# ADEQ OPERATING AIR PERMIT

Pursuant to the Regulations of the Arkansas Operating Air Permit Program, Regulation #26:

Permit #: 1819-AOP-R2

IS ISSUED TO:

Jonesboro - City Water & Light 1400 Hanley Drive Jonesboro, AR 72401 Craighead County CSN: 16-0412

THIS PERMIT AUTHORIZES THE ABOVE REFERENCED PERMITTEE TO INSTALL, OPERATE, AND MAINTAIN THE EQUIPMENT AND EMISSION UNITS DESCRIBED IN THE PERMIT APPLICATION AND ON THE FOLLOWING PAGES. THIS PERMIT IS VALID BETWEEN:

	March 10, 2000	and	March 9, 2005	
AND IS SUBJECT TO	O ALL LIMITS AND	CONDITI	ONS CONTAINED I	HEREIN.
Signed:				
Keith A. Michaels	_			Date Amended

#### **SECTION I: FACILITY INFORMATION**

PERMITTEE: Jonesboro - City Water & Light -

Northwest Substation

CSN: 16-0412

PERMIT NUMBER: 1819-AOP-R2

FACILITY ADDRESS: 1400 Hanley Drive

Jonesboro, AR 72401

COUNTY: Craighead

CONTACT POSITION: Rick White

TELEPHONE NUMBER: (870)219-5214

REVIEWING ENGINEER: Paul Osmon

UTM North-South (Y): 3969.3 km N

UTM East-West (X): 705.4 km E

Zone 15

CSN #: 16-0412

#### **SECTION II: INTRODUCTION**

#### **Summary**

Permit No. 1819-AOP-R2 is the third operating permit issued to Jonesboro - City Water and Light under Regulation 26. The facility was originally constructed in early 1999 with two GE LM2500 turbine driven generators rated 23 MW per unit and a fuel storage tank under a minor source permit. The original Title V permit was issued to allow the addition of a GE LM6000 turbine driven generator rated approximately 45 MW. This modification is issued to allow the addition of a fourth turbine driven generator which will also be powered by a GE LM6000 rated approximately 49 MW. There will be no changes in the ton per year emission limits from the previous permit. Emissions consist of products of combustion from the turbine exhausts, volatile organic compounds from the fuel storage tank, and particulate matter from the cooling tower drift.

#### **Process Description**

Four simple-cycle combustion turbines (which will be water injected for nitrogen oxides emissions control) will be utilized at a peaking power plant at the Northwest Substation, owned by City Water & Light in Jonesboro, Arkansas to drive electric generators to produce electricity.

The two original simple-cycle turbine units are General Electric LM2500 turbines capable of producing approximately twenty-three (23) megawatts of power each. Each of the original turbines can be fired with natural gas or fuel oil. Hot turbine exhaust gases are discharged from the power turbines through stacks designated as SN-01 for the first power turbine and SN-02 for the second power turbine. These units are permitted to fire either natural gas or diesel fuel oil.

The third and fourth simple-cycle turbine units have been added which are General Electric LM6000 turbines. The No. 3 unit is capable of producing approximately forty-five (45) megawatts of power, and the No. 4 unit is capable of producing approximately forty-nine (49) megawatts of power. Hot turbine exhaust gases are discharged from the power turbine through a stack designated as SN-04 for the No. 3 unit and SN-06 for the No. 4 unit. These units are permitted to fire either natural gas or diesel fuel oil.

A cooling tower is used to cool the inlet air to the LM6000 units (SN-04 and SN-06) allowing them to operate at a higher rated power level during high ambient air temperatures. The drift from the cooling tower (SN-05) will contain particulate matter.

A third emission point, identified as SN-03, is the fuel oil storage tank.

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Estimations of hazardous air pollutant (HAP) emission rates are based on the Gas Research Institute Topical Report GRI-96/0009.1 *Measurement of Air Toxic Emissions from Natural Gas-Fired Internal Combustion Engines at Natural Gas Transmission and Storage Facilities. Volume 1.* February, 1996 for natural gas combustion and on AP-42 for fuel oil combustion. This permit lists acetaldehyde as the only significant HAP produced during gas fired turbine operation.

#### Regulations

The facility is subject to regulation under the *Clean Air Act* as amended, the *Arkansas Water and Air Pollution Control Act*, *The Arkansas Air Pollution Control Code* (Regulation 18), the *Regulations of the Arkansas Plan of Implementation for Air Pollution Control* (Regulation 19), and the *Regulations of the Arkansas Operating Air Permit Program* (Regulation 26).

The direct fired simple-cycle turbines (SN-01, SN-02, SN-04, and SN-06) are subject to requirements of the *New Source Performance Standards (NSPS)*, 40 CFR Part 60, Subpart GG. Also the General Electric LM6000 turbines (SN-04 and SN-06) are subject to regulation by the Federal Acid Rain Program, specifically the requirements of 40 CFR Parts 72, 73, and 75. This permit contains Specific Conditions limiting operating hours and fuel restrictions only for SN-04 and SN-06 such that they can be classified as peaking units as defined in 40 CFR 72.2. This allows a PEMS to be substituted for a CEMS for SO<sub>2</sub> and NO<sub>x</sub> monitoring, no continuous opacity monitor required, and other provisions of the acid rain sections to not be applicable. The fuel oil storage tank (SN-03) is subject to 40 CFR 60 Subpart Kb - *Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984*.

The following table is a summary of emissions from the facility. Specific conditions and emissions for each source can be found starting on the page cross referenced in the table. This table, in itself, is not an enforceable condition of the permit.

	EMISSION SUMMARY					
Source Description		Pollutant	Emiss	ion Rates	Cross	
No.			lb/hr	tpy	Reference Page	
Total Allowable Emissions		PM PM <sub>10</sub> SO <sub>2</sub> VOC CO	60.8 60.8 226.0 60.1 262.0	75.6 75.6 93.6 89.1 239.0		

	El	MISSION SUMM	IARY		
Source	Description	Pollutant	Emiss	ion Rates	Cross
No.			lb/hr	tpy	Reference Page
		$NO_x$	244.0	239.0	
		acetaldehyde*	10.2	14.1	
01	General Electric LM2500 Combustion	$\begin{array}{c} \text{PM} \\ \text{PM}_{10} \\ \text{SO}_2 \\ \text{YOC} \end{array}$	8 8 8	72.1** 72.1** 93.6**	9
	Turbine Natural Gas Fired 228 MMBTU/Hr (1999)	VOC CO NO <sub>x</sub>	10 42 38.9	88.6** 239.0** 239.0**	
		acetaldehyde*	1.8	14.1**	
02	General Electric LM2500 Combustion Turbine Natural Gas Fired 228 MMBTU/Hr (1999)	PM PM <sub>10</sub> SO <sub>2</sub> VOC CO NO <sub>x</sub> acetaldehyde*	8 8 8 10 42 38.9		
04	General Electric LM6000 Combustion Turbine Natural Gas Fired 440 MMBTU/Hr (2000)	PM PM <sub>10</sub> SO <sub>2</sub> VOC CO NO <sub>x</sub> acetaldehyde*	16 16 15 20 67 56		
06	General Electric LM6000 Combustion Turbine Natural Gas Fired	PM PM <sub>10</sub> SO <sub>2</sub> VOC CO	16 16 15 20 67		

