40 CFR 60.42b(k), if an affected boiler burns oil and/or a mixture of gaseous fuels with a potential $SO_2$ emission rate of 0.32 lb/mmBtu heat input or more, the emissions of sulfur dioxide ($SO_2$) from the boiler shall not exceed 0.2 lb/mmBtu of actual heat input. As provided by 40 CFR 60.42b(g) and 60.45b(a), this limit applies at all times, including periods of startup, shutdown, or malfunction, as defined at 40 CFR 60.2.

e. Pursuant to the NSPS, 40 CFR 60.44b(l)(1) and (i), the emissions of nitrogen oxides ($NO_x$) from each affected boiler shall not exceed 0.2 lb/mmBtu of actual heat input, on a 30-day rolling average. As provided by 40 CFR 60.44b(h) and 60.46b(a), this limit apply at all times, including periods of startup, shutdown, or malfunction, as defined at 40 CFR 60.2.

f. Pursuant to the NSPS, 40 CFR 60.11(d), at all times the Permittee shall maintain and operate the affected boilers, including associated air pollution control equipment, in a manner consistent with good air pollution control practices for minimizing emissions.

1.2 National Emission Standards for Hazardous Air Pollutants

a. The affected boilers are subject to the National Emission Standards for Hazardous Air Pollutants (NESHAP) for Industrial, Commercial, and Institutional Boilers and Process Heaters, 40 CFR 63, Subpart DDDDD, and related requirements of 40 CFR 63, Subpart A, General Provisions. The Illinois EPA is administering NESHAP in Illinois on behalf of the United States EPA under a delegation agreement.

b. The emissions of carbon monoxide (CO) from each affected boiler shall not exceed 400 ppmvd, corrected to 3 percent oxygen, on a 30-day rolling average, except during periods of startup, shutdown, or malfunction, pursuant to 40 CFR 63.7500(a)(1) and 63.7505(a).

c. The emissions of PM from each affected boiler shall not exceed 0.03 lb/mmBtu of heat input, except during periods of startup, shutdown, or malfunction, pursuant to 40 CFR 63.7500(a)(1) and 63.7505(a).

d. The emissions of hydrogen chloride (HCl) from each affected boiler shall not exceed 0.0005 lb/mmBtu of heat input, except during periods of startup, shutdown, or malfunction, pursuant to 40 CFR 63.7500(a)(1) and 63.7505(a).

e. If the NESHAP is vacated by the USEPA, and a case-by-case determination of MACT is required for the affected boilers, the boilers and the Permittee shall comply with the provisions of the vacated NESHAP pursuant to section 112(j) of the Clean Air Act and section 39.5(19) of the environmental Protection Act, as the Illinois EPA has determined that the NESHAP adopted by the USEPA sets Maximum Achievable Control Technology (MACT) for the affected boilers.

1.3 State Emission Standards

a. Pursuant to 35 IAC, Chapter B, Subchapter C, emissions from each affected boiler shall not exceed the following standards, which apply on an hourly basis:

| Pollutant | Standard | Limit |
|---|---|---|
| $SO_2$ | 35 IAC 214.122(b)(2) | 0.3 lb/mmBtu* |
| PM | 35 IAC 212.206 and 212.207 | 0.1 lb/mmBtu* |
| CO | 35 IAC 216.121 | 200 ppm, @ 50% excess air |

* Limit is applicable to emissions attributable to burning of oil.

b. Pursuant to 35 IAC 212.122, the opacity of the exhaust from each affected boiler shall not exceed 20 percent, except as provided by 35 IAC 212.122(b). (See also Condition 1.1(c).)

