Statement of Basis of the Federal Operating Permit

City of Bryan

Site/Area Name: Roland C. Dansby Power Plant
Physical location: 8181 Mumford Road
Nearest City: Bryan
County: Brazos

Permit Number: O82
Project Type: Renewal

Standard Industrial Classification (SIC) Code: 4911
SIC Name: Electric Services

This Statement of Basis sets forth the legal and factual basis for the draft permit conditions in accordance with 30 TAC §122.201(a)(4). Per 30 TAC §§ 122.241 and 243, the permit holder has submitted an application under § 122.134 for permit renewal. This document may include the following information:

A description of the facility/Area Process Description;
A basis for applying permit shields;
A list of the federal regulatory applicability determinations;
A table listing the determination of applicable requirements;
A list of the New Source Review Requirements;
The rationale for periodic monitoring methods selected;
The rationale for compliance assurance methods selected;
A compliance status; and
A list of available unit attribute forms.

Prepared on: January 28, 2005

OPERATING PERMIT
BASIS OF DETERMINATION

PERMIT AREA PROCESS DESCRIPTION

The Roland C. Dansby power plant consists of one 1,095 MMBtu/hr front fired boiler that produces steam to drive a 105 MW steam turbine electric generator and one simple cycle combustion turbine generator. The electricity that is generated by the steam turbine electric generator is fed to the utility grid. The boiler utilizes natural gas as a primary fuel, but also has the capability to fire fuel oil during periods of natural gas shortages or when it is more economically feasible for short periods of time during cold weather. It is also possible for the unit to fire fuel oil and natural gas simultaneously. The unit has six burners of which any combination of natural gas and fuel oil can be fired (telephone conversation on 04/09/99 with the technical contact, Mr. Michael Hering). Fuel oil is stored in three above-ground storage tanks. Two of the tanks have capacities of 1,500,000 gallons. The third tank has a capacity of 127,000 gallons.

The boiler make-up water is demineralized by a process using sulfuric acid and sodium hydroxide. The sulfuric acid and sodium hydroxide are stored in 2 different tanks, each with a 4,500 gallon capacity. The turbine bearings are cooled via a closed loop water system utilizing a cooling tower. Water treatment chemicals are added to maintain the pH of the water in the cooling system.

A diesel tank, waste oil storage tank, and solvent degreaser are also located at the site. The diesel tank supplies a 300 kW emergency generator for back-up power for the storage batteries. The waste oil tank is used for storage of waste oil generated by maintenance operations at the plant site. The solvent degreaser is a remote reservoir unit and is used for cleaning parts that undergo maintenance.

Maintenance activities such as abrasive blasting and painting are also conducted at the site.

The simple cycle combustion turbine is a General Electric LM 6000 Model PC. The combustion turbine is fueled with natural gas. The combustion turbine utilizes water injection to control Nox to 25ppm. A high temperature SCR provides additional control for Nox and CO. Aqueous ammonia is used as the catalyst reagent. Storage tanks are utilized for the storage of the aqueous ammonia and turbine lube oil.

The combustion turbine is installed with inlet air cooling coils which utilizes chilled water provided by a chiller. A mechanical draft cooling tower is used to cool the condenser water from the chiller.

The following table demonstrates the thresholds by which sources are classified as major. Different thresholds apply to different sites, based on the attainment status of the county in which the site is located.

County	Area Ozone Nonattainment Classification	Major Source Thresholds (tpy)								
		VOC	NO_x	SO_2	PM-10[1,2]	CO[3]	Pb	HAP[4]	HAPs[5]	Other[6]
Brazoria, Chambers, Fort Bend, Galveston, Harris, Liberty, Montgomery, and Waller	Severe	25	25	100	100	100	100	10	25	100
El Paso[7]	Serious	50	100	100	100	100	100	10	25	100
Collin, Dallas, Denton andTarrant[8,9]		50	50	100	100	100	100	10	25	100
Harding, Jefferson, and Orange	Marginal or Moderate	100	100	100	100	100	100	10	25	100
All Other Texas Counties	Unclassified or Attainment	100	100	100	100	100	100	10	25	100

Notes:

1. Threshold is 70 tpy in PM-10 nonattainment areas classified as "serious." There are currently no counties in Texas classified as "serious" for PM-10.
2. Particulate matter (PM) may be used as a surrogate to demonstrate that PM-10 levels are below the major source threshold. For example, if data demonstrates that PM is less than 100 tpy, the data can be used to demonstrate that PM-10 is less than 100 tpy. However, if PM levels are greater than or equal to 100 tpy, then additional data must be provided to demonstrate that PM-10 levels are less than 100 tpy.
3. Threshold is 50 tpy in carbon monoxide (CO) nonattainment areas classified as "serious". There are currently no counties in Texas classified as "serious" for CO.
4. Any single hazardous air pollutant (HAP). Elemental lead is not included in lead compounds per FCAA § 112(b)(7).
5. Any combination of HAPs.
6. Any other regulated air pollutant as defined in 30 TAC § 122.10, including, but not limited to non-methane organic compounds (NMOC) at municipal solid waste landfills.
7. FCAA § 182(f) exemption in place. NO_x major source threshold 100 tpy.
8. Nonattainment reclassification effective March 20, 1998.
9. FCAA § 182(f) exemption rescinded June 20, 1999.