	E	MISSION SUMM	IARY		
Source	Description	Pollutant	Emiss	sion Rates	Cross
No.			lb/hr	tpy	Reference Page
	440 MMBTU/Hr (2002)	$NO_x$	56		1
	(2002)	acetaldehyde*	3.3		
01	General Electric	PM	10		
	LM2500	$PM_{10}$	10		
	Combustion Turbine	$SO_2$ VOC	38 10		
	Fuel Oil Fired	CO	44		
	234 MMBTU/Hr	NO <sub>x</sub>	41		
	(1999)	1,0χ	11		
02	General Electric	PM	10		
	LM2500	$PM_{10}$	10		
	Combustion	$SO_2$	38		
	Turbine	VOC	10		
	Fuel Oil Fired 234 MMBTU/Hr	CO NO <sub>x</sub>	67 41		
	(1999)	INO <sub>X</sub>	41		
04	General Electric	PM	20		
	LM6000	$PM_{10}$	20		
	Combustion	$SO_2$	75 20		
	Turbine	VOC	20		
	Fuel Oil Fired 440 MMBTU/Hr	CO NO <sub>x</sub>	87 81		
	(2000)	NO <sub>x</sub>	01		
06	General Electric	PM	20		
	LM6000	$PM_{10}$	20		
	Combustion	$SO_2$	75		
	Turbine	VOC	20		
	Fuel Oil Fired	CO	87		
	440 MMBTU/Hr (2002)	$NO_x$	81		

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	EMISSION SUMMARY				
Source	Description	Pollutant	Emiss	ion Rates	Cross
No.			lb/hr	tpy	Reference Page
03	Vertical Fuel Oil Storage Tank 15' High x 80' Diameter (1999)	VOC	0.1	0.5	19
05	Cooling Tower (2000)	${ m PM} \over { m PM}_{10}$	0.8 0.8	3.5 3.5	20

<sup>\* -</sup> Hazardous Air Pollutant which is also included in VOCs

<sup>\*\* -</sup> Emission limits for combustion products from the turbines are a PAL based on Specific Condition No. 3.

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#### **SECTION III: PERMIT HISTORY**

Permit No. 1819-A was issued on June 3, 1999 to Jonesboro - City Water and Light for the installation and operation of a peaking power plant powered by two 23 MW GE LM-2500 turbines. Permit limits were listed as  $PM/PM_{10}$  - 17.6 tpy,  $SO_2$  - 26.8 tpy, VOC - 21.4 tpy, CO - 89.9 tpy and  $NO_x$  - 83.5 tpy.

Permit No. 1819-AOP-R0 was issued on March 10, 2000 to Jonesboro - City Water and Light for the addition of a third unit at the power plant which was driven by a 45 MW GE LM-6000 turbine. Hours of operation limits were taken to classify the unit as a "peaking unit" as defined in 40 CFR Part 75. Permit limits were listed as PM/PM $_{10}$  - 75.0 tpy, SO $_{2}$  - 83.9 tpy, VOC - 89.0 tpy, CO - 239.0 tpy, NO $_{x}$  - 239.0 tpy and acetaldehyde - 14.1 tpy.

Permit No. 1819-AOP-R1 was issued on May 17, 2001 to Jonesboro - City Water and Light to allow the GE LM6000 unit to also be fired for a limit amount of time on fuel oil. Permit limits were listed as  $PM/PM_{10}$  - 72.1 tpy,  $SO_2$  - 93.6 tpy, VOC - 88.6 tpy, CO - 239.0 tpy,  $NO_x$  - 239.0 tpy and acetaldehyde - 14.1 tpy.

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SECTION IV: EMISSION UNIT INFORMATION

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#### SN-01, SN-02, SN-04, and SN-06 General Electric Turbine Drive Generators

#### **Source Description**

The two original simple-cycle turbine units are General Electric LM2500 turbines capable of producing approximately twenty-three (23) megawatts each. Each simple cycle turbine will be fired with natural gas or fuel oil. Each unit is being permitted to be fired with fuel oil for up to 325 hours per year and with natural gas for the remainder of the permit limit. The fuel burns in a combustor with air pressurized by the axial air compressor. Combustion products exit the combustor and drive the power turbine which powers both the electric generator and the axial air compressor. Hot turbine exhaust gases are discharged from the power turbines through stacks designated as SN-01 for the first power turbine and SN-02 for the second power turbine. These two turbines are subject to 40 CFR 60, Subpart GG - New Source Performance Standards for Stationary Gas Turbines.

The third and fourth turbine units are General Electric LM6000 turbines. The third unit is capable of producing approximately forty-five (45) megawatts and the fourth unit capable of producing approximately forty-nine (49) megawatts. These units are being permitted to be fired with fuel oil for up to 325 hours per year and with natural gas for the remainder of the permit limit. The fuel burns in a combustor with air pressurized by the axial air compressor. Combustion products exit the combustor and drive the power turbine which powers both the electric generator and the axial air compressor. Hot turbine exhaust gases are discharged from the power turbine through stacks designated as SN-04 and SN-06. These turbines are subject to 40 CFR 60, Subpart GG - *New Source Performance Standards for Stationary Gas Turbines*. They are also subject to regulation by the Federal Acid Rain Program, specifically the requirements of 40 CFR Parts 72, 73, and 75. This permit contains Specific Conditions limiting operating hours for SN-04 and SN-06 such that they can be classified as peaking units as defined in 40 CFR 72.2. This allows a PEMS to be substituted for a CEMS for SO<sub>2</sub> and NO<sub>x</sub> monitoring, no continuous opacity monitor required, and other provisions of the acid rain sections to not be applicable.

All four turbines are water injected to control the level of nitrogen oxides emissions.

The permitted pollutants in pounds per hour for each individual turbine is based on maximum capacity of the equipment and the fuel utilized. The tons per year emission limits for the turbines for carbon monoxide and oxides of nitrogen are based on limiting the hours of operation by the formula included in the permit in Specific Condition No.3 to prevent exceeding the permit limits. The tons per year limit of sulfur dioxide listed in the permit is based on the turbines operating on fuel oil enough to utilize the entire usage limit of fuel oil in the permit.

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#### **Specific Conditions**

1. Pursuant to §19.501 et seq of the Regulations of the Arkansas Plan of Implementation for Air Pollution Control (Regulation #19) effective February 15, 1999 and 40 CFR Part 52, Subpart E, the permittee shall not exceed the emission rates set forth in the following table. The lb/hr emission limits are based on the maximum capacity of the equipment. Compliance with the ton per year limits will be demonstrated by completion of the formula contained in Specific Condition No. 3 with a resultant of less than 239 tpy.