1.4 Non-Applicability of Regulations of Concern

a. This permit is issued based on the Permittee using fuel supplier certifications of the sulfur content of the fuels burned, to demonstrate compliance with the standard in Condition 1.1(d) for $SO_2$, rather than continuous emissions monitoring for $SO_2$, pursuant to 40 CFR 60.47b(f) or (g).

b. i. The permit is issued based on the construction and operation of this project not constituting a major modification pursuant to the federal rules for Prevention of Significant Deterioration (PSD), 40 CFR 52.21 because it will be accompanied by a contemporaneous decrease in NOx emissions from the permanent shutdown of Boilers #23 and #25. The net change in NOx emissions resulting from the installation of affected boilers and permanent shutdown of Boilers #23 and #25 is a net increase of 37.4 tons/yr (See Attachment 1).

ii. Within 180 days of initial startup of each affected boiler, the existing boilers #23 and #25 shall be permanently removed from service.

c. This permit is issued based on the Permittee not being required to install and operate continuous opacity monitors for the affected boilers because the boilers burn only liquid or gaseous fuels with potential $SO_2$ emission rates of 0.060 lb/mmBtu or less and the Permittee will maintain fuel supplier certifications of the sulfur content of the fuels burned, pursuant to 40 CFR 60.48b(a) and (j).

d. This permit is issued based on the affected boilers not being subject to the federal Acid Rain program because they are not utility units. (Refer to 40 CFR 72.2 and 72.6)

1.5 Operational and Production Limits and Work Practices

a. Natural gas and distillate oil shall be the only fuels fired in the affected boilers.

b. i. The heat input to the affected boilers combined shall not exceed 264,800 million Btu/month and 2,320,000 million Btu/year.

ii. The usage of distillate oil by the affected boilers shall not exceed 10.59 million gallons per year, total.

c. Each affected boiler shall be equipped, operated, and maintained with low-$NO_x$ burners and flue gas recirculation system to control NOx emissions.

d. The Permittee shall operate and maintain the affected boilers in accordance with good air pollution control practice to minimize emissions, by operating in accordance with detailed written operating procedures as it is safe to do so and maintaining the boilers to assure proper functioning of equipment, including maintaining the boilers in accordance with written procedures developed for this purpose.

e. i. As the affected boilers emits hazardous air pollutants (HAPs) and is subject to NESHAP, the Permittee shall comply with all applicable requirements contained in 40 CFR Part 63, Subpart A, pursuant to 40 CFR 63.7565. In particular, for each affected boiler, the Permittee shall comply with the following applicable requirements of 40 CFR 63 Subpart A, related to startup, shutdown, and malfunction, as defined at 40 CFR 63.2:

A. The Permittee shall at all times, including periods of startup, shutdown, and malfunction as defined at 40 CFR 63.2, operate and maintain the affected boilers, including associated air pollution control equipment and monitoring equipment, in a manner consistent with safety and good air pollution control practices for minimizing emissions to the levels required by the relevant standards, i.e., meet the emission standard(s) or comply with the applicable Startup, Shutdown, and Malfunction Plan (Plan), as required below. Determination of whether such operation and maintenance procedures are being used will be based on information available to the Illinois EPA and USEPA, which may include, but is not limited to, monitoring results, review of operation and maintenance procedures (including the Plan), review of operation and maintenance records, and inspection of the boiler. [40 CFR 63.6(e)(1)(i)]

B. The Permittee shall correct malfunctions as soon as practicable after their occurrence in accordance with

the applicable Plan. To the extent that an unexpected event arises during a startup, shutdown, or malfunction, the Permittee shall comply by minimizing emissions during such a startup, shutdown, and malfunction event consistent with safety and good air pollution control practices. [40 CFR 63.6(e)(1)(ii)]

C. These operation and maintenance requirements, which are established pursuant to Section 112 of the Clean Air Act, are enforceable independent of applicable emissions limitations and other applicable requirements. [40 CFR 63.6(e)(1)(iii)]

ii. The Permittee shall develop, implement, and maintain a written Startup, Shutdown, and Malfunction Plan (Plan) that describes, in detail, procedures for operating and maintaining the affected boilers during periods of startup, shutdown, and malfunction and a program of corrective action for a malfunctioning process, and air pollution control and monitoring equipment used to comply with the relevant emission standards. These Plans shall be developed to satisfy the purposes set forth in 40 CFR 63.6(e)(3)(i)(A), (B) and (C). The Permittee shall develop its initial plans prior to the initial startup of the boiler. [40 CFR 63.6(e)(3)(i)]