The table below specifies the pollutants for which the site is a major source:

Major Pollutants	SO2, NOX, CO

The permit contains terms and conditions that specify the area-wide applicable requirements and a table of applicable requirements for specific emission units in the application area. The "application area" consists of the emission units and that portion of the site included in the application and this permit. When there is only one area for the site, then the application information and permit will include the site.

Additional FOPs: No other operating permits will be issued to this site.

BASIS FOR APPLYING PERMIT SHIELDS

An operating permit applicant has the opportunity to specifically request a permit shield to document that specific applicable requirements do not apply to emission units in the permit. A permit shield is a special condition stating that compliance with the conditions of the permit shall be deemed compliance with the specified potentially applicable requirements or specified potentially applicable state-only requirements. A permit shield has been requested for the draft permit and the basis of determination for regulations that the permit applicant does not have to comply with for specific emissions units can be located in the "Permit Shield" attachment of the permit.

FEDERAL REGULATORY APPLICABILITY DETERMINATIONS

The following chart summarizes the applicability of the principal air pollution regulatory programs to the permit area:

Regulatory Program	Applicability (Yes/No)
PSD	No
Nonattainment NSR	No
State NSR	Yes
40 CFR Part 60	Yes
40 CFR Part 61	No
40 CFR Part 63	No
Title IV	Yes
Title V	Yes
Title VI	Yes

The tables below include the applicability determinations for the emission units, the index number(s) where applicable, and all relevant unit attribute information used to form the basis of the applicability determination. The unit attribute information is a description of the physical properties of an emission unit which is used to determine the requirements to which the permit holder must comply. For more information about the descriptions of the unit attributes specific Unit Attribute Forms may be viewed at http://www.tnrcc.state.tx.us/permitting/airperm/opd/pdfsub/forms_ua.htm.

A list of unit attribute forms is included at the end of this document. Some examples of unit attributes include construction date; product stored in a tank; boiler fuel type; etc.. Generally, multiple attributes are needed to determine the requirements for a given emission unit and index number. The table below lists these attributes in the column entitled "Basis of Determination." Attributes that

demonstrate that an applicable requirement applies will be the factual basis for the specific citations in an applicable requirement that apply to a unit for that index number. The TCEQ Air Permits Division has developed flowcharts for determining applicability of state and federal regulations based on the unit attribute information in a Decision Support System (DSS). These flowcharts can be accessed via the internet at http://www.tnrcc.state.tx.us/permitting/airperm/opd/disclm.htm. The Air Permits Division staff may also be contacted for assistance at (512) 239-1250.

The attributes for each unit and corresponding index number provide the basis for determining the specific legal citations in an applicable requirement that apply, including emission limitations or standards, monitoring, recordkeeping, and reporting. The rules were found to apply or not apply by using the unit attributes as answers to decision questions found in the flowcharts of the DSS. Some additional attributes indicate which legal citations of a rule apply. The legal citations that apply to each emission unit may be found in the Applicable Requirements Summary table of the draft permit. There may be some entries or rows of units and rules not found in the permit, or if the permit contains a permit shield, repeated in the permit shield area. These are sets of attributes that describe negative applicability, or; in other words, the reason why a potentially applicable requirement does not apply.

If applicability determinations have been made which differ from the available flowcharts, an explanation of the decisions involved in the applicability determination is specified in the column "Changes and Exceptions to RRT." If there were no exceptions to the DSS, then this column has been removed.

The draft permit includes all emission limitations or standards, monitoring, recordkeeping and reporting required by each applicable requirement. If an applicable requirement does not require monitoring, recordkeeping, or reporting, the word "None" will appear in the Applicable Requirements Summary table. If additional periodic monitoring is required for an applicable requirement, it will be explained in detail in the portion of this document entitled "Rationale for Compliance Assurance Monitoring (CAM)/ Periodic Monitoring Methods Selected."

When attributes demonstrate that a unit is not subject to an applicable requirement, the applicant may request a permit shield for those items. The portion of this document entitled "Basis for Applying Permit Shields" specifies which units, if any, have a permit shield.

Operational Flexibility

When an emission unit has multiple operating scenarios, it will have a different index number associated with each operating condition. This means that units are permitted to operate under multiple operating conditions. The applicable requirements for each operating condition are determined by a unique set of unit attributes. For example, a tank may store two different products at different points in time. The tank may, therefore, need to comply with two distinct sets of requirements, depending on the product that is stored. Both sets of requirements are included in the permit, so that the permit holder may store either product in the tank.