SN	Description	Pollutant	lb/hr	tpy
01	General Electric LM2500 Combustion Turbine Natural Gas Fired 228 MMBTU/Hr	PM <sub>10</sub> SO <sub>2</sub> VOC CO NO <sub>X</sub>	8 8 10 42 38.9	72.1** 93.6** 88.6** 239.0**
02	General Electric LM2500 Combustion Turbine Natural Gas Fired 228 MMBTU/Hr	PM <sub>10</sub> SO <sub>2</sub> VOC CO NO <sub>X</sub>	8 8 10 42 38.9	
04	General Electric LM6000 Combustion Turbine Natural Gas Fired 440 MMBTU/Hr	PM <sub>10</sub> SO <sub>2</sub> VOC CO NO <sub>X</sub>	16 15 20 67 56	
06	General Electric LM6000 Combustion Turbine Natural Gas Fired 440 MMBTU/Hr	PM <sub>10</sub> SO <sub>2</sub> VOC CO NO <sub>X</sub>	16 15 20 67 56	
01	General Electric LM2500 Combustion Turbine Fuel Oil Fired 234 MMBTU/Hr	PM <sub>10</sub> SO <sub>2</sub> VOC CO	10 38 10 44	

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SN	Description	Pollutant NO <sub>X</sub>	lb/hr 41	tpy
02	General Electric LM2500 Combustion Turbine Fuel Oil Fired 234 MMBTU/Hr	PM <sub>10</sub> SO <sub>2</sub> VOC CO NO <sub>X</sub>	10 38 10 44 41	
04	General Electric LM6000 Combustion Turbine Fuel Oil Fired 440 MMBTU/Hr	$\begin{array}{c} PM_{10} \\ SO_2 \\ VOC \\ CO \\ NO_X \end{array}$	20 75 20 87 81	
06	General Electric LM6000 Combustion Turbine Fuel Oil Fired 440 MMBTU/Hr	PM <sub>10</sub> SO <sub>2</sub> VOC CO NO <sub>X</sub>	20 75 20 87 81	

<sup>\*\* -</sup> Emission limits for combustion products from the turbines are a PAL based on Specific Condition No. 3.

2. Pursuant to §18.801 of the Arkansas Air Pollution Control Code (Regulation #18) effective February 15, 1999, and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the permittee shall not exceed the emission rates set forth in the following table. The lb/hr emission limits are based on the maximum capacity of the equipment. Compliance with the ton per year limits will be demonstrated by completion of the formula contained in Specific Condition No. 3 with a resultant of less than 239 tpy.

SN	Description	Pollutant	lb/hr	tpy
01	General Electric LM2500 Combustion Turbine	PM	8	72.5**
	Natural Gas Fired 228 MMBTU/Hr	Acetaldehyde*	1.8	14.1**
02	General Electric LM2500 Combustion Turbine	PM	8	
	Natural Gas Fired	Acetaldehyde*	1.8	

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SN	Description	Pollutant	lb/hr	tpy
	228 MMBTU/Hr			
04	General Electric LM6000 Combustion Turbine	PM	16	
	Natural Gas Fired 440 MMBTU/Hr	Acetaldehyde*	3.3	
06	General Electric LM6000 Combustion Turbine	PM	16	
	Natural Gas Fired 440 MMBTU/Hr	Acetaldehyde*	3.3	
06	General Electric LM6000 Combustion Turbine Fuel Oil Fired 440 MMBTU/Hr	PM	20	
04	General Electric LM6000 Combustion Turbine Fuel Oil Fired 440 MMBTU/Hr	PM	20	
01	General Electric LM2500 Combustion Turbine Fuel Oil Fired 234 MMBTU/Hr	PM	10	
02	General Electric LM2500 Combustion Turbine Fuel Oil Fired 234 MMBTU/Hr	PM	10	

<sup>\*\* -</sup> Emission limits for combustion products from the turbines are a PAL based on Specific Condition No. 3.

3. Pursuant to §19.705 of Regulation 19, A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, and 40 CFR 70.6, the permittee shall calculate the tons per previous year carbon monoxide and oxides of nitrogen emitted based on the following formulas during each month the facility is operated.

CO(tpy) = [(44 lb/hr x DF12)+(42 lb/hr x NG12)+(87 lb/hr x DF46)+(67 lb/hr x NG46)]/2000

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 $NO_x(tpy) = [(41 lb/hr x DF12) + (38.9 lb/hr x NG12) + (81 lb/hr x DF46) + (56 lb/hr x NG46)]/2000$ 

#### Where:

DF12 = total operating hours of SN-01 and SN-02 when firing diesel fuel

NG12 = total operating hours of SN-01 and SN-02 when firing natural gas

DF46 = total operating hours of SN-04 and SN-06 when firing diesel fuel

NG46 = total operating hours of SN-04 and SN-06 when firing natural gas

A resultant of greater than 239.0 tpy for either the carbon monoxide or oxides of nitrogen formula for any consecutive 12 month period shall be considered a violation of this permit. The results of these calculations shall be completed by the 15<sup>th</sup> of the month for the previous month, kept on site, and made available to Department personnel upon request. A copy of the results of these calculations for each month operated shall be submitted in accordance with General Provision No. 7.

4. Pursuant to §18.501 of Regulation 18 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, visible emissions shall not exceed the limits specified in the following table of this permit as measured by EPA Reference Method 9.

SN	Limit	Reg. Citation
01 02 04 06 (gas fired)	5%	18.501 & A.C.A.
01 02 04 06 (oil fired)	20%	19.503 & A.C.A.

5. Pursuant to §18.1004 of Regulation 18 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, one observation of the opacity from either SN-01 or SN-02 and one observation of the opacity from either SN-04 and SN-06 (while they are being fired with fuel oil) shall be measured during each calender year using personnel trained in EPA

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Reference Method 9. Should visible emissions appear in excess of the permitted opacity, the permittee shall immediately take action to identify the cause of the visible emissions, implement corrective action, and document that visible emissions did not appear to be in excess of the permitted opacity following the corrective action. The permittee shall maintain records which contain the records of the visible emissions while firing with fuel oil in order to demonstrate compliance with Specific Condition No.4. These records shall be updated yearly, kept on site, and made available to Department personnel upon request.

- 6. Pursuant to §19.705 of Regulation 19 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the natural gas fired at the facility shall be only pipeline quality natural gas. Pipeline quality natural gas contains less than 0.3 grains of hydrogen sulfide per hundred standard cubic feet and hydrogen sulfide constitutes greater than 50% of the sulfur (by weight) in the natural gas.
- 7. Pursuant to §19.705 of Regulation 19 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the fuel oil usage at the facility shall not exceed 2,220,100 gallons per rolling 12 month period.
- 8. Pursuant to §18.1004 of Regulation 18 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the facility shall use only fuel oil with a sulfur content of less than 0.3 weight per cent when firing on fuel oil.
- 9. Pursuant to §19.705 of Regulation 19 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the permittee shall maintain monthly records which demonstrate compliance with Specific Condition No. 7. Records shall be updated by the fifteenth day of the month following the month for which the records pertain. These records shall be kept on site, and shall be made available to Department personnel upon request. A twelve month rolling average and each individual month's data shall be submitted in accordance with General Provision No. 7.
- 10. Pursuant to §18.1004 of Regulation 18 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the permittee shall maintain monthly records which demonstrate compliance with Specific Condition No. 8. Records shall be updated by the fifteenth day of the month following the month for which the records pertain. These records shall be kept on site, and shall be made available to Department personnel upon request. A twelve month rolling average and each individual month's data shall be submitted in accordance with General Provision No. 7.
- 11. Pursuant to §19.501 et seq of the Regulations of the Arkansas Plan of Implementation

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for Air Pollution Control (Regulation 19) and 40 CFR Part 52, Subpart E the permittee shall not exceed from SN-04 and SN-06 a  $NO_x$  emission concentration of 75 ppmvd corrected to 15%  $O_2$  at ISO conditions and an average hourly rate of 56 lb/hr when being fired on natural gas. Compliance shall be demonstrated by PEMS required by Specific Condition 13.