A. During periods of startup, shutdown, and malfunction of the affected boilers, the Permittee shall operate and maintain the boiler, including associated air pollution control and monitoring equipment, in accordance with the procedures specified in the applicable Plan required above. [40 CFR 63.6(e)(3)]

B. When actions taken by the Permittee during a startup, shutdown, or malfunction (including actions taken to correct a malfunction) are consistent with the procedures specified in the applicable Plan, the Permittee shall keep records for that event which demonstrate that the procedures specified in the Plan were followed. In addition, the Permittee shall keep records of these events as specified in 40 CFR 63.10(b), including records of the occurrence and duration of each startup, shutdown, or malfunction of operation and each malfunction of the air pollution control and monitoring equipment. Furthermore, the Permittee shall confirm in the periodic compliance report that actions taken during periods of startup, shutdown, and malfunction were consistent with the applicable Plan, as required by 40 CFR 63.10(d)(5). [40 CFR 63.6(e)(3)(iii)]

C. If an action taken by the Permittee during a startup, shutdown, or malfunction (including an action taken to correct a malfunction) of an emission unit is not

consistent with the procedures specified in the applicable Plan, and the affected boilers exceeds a relevant emission standard, then the Permittee must record the actions taken for that event and must promptly report such actions as specified by 40 CFR 63.6(d)(5), unless otherwise specified elsewhere in this permit or in the CAAPP Permit to be issued for the plant. [40 CFR 63.6(e)(3)(iv)]

D. The Permittee shall make changes to the Plan for an emission unit if required by the Illinois EPA or USEPA, as provided for by 40 CFR 63.6(e)(3)(vii), or as otherwise required by 40 CFR 63.6(e)(viii). [40 CFR 63.6(e)(3)(vii) and (viii)]

E. These Plans are records required by this permit, which the Permittee must retain in accordance with the general requirements for retention and availability of records. In addition, when the Permittee revises a Plan, the Permittee must also retain and make available the previous (i.e., superseded) version of the Plan for a period of at least 5 years after such revision. [40 CFR 63.6(e)(v) and 40 CFR 63.10(b)(1)]

1.6 Emission Limitations

a. Emissions from the affected boilers shall not exceed the following limits. These emission limits are based on the information provided in the permit application. For hourly limits on NOx and CO, for which continuous emission monitoring is performed, the compliance time period is a 30-day rolling average, consistent with the NSPS and NESHAP. For hourly limits on other pollutants, for which continuous emission monitoring is not performed, the compliance time period is three hours (three test runs).

| Pollutant | Emissions | | | | |
|---|---|---|---|---|---|
| | Natural gas (per boiler) | | Distillate fuel (per boiler) | | Total |
| | (lb/mmBtu[a]) | (lb/hr) | (lb/mmBtu[a]) | (lb/hr) | (ton/yr) |
| $NO_x$ | 0.05 | 9.2 | 0.05 | 8.8 | 58.0 |
| CO | 0.08 | 15.5 | 0.08 | 14.7 | 97.4 |
| $PM/PM_{10}$ | 0.01 | 1.8 | 0.01 | 2.5 | 11.6 |
| VOM | --- | 1.8 | --- | 1.8 | 11.6 |
| $SO_2$ | --- | 0.1 | --- | 8.9 | 37.6 |

[a] These limits are based on Higher Heating Value (HHV) of the fuel.

b. Compliance with the annual limitations and other annual limitations in this permit shall be determined as a running total of 12 months of data. For purpose of determining compliance with these annual emission limitations:

i. Emissions of NOx and CO shall be determined by continuous emission monitoring in accordance with Condition 1.8.

ii. Emissions shall be determined from appropriate emission factors developed from testing in accordance with Condition 1.7 (VOM and $PM/PM_{10}$) and analysis of fuel sulfur content ($SO_2$).

iii. The establishment of the above procedures for determining compliance with the annual emission limits shall not shield the Permittee from responsibility to account for all emissions from the source, including emissions during startup and malfunction, as other credible information may demonstrate that the above procedures do not adequately account for the actual emissions of the source.