DETERMINATION OF APPLICABLE REQUIREMENTS

Unit ID	Regulation	Index Number	Basis of Determination*	Changes and Exceptions to DSS**
T-1	40 CFR Part 60, Subpart K	n/a	40 CFR 60 (NSPS) SUBPART K CONSTRUCTION/MODIFICATION DATE = AFTER MARCH 8, 1974 AND ON/BEFORE MAY 19, 1978 40 CFR 60 (NSPS) SUBPART K STORAGE CAPACITY = CAPACITY GREATER THAN 65,000 GALLONS (246,052 LITERS) 40 CFR 60 (NSPS) SUBPART K PRODUCT STORED = STORED PRODUCT OTHER THAN PETROLEUM LIQUID (AS DEFINED IN 40 CFR PART 60, SUBPART K)	
T-2	40 CFR Part 60, Subpart K	n/a	40 CFR 60 (NSPS) SUBPART K CONSTRUCTION/MODIFICATION DATE = AFTER MARCH 8, 1974 AND ON/BEFORE MAY 19, 1978 40 CFR 60 (NSPS) SUBPART K STORAGE CAPACITY = CAPACITY GREATER THAN 65,000 GALLONS (246,052 LITERS) 40 CFR 60 (NSPS) SUBPART K PRODUCT STORED = STORED PRODUCT OTHER THAN PETROLEUM LIQUID (AS DEFINED IN 40 CFR PART 60, SUBPART K)	
T-3	40 CFR Part 60, Subpart K	n/a	40 CFR 60 (NSPS) SUBPART K CONSTRUCTION/MODIFICATION DATE = AFTER MARCH 8, 1974 AND ON/BEFORE MAY 19, 1978 40 CFR 60 (NSPS) SUBPART K STORAGE CAPACITY = CAPACITY GREATER THAN 65,000 GALLONS (246,052 LITERS) 40 CFR 60 (NSPS) SUBPART K PRODUCT STORED = STORED PRODUCT OTHER THAN PETROLEUM LIQUID (AS DEFINED IN 40 CFR PART 60, SUBPART K)	
T-4	40 CFR Part 60, Subpart Kb	n/a	40 CFR 60 (NSPS) SUBPART KB PRODUCT STORED = STORED PRODUCT OTHER THAN VOLATILE ORGANIC LIQUID (VOL) OR PETROLEUM LIQUID (AS DEFINED IN 40 CFR PART 60, SUBPART KB)	
T-5	40 CFR Part 60, Subpart Kb	n/a	40 CFR 60 (NSPS) SUBPART KB PRODUCT STORED = VOLATILE ORGANIC LIQUID 40 CFR 60 (NSPS) SUBPART KB STORAGE CAPACITY = CAPACITY LESS THAN 10,600 GALLONS (37,854 LITERS)	
T-6	40 CFR Part 60, Subpart K	n/a	40 CFR 60 (NSPS) SUBPART K CONSTRUCTION/MODIFICATION DATE = AFTER MARCH 8, 1974 AND ON/BEFORE MAY 19, 1978 40 CFR 60 (NSPS) SUBPART K STORAGE CAPACITY = CAPACITY LESS THAN OR EQUAL TO 40,000 GALLONS (151,416 LITERS)	
T-7	40 CFR Part 60, Subpart K	n/a	40 CFR 60 (NSPS) SUBPART K CONSTRUCTION/MODIFICATION DATE = AFTER MARCH 8, 1974 AND ON/BEFORE MAY 19, 1978 40 CFR 60 (NSPS) SUBPART K STORAGE CAPACITY = CAPACITY LESS THAN OR EQUAL TO 40,000 GALLONS (151,416 LITERS)	
T-8	40 CFR Part 60, Subpart K	n/a	40 CFR 60 (NSPS) SUBPART K CONSTRUCTION/MODIFICATION DATE = AFTER MARCH 8, 1974 AND ON/BEFORE MAY 19, 1978	