#### **NSPS Requirements**

12. Pursuant to §19.304 and 40 CFR Part 60, Subpart GG, SN-01, SN-02, and SN-04 are subject to 40 CFR Subpart 60, Subpart A, General Provisions and 40 CFR Subpart 60, Subpart GG, Standards of Performance for Stationary Gas Turbines due to being a stationary gas turbine greater than 10.7 gigajoules per hour installed after October 3, 1977. The NSPS requirements are summarized below. Details of these requirements can be found in the subpart which is attached to this permit.

NSPS REQUIREME	ENTS SUMMARY
Subpart GG Reference	Requirement
60.332 (a)(1) 60.332(b)	Allowable NO <sub>x</sub> emissions must be less than the values obtained by completing the following formula for each fuel:  STD = 0.0075 (14.4)/Y + F  Where:  Y = Manufacturer's rated heat rate at manufacturer's rated load (kilojoules per watt hour).  F = emission allowance for fuel bound nitrogen  Units No. 1 and No. 2:  CALCULATED LIMIT THIS APPLICATION FOR GAS FUEL: 100 PPM  CALCULATED LIMIT THIS APPLICATION FOR OIL FUEL: 102 PPM  Units No. 4 and No. 6:  CALCULATED LIMIT THIS APPLICATION FOR GAS FUEL: 75 PPM  CALCULATED LIMIT THIS APPLICATION FOR OIL FUEL: 77 PPM
60.333 (b)	Sulfur content of fuel being fired shall not exceed 0.8 percent by weight. This limit is superceded by voluntary limit taken by permittee in Specific Condition 8 which specifies a 0.3 weight percent limit.

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60.334(a)	A continuous monitoring system will record the fuel consumption and the ratio of water to fuel being fired. This system shall be accurate within " 5%.
60.334(b)(1) 60.334 (b)(2)	Daily monitoring and recording of sulfur and nitrogen content of fuel being fired. Liquid fuel need only be monitored each time that fuel is transferred to the storage tank (§60.334(b)(1)) (This condition will stay in effect until written approval for a custom schedule is obtained by the facility from EPA and ADEQ)
60.334 (c)	Semiannually report:
	Any hour during which the average water-to-fuel ratio as measured by the continuous monitoring system falls below the water-to-fuel ratio determined to demonstrate compliance; Any period which the fuel bound nitrogen exceeds the fuel-bound allowance used in the formula in §60.332 (a)(2)
	Any daily period during which the sulfur content of the fuel being fired exceeds 0.80 percent by weight.
	Any period during which the water injection was stopped to prevent ice fog problems.
60.335 (c)(1)	The NO <sub>x</sub> emissions shall be computed for each test run (required by Specific Condition 16) using the following equation:
	NO <sub>x</sub> =(NOxo)(Pr/Po) <sup>0.5</sup> [e <sup>19(Ho-0.00633)</sup> ] (288/Ta) <sup>1.53</sup> where:  NOx=emission rate at 15% O <sub>2</sub> and ISO standard ambient conditions, ppm by volume.  NOxo=observed Nox concentration, ppm by volume at 15% O <sub>2</sub> .  Pr=reference combustor inlet absolute pressure at 101.3 kilopascals ambient pressure, mm Hg.  Po=observed combustor inlet absolute pressure at test, mm Hg Ho=specific humidity of ambient air, g H <sub>2</sub> O/g air.  e=transcendental constant, 2.718.  Ta=ambient temperature, °K.
60.335(c)(2) 60.335 (c)(3)	Method 20 shall be used to determine the nitrogen oxides, sulfur dioxide, and oxygen concentrations. The span values shall be 300 ppm of nitrogen oxide and 21 percent oxygen. The $NO_x$ emissions shall be determined at 30, 50, 75, and 100 percent of peak load or at four points in the normal operating range of the gas turbine, including the minimum point in the range and peak load.
60.335(d)	The owner of operator shall determine compliance with the sulfur content standard as follows:  ASTM D 2880-71 shall be used to determine sulfur content in liquid fuels  ASTM d 1072-80, D 3031-81, D 4084-82, or D 3246-81 shall be used for sulfur content of gaseous fuels

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60.335(a) The owner or operator shall use analytical methods accurate to within 5% to determine the nitrogen content of the fuel
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- 13. Pursuant to §19.304 and 40 CFR, Part 60, Subpart GG, the permittee shall compile a monthly report (for any month the generators are operated) detailing the required ratio of water to fuel being fired called for by the digital control system (and established by Specific Condition 15) versus actual ratio of water to fuel being fired for each hour a unit is operated (§60.334(a)). A semi-annual report shall be submitted detailing the total hours for which the actual ratio of water to fuel falls below the water-to-fuel ratio necessary to demonstrate compliance with the permit nitrogen oxide emission levels (§60.334(c)(1)).
- 14. Pursuant to §19.304 and 40 CFR, Part 60, Subpart GG, the permittee is not required to operate the water injection equipment when the ice fog hazard exemption in §60.332(f) applies. The permittee shall report all such instances in the semi-annual report
- 15. Pursuant to §19.304 and 40 CFR, Part 60, Subpart GG, the permittee shall measure the emissions of both of the General Electric LM2500 simple-cycle combustion turbines while using fuel oil and while using natural gas (2 separate tests) and both of the General Electric LM6000 simple-cycle combustion turbines while using fuel oil and while using natural gas (2 separate tests). Initial testing shall be performed within 60 days of achieving the maximum production rate, but in no event later than 180 days after initial startup. An initial performance test for SN-06 (GE LM6000) shall be completed within 60 days of its initial firing. Periodic performance testing shall be performed every five (5) years thereafter on one of each model of engines installed with each LM2500 unit being tested alternated every five (5) years and with each LM6000 unit being tested alternated every five (5) years. ADEQ personnel shall have the option of selecting the engine to be tested for the first test before the test commences. The turbine shall be tested for NO<sub>x</sub> and SO<sub>2</sub> using EPA Method 20, and CO using EPA Method 10. These three pollutant tests shall be done simultaneously. The turbine shall be tested in accordance with the New Source Performance Standard, Subpart GG, Sections 60.335 (c)(1) and (c)(3). The water to fuel ratio used during each test point (30, 50, 75, and 100 percent of peak load or at four points in the normal operating range of the gas turbine) shall be submitted in the report. The test results shall be submitted to the Department (Compliance Section Manager) within 30 days after the completion of the testing.

#### **Acid Rain Requirements**

16. The General Electric LM6000 units (SN-04 and SN-06) are subject to and shall comply with all applicable provisions of the Acid Rain Program (40 CFR Parts 72, 73, and 75).

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A copy of 40 CFR Part 75 is provided in Appendix C.