1.7 Testing Requirements

a. i. The Permittee shall conduct the following performance tests required by the NSPS prior to or in conjunction with the emission testing required by Condition 1.7(a)( ii). The Permittee shall follow appropriate notification and reporting of the performance tests in accordance with general provisions of 40 CFR 60.8 under the NSPS.

A. Measurements for $NO_x$ shall be conducted as required under the NSPS, 40 CFR 60.8 and 40 CFR 60.46b(e), using the $NO_x$ CEMS.

ii. The volatile organic material (VOM) and particulate matter (PM) emissions and opacity of the affected boilers while firing with natural gas and operating at the maximum load range shall be measured by an independent testing service approved by the Illinois EPA as follows:

A. Within 60 days after operating the affected boilers at the greatest load at which it will normally be operated but not later than 180 days after initial startup. The boiler to be tested shall be selected by the Illinois EPA at the time of testing or otherwise randomly selected.

B. Within 90 days after a written request from the Illinois EPA, for such pollutants listed above as specified by the request.

Note: Any extension to these time periods that may be provided at its discretion by the Illinois EPA will not alter the Permittee’s obligation to perform emission testing for NOx emissions for purpose of the NSPS, in a timely manner as specified by 40 CFR 60.8.

b. The following methods and procedures shall be used for testing of opacity and emissions of VOM and PM unless alternative test procedures are approved by the Illinois EPA:

| | |
|---|---|
| Location of Sample Points | USEPA Method 1 |
| Gas Flow and Velocity | USEPA Method 2 |
| Flue Gas Weight | USEPA Method 3 or 3A |
| Moisture | USEPA Method 4 |
| Opacity | USEPA Method 9 |
| Volatile Organic Material | USEPA Method 18 or 25A |
| Particulate Matter[1] | USEPA Methods 5 and 202 |
| Particulate Matter$_{10}$ | USEPA Method 201 or 201A (40 CFR 51, Appendix M) |

[1] PM emissions measured by USEPA Method 5, including back half condensable particulate, may be provided as an alternative to measurement of $PM_{10}$ emissions using USEPA Method 201 or 201A.

c. At least 60 days prior to the actual date of initial performance testing, a written test plan shall be submitted to the Illinois EPA for review. This plan shall describe the specific procedures for testing and shall include as a minimum:

i. The person(s) who will be performing sampling and analysis and their experience with similar tests.

ii. The specific conditions under which testing shall be performed including a discussion of why these conditions will be representative of maximum emissions and the means by which the operating parameters for the affected boilers will be tracked and recorded.

iii. The specific determinations of emissions that are intended to be made, including sampling and monitoring locations; the test method(s) that will be used, with the specific analysis method, if the method can be used with different analysis methods.

d. The Illinois EPA shall be notified prior to these tests to enable the Illinois EPA to observe these tests. Notification of the expected date of testing shall be submitted a minimum of thirty (30) days prior to the expected date. Notification of the actual date and expected time of testing shall be submitted a minimum of five (5) working days prior to the actual date of the test. The Illinois EPA may, at its discretion, accept notifications with shorter advance notice provided that the Illinois EPA will not accept such notifications if it interferes with the Illinois EPA’s ability to observe the testing.

e. Three copies of the final reports for emission tests shall be forwarded to the Illinois EPA, Compliance Section in Springfield within 30 days after the test results are compiled and finalized and no later than 60 days after the final day of emission

testing. The final report from testing shall contain the following as a minimum:

i. A summary of results.

ii. General information.

iii. Description of test method(s), including description of sampling points, sampling train, analysis equipment, and test schedule.

iv. Detailed description of test conditions, including:

A. Type of fuel fired.

B. Fuel consumption.

C. Firing rate (million Btu/hr).

D. Boiler steam production rate (lb/hr).

v. Monitored emission data for $NO_x$ and CO (individual test runs and average) during the period of the test.

vi. Data and calculations, including copies of all raw data sheets and records of laboratory analyses, sample calculations, and data on equipment calibration.