			40 CFR 60 (NSPS) SUBPART K STORAGE CAPACITY = CAPACITY LESS THAN OR EQUAL TO 40,000 GALLONS (151,416 LITERS)	
T-9	40 CFR Part 60, Subpart K	n/a	40 CFR 60 (NSPS) SUBPART K CONSTRUCTION/MODIFICATION DATE = AFTER MARCH 8, 1974 AND ON/BEFORE MAY 19, 1978 40 CFR 60 (NSPS) SUBPART K STORAGE CAPACITY = CAPACITY LESS THAN OR EQUAL TO 40,000 GALLONS (151,416 LITERS)	
1	30 TAC Chapter 112, Sulfur Compounds	R112-1	30 TAC CHAPTER 112 (REG II) FUEL TYPE = LIQUID FUEL 30 TAC CHAPTER 112 (REG II) HEAT INPUT = DESIGN HEAT INPUT GREATER THAN 250 MMBTU/HOUR CONTROL EQUIPMENT [REG II] = UNIT NOT EQUIPPED WITH SO2 CONTROL EQUIPMENT STACK HEIGHT [REG II] = EFFECTIVE STACK HEIGHT IS NOT LESS THAN THE STANDARD EFFECTIVE STACK HEIGHT	
1	30 TAC Chapter 117, Utility Electric Division 2	n/a	LOCATION = THE UNIT IS NOT A GAS-FIRED STEAM GENERATOR LOCATED IN FANNIN, HOOD OR PALO PINTO COUNTY. UNIT = THE UNIT IS A GAS-FIRED ELECTRIC POWER BOILER. DATE PLACED IN SERVICE = BEFORE DECEMBER 31, 1995 HEAT INPUT = THE ANNUAL HEAT INPUT OF THE UNIT IS GREATER THAN 220 MILLION BTU/YR. SYSTEM CAP = PERMIT HOLDER IS COMPLYING ON A UNIT BASIS AND NOT WITH A SYSTEM CAP LIMITATION UNDER 30 TAC § 117.138. ACID RAIN = THE UNIT IS NOT AN ACID RAIN PEAKING UNIT AS DEFINED IN 40 CFR § 72.2.	
1	40 CFR Part 60, Subpart D	60D-1	40 CFR 60 (NSPS) SUBPART D CONSTRUCTION/MODIFICATION (RECONSTRUCTION) DATE = AFTER AUGUST 17, 1971 AND ON/BEFORE DECEMBER 22, 1976 40 CFR 60 (NSPS) SUBPART D FUEL TYPE #1 = GASEOUS FOSSIL FUEL COVERED UNDER SUBPART DA = STEAM GENERATING UNIT IS NOT USED FOR ELECTRIC UTILITY GENERATION AS DEFINED IN 40 CFR 60 SUBPART DA. 40 CFR 60 (NSPS) D CHANGES TO EXISTING AFFECTED FACILITY [NSPS D] = NO CHANGES HAVE BEEN MADE TO THE EXISTING FOSSIL FUEL-FIRED STEAM GENERATING UNIT, WHICH WAS NOT PREVIOUSLY SUBJECT TO SUBPART D, TO ACCOMMODATE THE USE OF COMBUSTIBLE MATERIALS OTHER THAN FOSSIL FUELS. 40 CFR 60 (NSPS) SUBPART D HEAT INPUT RATE = HEAT INPUT RATE IS GREATER THAN 250 MMBTU/HOUR (73 MW) NOX MONITORING TYPE [NSPS D] = NOT DEMONSTRATED DURING THE PERFORMANCE TEST THAT EMISSIONS OF NOX ARE LESS THAN 70% OF APPLICABLE STANDARDS	
1	40 CFR Part 60, Subpart D	60D-2	40 CFR 60 (NSPS) SUBPART D CONSTRUCTION/MODIFICATION (RECONSTRUCTION) DATE = AFTER AUGUST 17, 1971 AND ON/BEFORE DECEMBER 22, 1976 40 CFR 60 (NSPS) SUBPART D FUEL TYPE #1 = OTHER LIQUID FOSSIL FUEL 40 CFR 60 (NSPS) SUBPART D FUEL TYPE #2 = OTHER LIQUID FOSSIL-FUEL COVERED UNDER SUBPART DA = STEAM GENERATING UNIT IS NOT USED FOR ELECTRIC UTILITY GENERATION AS DEFINED IN 40 CFR 60 SUBPART DA. 40 CFR 60 (NSPS) D CHANGES TO EXISTING AFFECTED FACILITY [NSPS D] = NO CHANGES HAVE BEEN MADE TO THE EXISTING FOSSIL FUEL-FIRED STEAM GENERATING UNIT, WHICH WAS NOT PREVIOUSLY SUBJECT TO SUBPART D, TO ACCOMMODATE THE USE OF COMBUSTIBLE MATERIALS OTHER THAN FOSSIL FUELS. 40 CFR 60 (NSPS) SUBPART D HEAT INPUT RATE = HEAT INPUT RATE IS GREATER THAN 250 MMBTU/HOUR (73 MW) NOX MONITORING TYPE [NSPS D] = NOT DEMONSTRATED DURING THE PERFORMANCE TEST THAT EMISSIONS OF NOX ARE LESS THAN 70% OF APPLICABLE STANDARDS FLUE GAS DESULFURIZATION [NSPS D] = UNIT DOES NOT UTILIZE FLUE GAS DESULFURIZATION FUEL SAMPLING AND ANALYSIS = UNIT USES FUEL SAMPLING AND ANALYSIS FOR MONITORING OF SULFUR DIOXIDE EMISSIONS CYCLONE-FIRED UNIT [NSPS D] = UNIT IS NOT CYCLONE-FIRED	Using an Alternate Means of Control approved by EPA region 6 in June 16, 1998 letter. Added 60.13(i)(2) as applicable monitoring, recordkeeping, & reporting requirement. Deleted monitoring requirements 60.43(a), (c), (c)(3), (g), & (g)(1) and reporting requirement 60.45(g).