- 1. Pursuant to 40 CFR Part 75 .14 (c) Continuous Opacity Monitoring SN-04 and SN-06 are exempt from the requirement for a continuous opacity monitor based on using only natural gas fuel and low sulfur diesel fuel.
- 2. Pursuant to 40 CFR Part 75 SN-04 and SN-06 are new "peaking units" as defined:
  - A. An average capacity factor of 10.0 percent during any 3 consecutive calendar years.
  - B. A capacity factor of no more than 20.0 percent during any of those years.
- 3. Pursuant to 40 CFR Part 75 The facility must submit an alternate monitoring plan to ADEQ prior to the unit (SN-06) being placed in service.
- 17. Pursuant to §19.304 of Regulation 19 and 40 CFR 75, the hours of operation for the General Electric LM6000 Combustion Turbines (SN-04 and SN-06) shall not exceed 1,752 hours each during any single calender year and shall not exceed 2,628 hours each for any consecutive 3 calender year period. Record keeping for this Specific Condition is contained in Specific Condition No. 3.

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#### SN-03 Fuel Oil Storage Tank

#### **Source Description**

A fuel storage tank is utilized for storing the fuel oil for the turbines. The tank has a shell height of fifteen feet (15') and a diameter of eighty feet (80'). This tank has a storage capacity of 564,076 gallons. The net emissions are calculated based on throughput of 1,128,000 gallons per year. The fuel oil storage tank is subject to 40 CFR 60 Subpart Kb - Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced after July 23, 1984 which is attached as Appendix E. Since the tank has a capacity greater than 151 cubic meters and stores a liquid with a true maximum vapor pressure of less than 3.5 kPa, this equipment is probably only subject to the provisions of §60.110b(c), §60.116b(a), and §60.116b(b).

#### **Specific Conditions**

18. Pursuant to §19.501 of Regulation #19 and 40 CFR Part 52, Subpart E, the permittee shall not exceed the emission rates set forth in the following table. The lb/hr emission limits are based on the maximum capacity of the equipment. Compliance with Specific Condition No. 9 shall represent compliance with the tons per year limit.

SN	Description	Pollutant	lb/hr	tpy
03	Fuel Storage Tank - 15' x 80'	VOC	0.1	0.4

#### **NSPS Requirement**

19. Pursuant to §19.304 of Regulation 19 and 40 CFR, Part 0, Subpart Kb, the facility shall keep readily accessible records showing the dimensions of the fuel oil storage tank and an analysis showing the capacity of the storage tank for the life of the facility. All volatile organic liquids stored in the fuel oil storage tank must have a true vapor pressure of less than 3.5 kPa (0.5 psia).

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#### SN-05 Cooling Tower

#### **Source Description**

A cooling tower will circulate water which will be used on hot days to cool the inlet air to the turbine. This will allow the turbine to maintain rated power on high ambient temperature days. The cooling tower drift will contain water with total dissolved solids. The total dissolved solids are considered to be particulate emissions. The cooling tower will be equipped with drift eliminators to control these particulate emissions.

#### **Specific Conditions**

20. Pursuant to §19.501 of Regulation #19 and 40 CFR Part 52, Subpart E, the permittee shall not exceed the emission rates set forth in the following table. The lb/hr and tons per year emission limits are based on the maximum capacity of the equipment and compliance with Specific Condition No. 22.

SN	Description	Pollutant	lb/hr	tpy
05	Cooling Tower	PM <sub>10</sub>	0.8	3.5

21. Pursuant to §18.801 of Regulation #18 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the permittee shall not exceed the emission rates set forth in the following table. The lb/hr and tons per year emission limits are based on the maximum capacity of the equipment and compliance with Specific Condition No. 22.

SN	Description	Pollutant	lb/hr	tpy
05	Cooling Tower	PM	0.8	3.5

22. Pursuant to §19.705 of Regulation #19, A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, and 40 CFR Part 52, Subpart E, the permittee shall test and record the total dissolved solids of the cooling water on a weekly basis when SN-05 is operating. Results less than 1,500 ppm total dissolved solids will assure compliance with Specific Conditions No. 20 and 21 of this permit. The results shall be kept on site and made available to Department personnel upon request.

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#### SECTION V: COMPLIANCE PLAN AND SCHEDULE

Jonesboro - City Water & Light is in compliance with the applicable regulations cited in the permit application except for some record keeping provisions and are operating under a CAO to correct the deficiencies. Jonesboro - City Water & Light will continue to operate in compliance with those identified regulatory provisions. The facility will examine and analyze future regulations that may apply and determine their applicability with any necessary action taken on a timely basis.

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#### **SECTION VI: PLANTWIDE CONDITIONS**

- 1. Pursuant to §19.704 of Regulation 19, 40 CFR Part 52, Subpart E, and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the Director shall be notified in writing within thirty (30) days after construction has commenced, construction is complete, the equipment and/or facility is first placed in operation, and the equipment and/or facility first reaches the target production rate.
- 2. Pursuant to §19.410(B) of Regulation 19, 40 CFR Part 52, Subpart E, the Director may cancel all or part of this permit if the construction or modification authorized herein is not begun within 18 months from the date of the permit issuance or if the work involved in the construction or modification is suspended for a total of 18 months or more.
- 3. Pursuant to §19.702 of Regulation 19 and/or §18.1002 of Regulation 18 and A.C.A. §8-4-203 as referenced by A.C.A. §8-4-304 and §8-4-311, any equipment that is to be tested, unless stated in the Specific Conditions of this permit or by any federally regulated requirements, shall be tested with the following time frames: (1) Equipment to be constructed or modified shall be tested within sixty (60) days of achieving the maximum production rate, but in no event later than 180 days after initial start-up of the permitted source or (2) equipment already operating shall be tested according to the time frames set forth by the Department. The permittee shall notify the Department of the scheduled date of compliance testing at least fifteen (15) days in advance of such test. Compliance test results shall be submitted to the Department within thirty (30) days after the completed testing.
- 4. Pursuant to §19.702 of Regulation 19 and/or §18.1002 of Regulation 18 and A.C.A. §8-4-203 as referenced by A.C.A. §8-4-304 and §8-4-311, the permittee shall provide:
  - a. Sampling ports adequate for applicable test methods
  - b. Safe sampling platforms
  - c. Safe access to sampling platforms
  - d. Utilities for sampling and testing equipment
- 5. Pursuant to §19.303 of Regulation 19 and A.C.A. §8-4-203 as referenced by A.C. A. §8-4-304 and §8-4-311, the equipment, control apparatus and emission monitoring equipment shall be operated within their design limitations and maintained in good condition at all times.

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6. Pursuant to Regulation 26 and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, this permit subsumes and incorporates all previously issued air permits for this facility.

#### Acid Rain (Title IV)

7. Pursuant to §26.701 of Regulation #26 and 40 CFR 70.6(a)(4), the permittee is prohibited from causing any emissions which exceed any allowances that the source lawfully holds under Title IV of the Act or the regulations promulgated thereunder. No permit revision is required for increases in emissions that are authorized by allowances acquired pursuant to the acid rain program, provided that such increases do not require a permit revision under any other applicable requirement. This permit establishes no limit on the number of allowances held by the permittee. The source may not, however, use allowances as a defense to noncompliance with any other applicable requirement of this permit or the Act. Any such allowance shall be accounted for according to the procedures established in regulations promulgated under Title IV of the Act.