1.8 Monitoring and Instrumentation Requirements

a. i. The Permittee shall install, operate, and maintain Continuous Emissions Monitoring Systems (CEMS) on each affected boiler to measure emissions of NOx, pursuant to 40 CFR 60.48b(b) and (e). The applicable procedures under 40 CFR 60.13 shall be followed for the installation, evaluation, and operation of the $NO_x$ CEM systems, in accordance with 40 CFR 60.48b(e).

ii. When $NO_x$ emission data are not obtained because of continuous monitoring systems breakdowns, repairs, calibration checks and zero and span adjustments, emission data will be obtained by using standby monitoring systems, Method 7, Method 7a, or other approved methods to provide emission data for a minimum of 75 percent of the operating hours in the steam generating unit operating day, in at least 22 out of 30 successive steam generating unit operating days, pursuant to 40 CFR 60.48b(f).

iii. The Permittee shall also measure oxygen concentration in the exhaust of the affected boilers.

iv. In addition to determining compliance with the $NO_x$ standard of the NSPS, these systems shall also be used to address compliance with the $NO_x$ emission limitations in Condition 1.6(a).

b. i. The Permittee shall install, operate, and maintain a Continuous Emissions Monitoring System (CEMS) on each affected boiler to measure emissions of CO, pursuant to 40 CFR 63.7525(a). The applicable procedures under 40 CFR 63.7525(a)(1) through (6) shall be followed for the installation, evaluation, and operation the CO CEM system, in accordance with 40 CFR 63.7525(a).

ii. The Permittee is not required to conduct a performance test to demonstrate compliance with the applicable CO emission limits of the NESHAP, however, the Permittee shall meet the following requirements, pursuant to 40 CFR 63.7506(a).

A. Measurements for CO shall be conducted as required under NESHAP, 40 CFR 63.7, 63.7510(c) and 63.7525(a), using the CO CEMS.

B. The Permittee shall demonstrate continuous compliance with CO emission limits in accordance with 63.7540(a)(10), using the CO CEMS.

iii. In addition to determining compliance with the CO standard of the NESHAP, this system and the oxygen monitoring system required by Condition 1.8(a)(iii) shall also be used to address compliance with 35 IAC 216.121 and the CO emission limitation in Condition 1.6(a).

1.9 Recordkeeping Requirements

a. The Permittee shall maintain a file of the following items:

i. The rated heat input capacity of each affected boiler (mmBtu/hour) with supporting documentation, which data shall be updated by the Permittee as necessary to represent the best available data for the rated capacity of the affected boiler.

ii. Heat content of the natural gas ($Btu/ft^3$) being fired, with supporting documentation, on a quarterly basis.

iii. A copy of the final report(s) for emission testing conducted pursuant to Condition 1.7.

iv. The Permittee shall maintain records for all opacity measurements made in accordance with USEPA Method 9 for the affected boilers that it conducts or that are conducted on its behest by individuals who are qualified to make such observations. For each occasion on which such measurements are made, these records shall include the formal report for the measurements if conducted pursuant to Condition 1.7, or otherwise the identity of the observer, a description of the measurements that were made, the operating condition of

the affected boilers, the observed opacity, and copies of the raw data sheets for the measurements.

b. The Permittee shall maintain the following operating records for the affected boilers:

i. The quantity and type of fuel consumed (scf/month and gallons/month).

ii. Steam production (lb/month).

iii. Total heat input (million Btu/mo and million Btu/yr).

c. The Permittee shall maintain the following records related to each startup of an affected boiler:

i. Date and time of startup.

ii. A description of the startup, if written operating procedures are not followed during the startup or significant problems occur during the startup, including detailed explanation.

iii. If normal operation is not achieved within the applicable time period recommended by the boiler manufacturer for normal startup of the boiler (or such other period of time set by the source's CAAPP permit) or if established startup procedures are not followed:

A. A detailed explanation why startup could not be completed sooner or established procedures could not be followed.

B. Documentation for the established startup procedures that were followed.

C. Estimates of magnitude of emissions emitted in excess of the applicable limitations and standards during startup, if any.

d. The Permittee shall keep inspection, maintenance, and repair logs with dates and the nature of such activities for the affected boilers.

e. The Permittee shall maintain records of the following information for the affected boilers:

i. The following information for each steam generating unit operating day, as defined by 40 CFR 60.41b, pursuant to 40 CFR 60.49b(g):

A. Calendar date.

B. The average hourly $NO_x$ emission rates (expressed as $NO_2$) (lb/mmBtu heat input), measured using the $NO_x$ CEMS.

C. The 30-day average $NO_x$ emission rates (lbs/mmBtu heat input) calculated at the end of each operating day from the measured hourly $NO_x$ emission rates for the preceding 30 operating days (30-day rolling average).