1	40 CFR Part 60, Subpart D	60D-3	40 CFR 60 (NSPS) SUBPART D CONSTRUCTION/MODIFICATION (RECONSTRUCTION) DATE = AFTER AUGUST 17, 1971 AND ON/BEFORE DECEMBER 22, 1976 40 CFR 60 (NSPS) SUBPART D FUEL TYPE #1 = GASEOUS FOSSIL FUEL 40 CFR 60 (NSPS) SUBPART D FUEL TYPE #2 = OTHER LIQUID FOSSIL-FUEL COVERED UNDER SUBPART DA = STEAM GENERATING UNIT IS NOT USED FOR ELECTRIC UTILITY GENERATION AS DEFINED IN 40 CFR 60 SUBPART DA. 40 CFR 60 (NSPS) D CHANGES TO EXISTING AFFECTED FACILITY [NSPS D] = NO CHANGES HAVE BEEN MADE TO THE EXISTING FOSSIL FUEL-FIRED STEAM GENERATING UNIT, WHICH WAS NOT PREVIOUSLY SUBJECT TO SUBPART D, TO ACCOMMODATE THE USE OF COMBUSTIBLE MATERIALS OTHER THAN FOSSIL FUELS. 40 CFR 60 (NSPS) SUBPART D FUEL TYPE #3 = OTHER LIQUID FOSSIL FUEL 40 CFR 60 (NSPS) SUBPART D HEAT INPUT RATE = HEAT INPUT RATE IS GREATER THAN 250 MMBTU/HOUR (73 MW) NOX MONITORING TYPE [NSPS D] = NOT DEMONSTRATED DURING THE PERFORMANCE TEST THAT EMISSIONS OF NOX ARE LESS THAN 70% OF APPLICABLE STANDARDS FLUE GAS DESULFURIZATION [NSPS D] = UNIT DOES NOT UTILIZE FLUE GAS DESULFURIZATION FUEL SAMPLING AND ANALYSIS = UNIT USES FUEL SAMPLING AND ANALYSIS FOR MONITORING OF SULFUR DIOXIDE EMISSIONS CYCLONE-FIRED	Using an Alternate Means of Control approved by EPA region 6 in June 16, 1998 letter. Added 60.13(i)(2) as applicable monitoring, recordkeeping, & reporting requirement. Deleted monitoring requirements 60.43(a), (c), (c)(3), (g), & (g)(1) and reporting requirement 60.45(g).
2	40 CFR Part 60, Subpart GG	n/a	PEAK LOAD HEAT INPUT [NSPS GG] = HEAT INPUT GREATER THAN 100 MMBTU/HOUR (107.2 GJ/HOUR) CONSTRUCTION/MODIFICATION DATE [NSPS GG] = ON/AFTER OCTOBER 3, 1982 MANUFACTURER'S BASE LOAD [NSPS GG] = BASE LOAD GREATER THAN 30 MW 40 CFR 60 (NSPS) SUBPART GG SERVICE TYPE = ELECTRIC UTILITY GENERATION SULFUR CONTENT [NSPS GG] = COMPLIANCE IS DEMONSTRATED BY DETERMINING THE SULFUR CONTENT OF THE FUEL FUEL SUPPLY [NSPS GG] = TURBINE IS SUPPLIED FUEL WITHOUT INTERMEDIATE BULK STORAGE TANK NITROGEN OXIDES (NOX) CONTROL METHOD [NSPS GG] = NOX CONTROL METHOD OTHER THAN WATER OR STEAM INJECTION ALTERNATIVE TEST METHOD [NSPS GG] = ALTERNATIVE TEST METHOD IS NOT USED TO DETERMINE THE NOX EMISSION RATE AS OUTLINED IN 40 CFR 60.335(F)	
CT-1	40 CFR Part 63, Subpart Q	n/a	USED CHROMIUM COMPOUNDS AFTER SEPT. 8 1994 (MACT Q) = INDUSTRIAL PROCESS COOLING TOWER DID NOT USE COMPOUNDS CONTAINING CHROMIUM AFTER SEPTEMBER 8, 1994.	
CT-2	40 CFR Part 63, Subpart Q	n/a	USED CHROMIUM COMPOUNDS AFTER SEPT. 8 1994 (MACT Q) = INDUSTRIAL PROCESS COOLING TOWER DID NOT USE COMPOUNDS CONTAINING CHROMIUM AFTER SEPTEMBER 8, 1994.	
4	30 TAC Chapter 111, Visible Emissions	R111-1	ALTERNATE OPACITY LIMITATION [REG I] = NOT ELECTING TO COMPLY WITH AN ALTERNATE OPACITY LIMITATION (AOL) UNDER 30 TAC 111.113 SIP VIOLATION [REG I] = THE SOURCE IS ABLE TO COMPLY WITH APPLICABLE PERIODIC MONITORING (PM) AND OPACITY REGULATIONS WITHOUT USE OF PM COLLECTION EQUIPMENT AND HAS NOT BEEN FOUND TO BE IN VIOLATION OF ANY VISIBLE EMISSION STANDARD IN A STATE IMPLEMENTATION PLAN. VENT SOURCE = THE SOURCE OF THE VENT IS A STEAM GENERATOR BURNING OIL OR A MIXTURE OF OIL AND GAS OPACITY MONITORING SYSTEM [REG I] = OPTICAL INSTRUMENT CAPABLE OF MEASURING OPACITY OF EMISSIONS IS NOT INSTALLED IN THE VENT OR OPTICAL INSTRUMENTATION DOES NOT QUALIFY AS "OPMON" OR "EDEX". CONSTRUCTION DATE (FOR SOURCE ROUTING TO VENT) [REG I] = AFTER JANUARY 31, 1972 EFFLUENT FLOW RATE [REG I] = EFFLUENT FLOW RATE GREATER THAN OR EQUAL TO 100,000 ACTUAL CUBIC FEET PER MINUTE	
4	30 TAC Chapter 111, Visible Emissions	R111-2	ALTERNATE OPACITY LIMITATION [REG I] = NOT ELECTING TO COMPLY WITH AN ALTERNATE OPACITY LIMITATION (AOL) UNDER 30 TAC 111.113 VENT SOURCE = THE VENT SOURCE CANNOT BE CATEGORIZED AS "SOLID", "OIL", OR "CATALYST REGENERATOR (FOR A FCCU)"	

			OPACITY MONITORING SYSTEM [REG I] = OPTICAL INSTRUMENT CAPABLE OF MEASURING OPACITY OF EMISSIONS IS NOT INSTALLED IN THE VENT OR OPTICAL INSTRUMENTATION DOES NOT QUALIFY AS "OPMON" OR "EDEX". CONSTRUCTION DATE (FOR SOURCE ROUTING TO VENT) [REG I] = AFTER JANUARY 31, 1972 EFFLUENT FLOW RATE [REG I] = EFFLUENT FLOW RATE GREATER THAN OR EQUAL TO 100,000 ACTUAL CUBIC FEET PER MINUTE	
5	30 TAC Chapter 111, Visible Emissions	n/a	ALTERNATE OPACITY LIMITATION [REG I] = NOT ELECTING TO COMPLY WITH AN ALTERNATE OPACITY LIMITATION (AOL) UNDER 30 TAC 111.113 VENT SOURCE = THE VENT SOURCE CANNOT BE CATEGORIZED AS "SOLID", "OIL", OR "CATALYST REGENERATOR (FOR A FCCU)" OPACITY MONITORING SYSTEM [REG I] = OPTICAL INSTRUMENT CAPABLE OF MEASURING OPACITY OF EMISSIONS IS NOT INSTALLED IN THE VENT OR OPTICAL INSTRUMENTATION DOES NOT QUALIFY AS "OPMON" OR "EDEX". CONSTRUCTION DATE (FOR SOURCE ROUTING TO VENT) [REG I] = AFTER JANUARY 31, 1972 EFFLUENT FLOW RATE [REG I] = EFFLUENT FLOW RATE GREATER THAN OR EQUAL TO 100,000 ACTUAL CUBIC FEET PER MINUTE	

* - The "unit attributes" or operating conditions that determine what requirements apply
** - Notes changes made to the automated results from the DSS, and a brief explanation why

NEW SOURCE REVIEW REQUIREMENTS

Below is a list of the New Source Review (NSR) permits for the permitted area. These NSR permits are incorporated by reference into the operating permit and are enforceable under it. These permits can be found in the main TCEQ file room, located on the first floor of Building E, 12100 Park 35 Circle, Austin, Texas. The Office of Public Assistance (OPA) may be contacted at 1-800-687-4040 for help with any question.

Additionally, the site contains emission units that are permitted by rule under the requirements of 30 TAC Chapter 106, Permits by Rule. The following table specifies the permits by rule that apply to the site. All current permits by rule are contained in Chapter 106. All historical permits by rule may be viewed at the following website: http://www.tnrcc.state.tx.us/cgi-bin/air/nsr/stdbg.pl.

PSD Permits	**NA Permits**
PSD Permit No.:	NA Permit No.:
Title 30 TAC Chapter 116 Permits, Special Permits, and Other Authorizations (Other Than Permits By Rule, PSD Permits, or NA Permits) for the Application Area.	
Authorization No.: 4415	Authorization No.: 54162
Permits By Rule (30 TAC Chapter 106) for the Application Area	
Number: 107	Version No./Date: 09/12/1989
Number: 051	Version No./Date: 09/12/1989
Number: 006	Version No./Date: 09/12/1989
Number: 070	Version No./Date: 09/12/1989
Number: 008	Version No./Date: 09/12/1989
Municipal Solid Waste and Industrial Hazardous Waste Permits With an Air Addendum	
Permit No.:	Permit No.:

RATIONALE FOR COMPLIANCE ASSURANCE MONITORING (CAM)/ PERIODIC MONITORING METHODS SELECTED

Periodic Monitoring:

The Federal Clean Air Act requires that each federal operating permit include monitoring sufficient to

assure compliance with the terms and conditions of the permit. Most of the emission limits and standards applicable to emission units at Title V sources include adequate monitoring to show that the units meet the limits and standards. For those requirements that do not include monitoring, or where the monitoring is not sufficient to assure compliance, the federal operating permit must include such monitoring for the emission units affected. The following emission units are subject to periodic monitoring requirements because the emission units are subject to an emission limitation or standard for an air pollutant (or surrogate thereof) in an applicable requirement that does not already require monitoring, or the monitoring for the applicable requirement is not sufficient to assure compliance:

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 1	Applicable Form: OP-UA06
APPLICABLE REGULATORY REQUIREMENT	
Name: 30 TAC Chapter 112, Sulfur Compounds	SOP Index No.: R112-1
Pollutant: SO2	Main Standard: § 112.9(a)
MONITORING INFORMATION	
Indicator: Fuel purchase and composition records	
Minimum Frequency: Upon receipt of fuel oil or upon completion of fuel blending	
Averaging Period: n/a	
Deviation Limit: Sulfur content of fuel oil > 0.8 wt% sulfur.	
Basis of Determination: Monitoring the sulfur content of fuel ensures that low sulfur fuel is being combusted. A boiler fired with low sulfur fuel is expected to produce little sulfur or visible emissions. Therefore, a reasonable assurance of compliance is proved by firing low sulfur content fuels in the boiler.	

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 1	Applicable Form: OP-UA06
APPLICABLE REGULATORY REQUIREMENT	
Name: 40 CFR Part 60, Subpart D	SOP Index No.: 60D-1
Pollutant: PM	Main Standard: § 60.42(a)(1)
MONITORING INFORMATION	
Indicator: Fuel Type	
Minimum Frequency: Annually or at any time an alternate fuel is used	
Averaging Period: n/a	
Deviation Limit: Firing a liquid fuel greater than 24 consecutive hours without conducting visible emission observation; visible emissions observed & Test Method 9 is not performed; or opacity greater than 20% except for one six-minute period/hour not greater 27%.	
Basis of Determination: Monitoring fuel type ensures that only pipeline natural gas is being combusted. A boiler fired with natural gas is expected to produce little visible emissions. Therefore, a reasonable assurance of compliance is provided by firing only natural gas in the boiler. When an alternate fuel is fired, the opacity or visible emissions are provided as monitoring options because an increase in opacity or the presence of visible emissions may be indicative of an increase in emissions.	