#### **Title VI Provisions**

- 8. The permittee shall comply with the standards for labeling of products using ozone depleting substances pursuant to 40 CFR Part 82, Subpart E:
  - a. All containers containing a class I or class II substance stored or transported, all products containing a class I substance, and all products directly manufactured with a class I substance must bear the required warning statement if it is being introduced to interstate commerce pursuant to §82.106.
  - b. The placement of the required warning statement must comply with the requirements pursuant to §82.108.
  - c. The form of the label bearing the required warning must comply with the requirements pursuant to §82.110.
  - d. No person may modify, remove, or interfere with the required warning statement except as described in §82.112.
- 9. The permittee shall comply with the standards for recycling and emissions reduction pursuant to 40 CFR Part 82, Subpart F, except as provided for MVACs in Subpart B:
  - a. Persons opening appliances for maintenance, service, repair, or disposal must comply with the required practices pursuant to §82.156.
  - b. Equipment used during the maintenance, service, repair, or disposal of appliances

- must comply with the standards for recycling and recovery equipment pursuant to §82.158.
- c. Persons performing maintenance, service repair, or disposal of appliances must be certified by an approved technician certification program pursuant to §82.161.
- d. Persons disposing of small appliances, MVACs, and MVAC-like appliances must comply with record keeping requirements pursuant to §82.166. ("MVAC-like appliance" as defined at §82.152.)
- e. Persons owning commercial or industrial process refrigeration equipment must comply with leak repair requirements pursuant to §82.156.
- f. Owners/operators of appliances normally containing 50 or more pounds of refrigerant must keep records of refrigerant purchased and added to such appliances pursuant to §82.166.
- 10. If the permittee manufactures, transforms, destroys, imports, or exports a class I or class II substance, the permittee is subject to all requirements as specified in 40 CFR part 82, Subpart A, Production and Consumption Controls.
- 11. If the permittee performs a service on motor (fleet) vehicles when this service involves ozone-depleting substance refrigerant (or regulated substitute substance) in the motor vehicle air conditioner (MVAC), the permittee is subject to all the applicable requirements as specified in 40 CFR part 82, Subpart B, Servicing of Motor Vehicle Air Conditioners.
  - The term "motor vehicle" as used in Subpart B does not include a vehicle in which final assembly of the vehicle has not been completed. The term "MVAC" as used in Subpart B does not include the air-tight sealed refrigeration system used as refrigerated cargo, or the system used on passenger buses using HCFC-22 refrigerant.
- 12. The permittee shall be allowed to switch from any ozone-depleting substance to any alternative that is listed in the Significant New Alternatives Program (SNAP) promulgated pursuant to 40 CFR part 82, Subpart G, Significant New Alternatives Policy Program.

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#### SECTION VII: INSIGNIFICANT ACTIVITIES

Pursuant to §26.304 of Regulation 26, the following sources are insignificant activities. Insignificant and trivial activities will be allowable after approval and federal register notice publication of a final list as part of the operating air permit program. Any activity for which a state or federal applicable requirement applies is not insignificant even if this activity meets the criteria of §304 of Regulation 26 or is listed below. Insignificant activity determinations rely upon the information submitted by the permittee in an application dated November, 1999. No insignificant activities were listed.

Pursuant to §26.304 of Regulation 26, the following emission units, operations, or activities have been determined by the Department to be insignificant activities. Activities included in this list are allowable under this permit and need not be specifically identified.

- 1. Combustion emissions from propulsion of mobile sources and emissions from refueling these sources unless regulated by Title II and required to obtain a permit under Title V of the federal Clean Air Act, as amended. This does not include emissions from any transportable units, such as temporary compressors or boilers. This does not include emissions from loading racks or fueling operations covered under any applicable federal requirements.
- 2. Air conditioning and heating units used for comfort that do not have applicable requirements under Title VI of the Act.
- 3. Ventilating units used for human comfort that do not exhaust air pollutants into the ambient air from any manufacturing/industrial or commercial process.
- 4. Non-commercial food preparation or food preparation at restaurants, cafeterias, or caterers, etc.
- 5. Consumer use of office equipment and products, not including commercial printers or business primarily involved in photographic reproduction.
- 6. Janitorial services and consumer use of janitorial products.
- 7. Internal combustion engines used for landscaping purposes.
- 8. Laundry activities, except for dry-cleaning and steam boilers.
- 9. Bathroom/toilet emissions.

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- 10. Emergency (backup) electrical generators at residential locations.
- 11. Tobacco smoking rooms and areas.
- 12. Blacksmith forges.
- 13. Maintenance of grounds or buildings, including: lawn care, weed control, pest control, and water washing activities.
- 14. Repair, up-keep, maintenance, or construction activities not related to the sources' primary business activity, and not otherwise triggering a permit modification. This may include, but is not limited to such activities as general repairs, cleaning, painting, welding, woodworking, plumbing, re-tarring roofs, installing insulation, paved/paving parking lots, miscellaneous solvent use, application of refractory, or insulation, brazing, soldering, the use of adhesives, grinding, and cutting.<sup>1</sup>
- 15. Surface-coating equipment during miscellaneous maintenance and construction activities. This activity specifically does not include any facility whose primary business activity is surface-coating or includes surface-coating or products.
- 16. Portable electrical generators that can be "moved by hand" from one location to another.<sup>2</sup>
- 17. Hand-held equipment for buffing, polishing, cutting, drilling, sawing, grinding, turning, or machining wood, metal, or plastic.
- 18. Brazing or soldering equipment related to manufacturing activities that do not result in emission of HAPs.<sup>3</sup>

<sup>&</sup>lt;sup>1</sup> Cleaning and painting activities qualify if they are not subject to VOC or HAP control requirements. Asphalt batch plant owners/operators must get a permit.

<sup>&</sup>lt;sup>2</sup> "Moved by hand" means that it can be moved by one person without assistance of any motorized or non-motorized vehicle, conveyance, or device.

<sup>&</sup>lt;sup>3</sup> Brazing, soldering, and welding equipment, and cutting torches related to manufacturing and construction activities that emit HAP

metals are more appropriate for treatment as insignificant activities based on size or production thresholds. Brazing, soldering, and welding equipment, and cutting torches related directly to plant maintenance and upkeep and repair or maintenance shop activities that emit HAP metals are treated as trivial and listed separately in this appendix.

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- 19. Air compressors and pneumatically operated equipment, including hand tools.
- 20. Batteries and battery charging stations, except at battery manufacturing plants.
- 21. Storage tanks, vessels, and containers holding or storing liquid substances that do not contain any VOCs or HAPs.<sup>4</sup>
- 22. Storage tanks, reservoirs, and pumping and handling equipment of any size containing soaps, vegetable oil, grease, animal fat, and no volatile aqueous salt solutions, provided appropriate lids and covers are used and appropriate odor control is achieved.
- 23. Equipment used to mix and package soaps, vegetable oil, grease, animal fat, and non-volatile aqueous salt solutions, provided appropriate lids and covers are used and appropriate odor control is achieved.
- 24. Drop hammers or presses for forging or metalworking.
- 25. Equipment used exclusively to slaughter animals, but not including other equipment at slaughter-houses, such as rendering cookers, boilers, heating plants, incinerators, and electrical power generating equipment.
- 26. Vents from continuous emissions monitors and other analyzers.
- 27. Natural gas pressure regulator vents, excluding venting at oil and gas production facilities.
- 28. Hand-held applicator equipment for hot melt adhesives with no VOCs in the adhesive.
- 29. Lasers used only on metals and other materials which do not emit HAPs in the process.
- 30. Consumer use of paper trimmers/binders.
- 31. Electric or steam-heated drying ovens and autoclaves, but not the emissions from the articles or substances being processed in the ovens or autoclaves or the boilers delivering the steam.

<sup>&</sup>lt;sup>4</sup> Exemptions for storage tanks containing petroleum liquids or other volatile organic liquids are based on size and limits including storage tank capacity and vapor pressure of liquids stored and are not appropriate for this list.

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- 32. Salt baths using non-volatile salts that do not result in emissions of any air pollutant covered by this regulation.
- 33. Laser trimmers using dust collection to prevent fugitive emissions.
- 34. Bench-scale laboratory equipment used for physical or chemical analysis not including lab fume hoods or vents.
- 35. Routine calibration and maintenance of laboratory equipment or other analytical instruments.
- 36. Equipment used for quality control/assurance or inspection purposes, including sampling equipment used to withdraw materials for analysis.
- 37. Hydraulic and hydrostatic testing equipment.
- 38. Environmental chambers not using hazardous air pollutant gases.
- 39. Shock chambers, humidity chambers, and solar simulators.
- 40. Fugitive emissions related to movement of passenger vehicles, provided the emissions are not counted for applicability purposes and any required fugitive dust control plan or its equivalent is submitted.
- 41. Process water filtration systems and demineralizers.
- 42. Demineralized water tanks and demineralizer vents.
- 43. Boiler water treatment operations, not including cooling towers.
- 44. Emissions from storage or use of water treatment chemicals, except for hazardous air pollutants or pollutants listed under regulations promulgated pursuant to Section 112(r) of the Act, for use in cooling towers, drinking water systems, and boiler water/feed systems.
- 45. Oxygen scavenging (de-aeration) of water.
- 46. Ozone generators.

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- 47. Fire suppression systems.
- 48. Emergency road flares.
- 49. Steam vents and safety relief valves.
- 50. Steam leaks.
- 51. Steam cleaning operations.
- 52. Steam and microwave sterilizers.
- 53. Site assessment work to characterize waste disposal or remediation sites.
- 54. Miscellaneous additions or upgrades of instrumentation.
- 55. Emissions from combustion controllers or combustion shutoff devices but not combustion units itself
- 56. Use of products for the purpose of maintaining motor vehicles operated by the facility, not including air cleaning units of such vehicles (i.e. antifreeze, fuel additives).
- 57. Stacks or vents to prevent escape of sanitary sewer gases through the plumbing traps.
- 58. Emissions from equipment lubricating systems (i.e. oil mist), not including storage tanks, unless otherwise exempt.
- 59. Residential wood heaters, cookstoves, or fireplaces.
- 60. Barbecue equipment or outdoor fireplaces used in connection with any residence or recreation.
- 61. Log wetting areas and log flumes.
- 62. Periodic use of pressurized air for cleanup.
- 63. Solid waste dumpsters.
- 64. Emissions of wet lime from lime mud tanks, lime mud washers, lime mud piles, lime mud filter and filtrate tanks, and lime mud slurry tanks.

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- 65. Natural gas odoring activities unless the Department determines that emissions constitute air pollution.
- 66. Emissions from engine crankcase vents.
- 67. Storage tanks used for the temporary containment of materials resulting from an emergency reporting of an unanticipated release.
- 68. Equipment used exclusively to mill or grind coatings in roll grinding rebuilding, and molding compounds where all materials charged are in paste form.
- 69. Mixers, blenders, roll mills, or calenders for rubber or plastic for which no materials in powder form are added and in which no organic solvents, diluents, or thinners are used.
- 70. The storage, handling, and handling equipment for bark and wood residues not subject to fugitive dispersion offsite (this applies to the equipment only).
- 71. Maintenance dredging of pulp and paper mill surface impoundments and ditches containing cellulosic and cellulosic derived biosolids and inorganic materials such as lime, ash, or sand.
- 72. Tall oil soap storage, skimming, and loading.
- 73. Water heaters used strictly for domestic (non-process) purposes.
- 74. Facility roads and parking areas, unless necessary to control offsite fugitive emissions.
- 75. Agricultural operations, including onsite grain storage, not including IC engines or grain elevators.
- 76. The following natural gas and oil exploration production site equipment: separators, dehydration units, natural gas fired compressors, and pumping units. This does not include compressors located on natural gas transmission pipelines.

#### **SECTION VIII: GENERAL PROVISIONS**

1. Pursuant to 40 C.F.R. 70.6(b)(2), any terms or conditions included in this permit which specify and reference Arkansas Pollution Control & Ecology Commission Regulation 18 or the Arkansas Water and Air Pollution Control Act (A.C.A. §8-4-101 *et seq.*) as the sole origin of and authority for the terms or conditions are not required under the Clean

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Air Act or any of its applicable requirements, and are not federally enforceable under the Clean Air Act. Arkansas Pollution Control & Ecology Commission Regulation 18 was adopted pursuant to the Arkansas Water and Air Pollution Control Act (A.C.A. §8-4-101 *et seq.*). Any terms or conditions included in this permit which specify and reference Arkansas Pollution Control & Ecology Commission Regulation 18 or the Arkansas Water and Air Pollution Control Act (A.C.A. §8-4-101 *et seq.*) as the origin of and authority for the terms or conditions are enforceable under this Arkansas statute.

- 2. Pursuant to 40 C.F.R. 70.6(a)(2) and §26.7 of the Regulations of the Arkansas Operating Air Permit Program (Regulation 26), this permit shall be valid for a period of five (5) years beginning on the date this permit becomes effective and ending five (5) years later.
- 3. Pursuant to §26.4 of Regulation #26, it is the duty of the permittee to submit a complete application for permit renewal at least six (6) months prior to the date of permit expiration. Permit expiration terminates the permittee's right to operate unless a complete renewal application was submitted at least six (6) months prior to permit expiration, in which case the existing permit shall remain in effect until the Department takes final action on the renewal application. The Department will not necessarily notify the permittee when the permit renewal application is due.
- 4. Pursuant to 40 C.F.R. 70.6(a)(1)(ii) and §26.7 of Regulation #26, where an applicable requirement of the Clean Air Act, as amended, 42 U.S.C. 7401, *et seq* (Act) is more stringent than an applicable requirement of regulations promulgated under Title IV of the Act, both provisions are incorporated into the permit and shall be enforceable by the Director or Administrator.
- 5. Pursuant to 40 C.F.R. 70.6(a)(3)(ii)(A) and §26.7 of Regulation #26, records of monitoring information required by this permit shall include the following:
  - a. The date, place as defined in this permit, and time of sampling or measurements;
  - b. The date(s) analyses were performed;
  - c. The company or entity that performed the analyses;
  - d. The analytical techniques or methods used;
  - e. The results of such analyses; and
  - f. The operating conditions existing at the time of sampling or measurement.
- 6. Pursuant to 40 C.F.R. 70.6(a)(3)(ii)(B) and §26.7 of Regulation #26, records of all required monitoring data and support information shall be retained for a period of at least 5 years from the date of the monitoring sample, measurement, report, or application.

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Support information includes all calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation, and copies of all reports required by this permit.

7. Pursuant to 40 C.F.R. 70.6(a)(3)(iii)(A) and §26.7 of Regulation #26, the permittee shall submit reports of all required monitoring every 6 months. If no other reporting period has been established, the reporting period shall end on the last day of the anniversary month of this permit. The report shall be due within 30 days of the end of the reporting period. Even though the reports are due every six months, each report shall contain a full year of data. All instances of deviations from permit requirements must be clearly identified in such reports. All required reports must be certified by a responsible official as defined in §26.2 of Regulation #26 and must be sent to the address below.

Arkansas Department of Environmental Quality Air Division ATTN: Compliance Inspector Supervisor Post Office Box 8913 Little Rock, AR 72219

- 8. Pursuant to 40 C.F.R. 70.6(a)(3)(iii)(B), §26.7 of Regulation #26, and §19.601 and 19.602 of Regulation #19, all deviations from permit requirements, including those attributable to upset conditions as defined in the permit shall be reported to the Department. An initial report shall be made to the Department by the next business day after the occurrence. The initial report may be made by telephone and shall include:
  - a. The facility name and location,
  - b. The process unit or emission source which is deviating from the permit limit,
  - c. The permit limit, including the identification of pollutants, from which deviation occurs,
  - d. The date and time the deviation started,
  - e. The duration of the deviation,
  - f. The average emissions during the deviation,
  - g. The probable cause of such deviations,
  - h. Any corrective actions or preventive measures taken or being taken to prevent such deviations in the future, and
  - i. The name of the person submitting the report.

A full report shall be made in writing to the Department within five (5) business days of discovery of the occurrence and shall include in addition to the information required by

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initial report a schedule of actions to be taken to eliminate future occurrences and/or to minimize the amount by which the permits limits are exceeded and to reduce the length of time for which said limits are exceeded. If the permittee wishes, they may submit a full report in writing (by facsimile, overnight courier, or other means) by the next business day after discovery of the occurrence and such report will serve as both the initial report and full report.

- 9. Pursuant to 40 C.F.R. 70.6(a)(5) and §26.7 of Regulation #26, and A.C.A.§8-4-203, as referenced by §8-4-304 and §8-4-311, if any provision of the permit or the application thereof to any person or circumstance is held invalid, such invalidity shall not affect other provisions or applications hereof which can be given effect without the invalid provision or application, and to this end, provisions of this Regulation are declared to be separable and severable.
- 10. Pursuant to 40 C.F.R. 70.6(a)(6)(i) and §26.7 of Regulation #26, the permittee must comply with all conditions of this Part 70 permit. Any permit noncompliance with applicable requirements as defined in Regulation #26 constitutes a violation of the Clean Air Act, as amended, 42 U.S.C. 7401, et seq. and is grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application. Any permit noncompliance with a state requirement constitutes a violation of the Arkansas Water and Air Pollution Control Act (A.C.A. §8-4-101 et seq.) and is also grounds for enforcement action; for permit termination, revocation and reissuance, or modification; or for denial of a permit renewal application.
- 11. Pursuant to 40 C.F.R. 70.6(a)(6)(ii) and §26.7 of Regulation #26, it shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit.

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- 12. Pursuant to 40 C.F.R. 70.6(a)(6)(iii) and §26.7 of Regulation #26, this permit may be modified, revoked, reopened, and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any permit condition.
- 13. Pursuant to 40 C.F.R. 70.6(a)(6)(iv) and §26.7 of Regulation #26, this permit does not convey any property rights of any sort, or any exclusive privilege.
- 14. Pursuant to 40 C.F.R. 70.6(a)(6)(v) and §26.7 of Regulation #26, the permittee shall furnish to the Director, within the time specified by the Director, any information that the Director may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating the permit or to determine compliance with the permit. Upon request, the permittee shall also furnish to the Director copies of records required to be kept by the permit. For information claimed to be confidential, the permittee may be required to furnish such records directly to the Administrator along with a claim of confidentiality.
- 15. Pursuant to 40 C.F.R. 70.6(a)(7) and §26.7 of Regulation #26, the permittee shall pay all permit fees in accordance with the procedures established in Regulation #9.
- 16. Pursuant to 40 C.F.R. 70.6(a)(8) and §26.7 of Regulation #26, no permit revision shall be required, under any approved economic incentives, marketable permits, emissions trading and other similar programs or processes for changes that are provided for elsewhere in this permit.
- 17. Pursuant to 40 C.F.R. 70.6(a)(9)(i) and §26.7 of Regulation #26, if the permittee is allowed to operate under different operating scenarios, the permittee shall, contemporaneously with making a change from one operating scenario to another, record in a log at the permitted facility a record of the scenario under which the facility or source is operating.
- 18. Pursuant to 40 C.F.R. 70.6(b) and §26.7 of Regulation #26, all terms and conditions in this permit, including any provisions designed to limit a source's potential to emit, are enforceable by the Administrator and citizens under the Act unless the Department has specifically designated as not being federally enforceable under the Act any terms and conditions included in the permit that are not required under the Act or under any of its applicable requirements.

- 19. Pursuant to 40 C.F.R. 70.6(c)(1) and §26.7 of Regulation #26, any document (including reports) required by this permit shall contain a certification by a responsible official as defined in §26.2 of Regulation #26.
- 20. Pursuant to 40 C.F.R. 70.6(c)(2) and §26.7 of Regulation #26, the permittee shall allow an authorized representative of the Department, upon presentation of credentials, to perform the following:
  - a. Enter upon the permittee's premises where the permitted source is located or emissions-related activity is conducted, or where records must be kept under the conditions of this permit;
  - b. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
  - c. Inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit; and
  - d. As authorized by the Act, sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with this permit or applicable requirements.
- 21. Pursuant to 40 C.F.R. 70.6(c)(5) and §26.7 of Regulation #26, the permittee shall submit a compliance certification with terms and conditions contained in the permit, including emission limitations, standards, or work practices. This compliance certification shall be submitted annually and shall be submitted to the Administrator as well as to the Department. All compliance certifications required by this permit shall include the following:
  - a. The identification of each term or condition of the permit that is the basis of the certification;
  - b. The compliance status:
  - c. Whether compliance was continuous or intermittent;
  - d. The method(s) used for determining the compliance status of the source, currently and over the reporting period established by the monitoring requirements of this permit; and
  - e. Such other facts as the Department may require elsewhere in this permit or by §114(a)(3) and 504(b) of the Act.
- 22. Pursuant to §26.7 of Regulation #26, nothing in this permit shall alter or affect the following:

- a. The provisions of Section 303 of the Act (emergency orders), including the authority of the Administrator under that section;
- b. The liability of the permittee for any violation of applicable requirements prior to or at the time of permit issuance;
- c. The applicable requirements of the acid rain program, consistent with §408(a) of the Act; or
- d. The ability of EPA to obtain information from a source pursuant to §114 of the Act.
- 23. Pursuant to A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, this permit authorizes only those pollutant emitting activities addressed herein.

### **APPENDIX A ADEQ CEMS Conditions**

APPENDIX B 40 CFR 60, Subpart GG

#### APPENDIX C Special Fuel Monitoring Protocol for Jonesboro CWL

Page Amended

# APPENDIX D 40 CFR, Part 75, Continuous Emissions Monitoring