D. Identification of the operating days when the calculated 30-day average $NO_x$ emission rates are in excess of the $NO_x$ emissions standard under 40 CFR 60.44b (Condition 1.1(e)), with the reasons for such excess emissions as well as a description of corrective actions taken.

E. Identification of the operating days for which pollutant data have not been obtained, including reasons for not obtaining sufficient data and a description of corrective actions taken.

F. Identification of the times when emission data have been excluded from the calculation of average emission rates and the reasons for excluding data.

G. Identification of “F” factor used for calculations, method of determination, and type of fuel combusted.

H. Identification of the times when the pollutant concentration exceeded full span of the continuous monitoring system.

I. Description of any modifications to the continuous monitoring system that could affect the ability of continuous monitoring system to comply with 40 CFR 60, Appendix B, Performance Specification 2 or 3.

J. Results of daily CEMS drift tests and quarterly accuracy assessments as required under 40 CFR 60, Appendix F, Procedure 1.

ii. The following information to verify compliance with requirements for $NO_x$ emissions:

A. $NO_x$ emissions in lb/hour, on a 30-day rolling average basis as derived from the data obtained by the $NO_x$ CEMS.

iii. The following information to verify compliance with the CO limitations of Conditions 1.2(b), 1.3(a) and 1.6(a):

A. CO emissions, in ppmvd corrected to 3 percent oxygen, on a 30-day rolling average basis as derived from the data obtained by the CO CEMS.

B. CO emissions, in ppm corrected to 50 percent excess air, as derived from the data obtained from the CO CEMS and the oxygen monitoring system.

C. CO emissions in lb/mmBtu and lb/hour, on a 30-day rolling average basis as derived from the data obtained by the CO CEMS.

iv. The following information to verify compliance with the PM and HCl limitations of Conditions 1.2(c) and (d).

A. To demonstrate initial and continuous compliance, the Permittee shall follow recordkeeping and notification requirements of 40 CFR 63.7506(a).

v. Any day in which emissions exceeded an applicable standard or limitation, with the calculated emission rate and explanation for the incident.

f. The Permittee shall maintain the following records related to emissions from the affected boilers:

i. Other data, not addressed above, used or relied upon by the Permittee to determine emissions.

ii. Monthly and annual emissions of $NO_x$, CO, $PM/PM_{10}$, VOM, and $SO_2$ emissions (tons/month and tons/year) with supporting data or calculations.

g. The Permittee shall maintain the following records for the NOx CEMS for the affected boilers:

i. Continuous monitoring system performance testing measurements.

ii. Performance evaluations and other quality assurance/control activities.

iii. Calibration checks.

iv. Maintenance and adjustments performed.

v. Periods when the CEMS was inoperative, with date, time and reason.

vi. Data reduction information.

vii. Quarterly monitoring reports.

1.10. Retention of Records

All records required by this permit shall be retained on site for a period of at least five years and shall be readily available for inspection and copying by the Illinois EPA upon request. Any record retained in an electronic format (e.g., computer) shall be capable of being retrieved and printed on paper during normal source office hours so as to be able to respond to an Illinois EPA request for records during the course of a source inspection.

1.11 Reporting Requirements

a. The Permittee shall furnish the Illinois EPA with written notification as follows with respect to commencement of construction and operation of the affected boilers:

i. The date construction of the boiler commenced postmarked no later than 30 days after such date, pursuant to 40 CFR 60.7(a)(1).

ii. The actual date of initial startup of the boiler, postmarked within 15 days after such date, pursuant to 40 CFR 60.7(a)(3) and 60.49b(a), which shall be accompanied by the following information:

A. The design heat input capacity of the boiler and identification of the fuels to be combusted in the boiler, pursuant to 40 CFR 60.49b(a)(1).