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 1	Applicable Form: OP-UA06
APPLICABLE REGULATORY REQUIREMENT	
Name: 40 CFR Part 60, Subpart D	SOP Index No.: 60D-2
Pollutant: PM	Main Standard: § 60.42(a)(1)
MONITORING INFORMATION	
Indicator: Fuel Type	
Minimum Frequency: Annually or at any time an alternate fuel is used	
Averaging Period: n/a	
Deviation Limit: Firing a liquid fuel greater than 24 consecutive hours without conducting visible emission observation; visible emissions observed & Test Method 9 is not performed; or opacity greater than 20% except for one six-minute period/hour not greater 27%.	
Basis of Determination: Monitoring fuel type ensures that only pipeline natural gas is being combusted. A boiler fired with natural gas is expected to produce little visible emissions. Therefore, a reasonable assurance of compliance is provided by firing only natural gas in the boiler. When an alternate fuel is fired, the opacity or visible emissions are provided as monitoring options because an increase in opacity or the presence of visible emissions may be indicative of an increase in emissions.	

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 1	Applicable Form: OP-UA06
APPLICABLE REGULATORY REQUIREMENT	
Name: 40 CFR Part 60, Subpart D	SOP Index No.: 60D-2
Pollutant: SO2	Main Standard: § 60.43(a)(1)
MONITORING INFORMATION	
Indicator: Sulfur Content of Fuel	

Minimum Frequency: quarterly and within 24 hours of any fuel change
Averaging Period: n/a*
Deviation Limit: Maximum fuel oil sulfur concentration of 0.77 wt%.
Basis of Determination: Monitoring the sulfur content of fuel ensures that low sulfur fuel is being combusted. A boiler fired with low sulfur fuel is expected to produce little sulfur or visible emissions. Therefore, a reasonable assurance of compliance is proved by firing low sulfur content fuels in the boiler.

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 1	Applicable Form: OP-UA06
APPLICABLE REGULATORY REQUIREMENT	
Name: 40 CFR Part 60, Subpart D	SOP Index No.: 60D-3
Pollutant: PM	Main Standard: § 60.42(a)(1)
MONITORING INFORMATION	
Indicator: Fuel Type	
Minimum Frequency: Annually or at any time an alternate fuel is used	
Averaging Period: n/a	
Deviation Limit: Firing a liquid fuel greater than 24 consecutive hours without conducting visible emission observation; visible emissions observed & Test Method 9 is not performed; or opacity greater than 20% except for one six-minute period/hour not greater 27%.	
Basis of Determination: Monitoring fuel type ensures that only pipeline natural gas is being combusted. A boiler fired with natural gas is expected to produce little visible emissions. Therefore, a reasonable assurance of compliance is provided by firing only natural gas in the boiler. When an alternate fuel is fired, the opacity or visible emissions are provided as monitoring options because an increase in opacity or the presence of visible emissions may be indicative of an increase in emissions.	

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 1	Applicable Form: OP-UA06
APPLICABLE REGULATORY REQUIREMENT	
Name: 40 CFR Part 60, Subpart D	SOP Index No.: 60D-3
Pollutant: SO2	Main Standard: § 60.43(b)
MONITORING INFORMATION	
Indicator: Sulfur Content of Fuel	
Minimum Frequency: quarterly and within 24 hours of any fuel change	
Averaging Period: n/a*	
Deviation Limit: Maximum fuel oil sulfur concentration of 0.77 wt%.	
Basis of Determination: Monitoring the sulfur content of fuel ensures that low sulfur fuel is being combusted. A boiler fired with low sulfur fuel is expected to produce little sulfur or visible emissions. Therefore, a reasonable assurance of compliance is proved by firing low sulfur content fuels in the boiler.	

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 4	Applicable Form: OP-UA15
APPLICABLE REGULATORY REQUIREMENT	
Name: 30 TAC Chapter 111, Visible Emissions	SOP Index No.: R111-1
Pollutant: PM (OPACITY)	Main Standard: § 111.111(a)(1)(C)
MONITORING INFORMATION	
Indicator: Fuel Type	
Minimum Frequency: Annually or at any time an alternate fuel is used	
Averaging Period: n/a	
Deviation Limit: Firing a liquid fuel for greater than 24 consecutive hours without conducting a visible emission observation; visible emissions are observed & Test Method 9 is not performed; or opacity greater than 15% over a six-minute period.	
Basis of Determination: Monitoring fuel type ensures that only pipeline natural gas is being combusted. A boiler fired with natural gas is expected to produce little visible emissions. Therefore, a reasonable assurance of compliance is provided by firing only natural gas in the boiler. When an alternate fuel is fired, the opacity or visible emissions are provided as monitoring options because an increase in opacity or the presence of visible emissions may be indicative of an increase in emissions.	

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 4	Applicable Form :OP-UA15
APPLICABLE REGULATORY REQUIREMENT	
Name: 30 TAC Chapter 111, Visible Emissions	SOP Index No.: R111-2
Pollutant: PM (OPACITY)	Main Standard: § 111.111(a)(1)(C)
MONITORING INFORMATION	
Indicator: Fuel Type	
Minimum Frequency: Annually or at any time an alternate fuel is used	
Averaging Period: n/a	
Deviation Limit: Firing a liquid fuel for greater than 24 consecutive hours without conducting a visible	

emission observation; visible emissions are observed & Test Method 9 is not performed; or opacity greater than 15% over a six-minute period.
Basis of Determination: Monitoring fuel type ensures that only pipeline natural gas is being combusted. A boiler fired with natural gas is expected to produce little visible emissions. Therefore, a reasonable assurance of compliance is provided by firing only natural gas in the boiler. When an alternate fuel is fired, the opacity or visible emissions are provided as monitoring options because an increase in opacity or the presence of visible emissions may be indicative of an increase in emissions.

UNIT/GROUP/PROCESS INFORMATION	
ID No.: 5	Applicable Form: OP-UA15
APPLICABLE REGULATORY REQUIREMENT	
Name: 30 TAC Chapter 111, Visible Emissions	SOP Index No.: N/A
Pollutant: PM (OPACITY)	Main Standard: § 111.111(a)(1)(C)
MONITORING INFORMATION	
Indicator: Fuel Type	
Minimum Frequency: Annually or at any time an alternate fuel is used	
Averaging Period: n/a	
Deviation Limit: Visible emissions are observed & Test Method 9 is not performed; or Opacity exceeds 15% averaged over a six-minute period per a Test Method 9 observation.	
Basis of Determination: Monitoring fuel type ensures that only pipeline natural gas is being combusted. A boiler fired with natural gas is expected to produce little visible emissions. Therefore, a reasonable assurance of compliance is provided by firing only natural gas in the boiler.	

COMPLIANCE STATUS

A review of the available information indicates that the applicant is in compliance with all applicable requirements for the site.

AVAILABLE UNIT ATTRIBUTE FORMS

OP-UA1 - Miscellaneous and Generic Unit Attributes
OP-UA2 - Stationary Reciprocating Internal Combustion Engine Attributes
OP-UA3 - Storage Tank/Vessel Attributes
OP-UA4 - Loading/Unloading Operations Attributes
OP-UA5 - Process Heater/Furnace Attributes
OP-UA6 - Boiler/Steam Generator/Steam Generating Unit Attributes
OP-UA7 - Flare Attributes

OP-UA8 - Coal Preparation Plant Attributes
OP-UA9 - Nonmetallic Mineral Process Plant Attributes
OP-UA10 - Gas Sweetening/Sulfur Recovery Unit Attributes
OP-UA11 - Stationary Turbine Attributes
OP-UA12 - Fugitive Emission Unit Attributes
OP-UA13 - Industrial Process Cooling Tower Attributes
OP-UA14 - Water Separator Attributes
OP-UA15 - Emission Point/Stationary Vent/Distillation Operation/Process Vent Attributes
OP-UA16 - Solvent Degreasing Machine Attributes
OP-UA17 - Distillation Unit Attributes
OP-UA18 - Surface Coating Operations attributes
OP-UA19 - Wastewater Unit Attributes
OP-UA20 - Asphalt Operations Attributes
OP-UA21 - Grain Elevator Attributes
OP-UA22 - Printing Attributes
OP-UA24 - Wool Fiberglass Insulation Manufacturing Plant Attributes
OP-UA25 - Synthetic Fiber Production Attributes
OP-UA26 - Electroplating and Anodizing Unit Attributes
OP-UA27 - Nitric Acid Manufacturing Attributes
OP-UA28 - Polymer Manufacturing Attributes
OP-UA29 - Glass Manufacturing Unit Attributes
OP-UA30 - Kraft, Soda, Sulfite, and Stand-Alone Semichemical Pulp Mill Attributes
OP-UA31 - Lead Smelting Attributes
OP-UA32 - Copper and Zinc Smelting/Brass and Bronze Production Attributes
OP-UA33 - Metallic Mineral Processing Plant Attributes
OP-UA34 - Pharmaceutical Manufacturing
OP-UA35 - Incinerator Attributes
OP-UA36 - Steel Plant Unit Attributes
OP-UA37 - Basic Oxygen Process Furnace Unit Attributes
OP-UA38 - Lead-Acid Battery Manufacturing Plant Attributes
OP-UA39 - Sterilization Source Attributes
OP-UA40 - Ferroalloy Production Facility Attributes
OP-UA41 - Dry Cleaning Facility AttributesOP-UA42 - Phosphate Fertilizer Manufacturing Attributes
OP-UA43 - Sulfuric Acid Production Attributes
OP-UA44 - Municipal Solid Waste Landfill/Waste Disposal Site Attributes
OP-UA45 - Surface Impoundment Attributes
OP-UA46 - Epoxy Resins and Non-Nylon Polyamides Production Attributes
OP-UA47 - Ship Building and Ship Repair Unit Attributes
OP-UA48 - Air Oxidation Unit Process Attributes
OP-UA49 - Vacuum-Producing System Attributes
OP-UA50 - Fluid Catalytic Cracking Unit Catalyst Regenerator/Fuel Gas Combustion Device/Claus Sulfur Recovery Plant Attributes
OP-UA51 - Dryer/Kiln/Oven Attributes
OP-UA52 - Closed Vent Systems and Control Devices
OP-UA53 - Beryllium Processing Attributes
OP-UA54 - Mercury Chlor-Alkali Cell Attributes
OP-UA55 - Transfer System Attributes
OP-UA56 - Vinyl Chloride Process Attributes
OP-UA57 - Cleaning/Depainting Operation Attributes
OP-UA58 - Treatment Process Attributes
OP-UA59 - Coke By-Product Recovery Plant Attributes

OP-UA60 - Chemical Manufacturing Process Unit Attributes
OP-UA61 - Pulp, Paper, or Paperboard Producing Process Attributes
OP-UA62 - Glycol Dehydration Unit Attributes
OP-UA63 - Vegetable Oil Production Attributes