B. The annual capacity factor at which the Permittee anticipates operating the boiler based on all fuels fired and based on each individual fuel fired, pursuant to 40 CFR 60.49b(a)(3).

b. The Permittee shall submit semi-annual reports as required by 40 CFR 60.7(c) or (d), 60.49b(h), 63.10 and 63.7550(b).

c. If there is any deviation of the requirements of this permit, as determined by the records required by this permit or by other means, the Permittee shall promptly report to the Illinois EPA as specified below until such time the affected boilers are addressed by the CAAPP permit.

i. Deviations from Conditions 1.1, 1.2, 1.3, 1.4, 1.5, and 1.6 shall be reported with the reports required by the NSPS and NESHAP.

ii. Other deviations shall be reported within 30 days and include a description of the incident, a discussion of the probable cause of such deviation, a description of the corrective actions taken, and a description of the preventative measures taken.

d. In conjunction with the Annual Emission Report required by 35 IAC Part 254, the Permittee shall provide the following information for the affected boilers:

The total heat input (million Btu/yr) and total fuel consumption (scf/year and gallons/year) during the preceding calendar year.

e. Two copies of all required reports and notifications shall be sent to:

Illinois Environmental Protection Agency
Division of Air Pollution Control
Compliance Section (#40)
P.O. Box 19276
Springfield, Illinois 62794-9276

Telephone: 217/782-5811 Fax: 217/782-6348

and one copy of all required reports and notifications shall be sent to the Illinois EPA's regional office at the following address, unless otherwise indicated:

Illinois Environmental Protection Agency
Division of Air Pollution Control
Regional Field Office
2009 Mall Street
Collinsville, Illinois 62234

Telephone: 618/346-5120 Fax: 618/346-5155

1.12 Authorization for Operation of the Affected Boilers

a. Under this permit, the affected boilers may be operated for a period of up to 180 days from initial startup to allow for equipment shakedown and emissions testing as required. The Illinois EPA, upon request of the Permittee, may extend this period if additional time is needed to complete shakedown or perform emission testing.

b. Upon successful completion of emission testing for the affected boilers demonstrating compliance with applicable short-term limitations, the Permittee may continue to operate the boilers pursuant to this permit until the CAAPP Permit is revised to include the units.

c. This condition supersedes Standard Condition 6.

If you have any questions concerning this, please contact Manish Patel at 217/782-2113.

Edwin C. Bakowski, P.E.  Date Issued: _____
Acting Manager, Permit Section
Division of Air Pollution Control

ECB:MNP

cc: FOS - Region 3, Illinois EPA
CAAPP Permit Analyst, Illinois EPA

**Attachment 1**

**Table I** – Permitted Emissions from the Proposed Boilers (Boiler # 3 and #4)

| Description | Annual Emissions (tons) | | | | |
|---|---|---|---|---|---|
| | NOx | CO | VOM | $PM/PM_{10}$ | $SO_2$ |
| Boiler #3 and #4, total | 58.0 | 97.4 | 11.6 | 11.6 | 37.6 |
| PSD Significant Thresholds | 40.00 | 100.00 | 40.00 | 25.0/15.0 | 40.00 |

Note: Emissions of CO, VOM, $PM/PM_{10}$, and $SO_2$ are not being netted out, as permitted emissions from the new boilers will be less than the major source PSD significant emission thresholds.

**Table II** – Actual Baseline NOx Emissions from the Existing Boilers (Boiler #23 and #25)

| Emission Unit | Annual NOx Emissions (tons) |
|---|---|
| Boiler #23 | 6.7 |
| Boiler #25 | 13.9 |
| Total | 20.6 |

Note: Actual baseline emissions are average emissions of two years period from September 2004 thru August 2006.

**Table III** – Net Change in NOx Emissions

| Time Period | Annual NOx Emissions (tons) |
|---|---|
| Future (Table I) | 58.0 |
| Past (Table II) | 20.6 |
| Change | 37.4 |

MNP: