

ADEQ OPERATING AIR PERMIT

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

Permit #: 1860-AOP-R1

IS ISSUED TO:

CT1 - Arkansas Electric Cooperative Corp.
Exit 18, I-30
Fulton, AR 71838
Hempstead County
CSN: 29-0304

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:

February 23, 2000

and

February 22, 2005

AND IS SUBJECT TO ALL LIMITS AND CONDITIONS CONTAINED HEREIN.

Signed:

Keith A. Michaels

Date

SECTION I: FACILITY INFORMATION

PERMITTEE: Arkansas Electric Cooperative Corp.
- CT1

CSN: 29-0304

PERMIT NUMBER: 1860-AOP-R1

FACILITY ADDRESS: Exit 18, I-30
Fulton, AR 71838

COUNTY: Hempstead

CONTACT POSITION: Stephen Cain

TELEPHONE NUMBER: (501) 570-2420

REVIEWING ENGINEER: Bryan Leamons

UTM North-South (Y): 3719.0

UTM East-West (X): 426.5

Zone: 15

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

SECTION II: INTRODUCTION

This revision is a minor modification allowing emergency operation of a 250 kW diesel-powered electric generator and the 500 gallon storage tank associated with it. Also a 3.75 MMBtu/hr fuel heater is permitted. Each is considered an insignificant activity pursuant to §26.3(d) of Regulation 26, and is listed in this permit under Section VII, "Insignificant Activities." Also, HAP emission rates are corrected.

Arkansas Electric Cooperative Corporation (AECC) operates an electric power station in Hempstead County near Fulton, Arkansas. The facility is capable of producing 153 megawatts (MW) of electricity in summertime conditions.

AECC operates a Siemens simple cycle combustion turbine with natural gas as the only fuel. Pollutants from this facility consist of combustion products, predominately nitrogen oxides (NO_x) at a permitted rate of 245 tons per year (tpy). Other pollutants from this facility are particulate matter (PM and PM₁₀), carbon monoxide (CO), volatile organic compounds (VOC), and sulfur dioxides (SO₂). Also, acrolein and formaldehyde, hazardous air pollutants (HAPs), are emitted at a rate of 0.02 and 1.72 tpy, respectively.

Estimations of hazardous air pollutant (HAP) emission rates are based on the AP-42 emission factors.

This facility is subject to regulation under 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 facility is subject to requirements of the *New Source Performance Standards (NSPS)*, 40 CFR Part 60, Subpart GG. Also, the facility is subject to regulation by the Federal Acid Rain Program, specifically the requirements of 40 CFR Parts 72, 73, and 75.

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.

Arkansas Electric Cooperative Corp. - CT1
 Permit #: 1860-AOP-R1
 CSN #: 29-0304

EMISSION SUMMARY					
Source No.	Description	Pollutant	Emission Rates		Cross Reference Page
			lb/hr	tpy	
Total Allowable Emissions		PM	70.9	101.0	
		PM ₁₀	70.9	101.0	
		SO ₂	1.1	1.6	
		VOC	40.6	57.9	
		CO	42.0	59.9	
		NO _x	172.0	245.0	
		acrolein	0.02	0.02	
		formaldehyde	1.21	1.72	
01	Siemens V84.3A Simple Cycle Combustion Turbine	PM	70.9	101.0	7
		PM ₁₀	70.9	101.0	
		SO ₂	1.1	1.6	
		VOC	40.6	57.9	
		CO	42.0	59.9	
		NO _x	172.0	245.0	
		acrolein	0.02	0.02	
		formaldehyde	1.21	1.72	

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

SECTION III: PERMIT HISTORY

Permit #1860-AOP-R0 was the initial permit for this facility.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

SECTION IV: EMISSION UNIT INFORMATION

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

SN-01: Siemens V84.3A Simple Cycle Combustion Turbine

Source Description

AECC operates one Siemens V84.3A simple cycle combustion turbine to drive electric generating equipment. The overall generating capacity of the unit is estimated at 153 MW during summer conditions (98E F).

The unit fires a mixture of compressed air and pipeline quality natural gas only. The unit is equipped with dry low NO_x (DLN) burners designed to limit the amount of NO_x produced during the combustion process. Hot, pressurized exhaust gasses produced by the DLN burners expand through a series of rotating turbine wheel and blade assemblies resulting in shaft power. Exhaust gasses are uncontrolled and exit through an 18-foot diameter, 90-foot tall stack (SN-01).

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. Compliance with this condition shall be demonstrated by the fuel limit and requirements of Specific Condition 4 and the continuous emission monitoring system (CEMS) required by Specific Condition 7.

Pollutant	lb/hr	tpy
PM ₁₀	70.9	101.0
SO ₂	1.1	1.6
VOC	40.6	57.9
CO	42.0	59.9
NO _x	172.0	245.0

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. Initial compliance with HAPs shall be demonstrated by Specific Condition 9. Ongoing compliance with this condition shall be demonstrated by the fuel limit requirements of Specific Condition 4.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

Pollutant	lb/hr	tpy
PM	70.9	101.0
<u>HAPs</u>		
acrolein	0.02	0.02
formaldehyde	1.21	1.72

3. Pursuant to §18.501 of Regulation 18, A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, and 40 CFR §70.6, the permittee shall not exceed an opacity of 5% from SN-01. Compliance shall be demonstrated by burning pipeline quality natural gas only.
4. 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 not consume more than 5,832 million SCF of pipeline quality natural gas per 12 consecutive months. Compliance shall be demonstrated by records required by Specific Condition 5.
5. Pursuant to §19.705 of Regulation 19 and 40 CFR 52, the permittee shall maintain monthly records which demonstrate compliance with Specific Condition 4. Records must contain a twelve month rolling total of monthly fuel usage along with usage records from each individual month. Records must be updated by the fifteenth day of the month following the month to which the records pertain. Records must be kept on-site and made available to the Department upon request. Reports of the twelve month rolling total shall be submitted to the Department semiannually, postmarked by the 30th day following each calendar half and in accordance with General Provision 7 of this permit.
6. Pursuant to §19.501 et seq of the Regulations of the Arkansas Plan of Implementation for Air Pollution Control (Regulation 19) and 40 CFR Part 52, Subpart E the permittee shall not exceed from SN-01 a NO_x emission concentration of 25 ppmvd corrected to 15% O₂ at ISO conditions. Compliance with this limit shall be determined as the average volumetric concentration (arithmetic average of three contiguous one hour periods) of NO_x corrected to 15% O₂ as measured by a CEMS.
7. Pursuant to §19.703 of Regulation 19, 40 CFR Part 52, and A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the permittee shall install, operate, and maintain continuous emission monitoring systems (CEMS) for NO_x at SN-01 in accordance with the ADEQ CEMS policy which is included as Appendix A of this permit. Compliance with the hourly limit set in Specific Condition 1 shall be determined as the average

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

emissions (arithmetic average of three contiguous one hour periods) of NO_x as measured by a CEMS and converted to pounds per hour using corresponding average (arithmetic average of three contiguous one hour periods) stack gas flow rates.

8. Pursuant to A.C.A. §8-4-203 as referenced by §8-4-304 and §8-4-311, the hourly emission rates and concentration limits do not apply during start-up, shutdown, and malfunction period.
9. Pursuant to §18.1002 and A.C.A as referenced by §8-4-304 and §8-4-311, the permittee shall perform a one time stack test for all detectable HAPs using Reference Method 18. Testing shall be performed in accordance with Plantwide Condition 3.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

NSPS Requirements

10. The Combustion Turbine (SN-01) is subject to and shall comply with applicable provisions of 40 CFR Part 60 Subpart A – General Provisions and 40 CFR Part 60 Subpart GG – Standards of Performance for Stationary Gas Turbines. A copy of Subpart GG is provided in Appendix B. Applicable provisions of Subpart GG include, but are not limited to, the following:
 - a. Pursuant to 40 CFR §60.332(a)(1), NO_x emissions shall not exceed 109.4 ppmvd at 15% O₂ at ISO conditions. Compliance will be demonstrated by compliance with Specific Condition 7.
 - b. Pursuant to 40 CFR §60.333(b), the permittee shall not burn any fuel which contains sulfur in excess of 0.8 percent by weight.
 - c. Pursuant to 40 CFR §60.334(b)(2), natural gas sulfur and nitrogen content shall be determined as specified by the fuel monitoring protocol outlined in Appendix C. Records of fuel monitoring shall be submitted to the Department postmarked within 30 days of each calendar half and in accordance with General Provision 7.
 - d. Pursuant to 40 CFR §60.334(c), the permittee shall file reports for periods of excess emissions for any period during which the fuel bound sulfur is greater than 0.8% by weight. Reports shall be submitted to the Department postmarked by the 30th day following each calendar half and in accordance with General Provision 7.
 - e. Pursuant to 40 CFR §60.335 and §60.8, initial compliance testing for NO_x is required within 180 days after start-up. The NO_x testing shall be conducted in accordance with tests methods in 40 CFR Part 60 Appendix A or alternative approved methods. The testing shall be conducted, at four points in the normal operating range of the turbine.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

Acid Rain Requirements

11. The Combustion Turbine (SN-01) is subject to and shall comply with all applicable provisions of the Acid Rain Program (40 CFR Parts 72, 73, and 75). A copy of 40 CFR Part 75 is provided in Appendix D.
 - a. Pursuant to 40 CFR Part 75 – Continuous Emission Monitoring Subpart G, the submission of the NO_x, SO₂, and O₂ or CO₂ monitoring plans and notice of CEMS certification testing is required at least 45 days prior to the CEMS certification testing.
 - b. Pursuant to 40 CFR Part 75 – Continuous Emission Monitoring Subpart G, a monitoring plan is required to be submitted for NO_x, SO₂, and O₂ or CO₂ monitoring. An SO₂ CEM shall be required pending approval by the agency of an optional SO₂ emission data protocol.
 - c. Pursuant to 40 CFR Part 75 Subpart A, the initial NO_x, SO₂, and O₂ or CO₂ CEMS certification testing is to occur no later than 90 days after the unit commences commercial operation except the testing must occur prior to the date this unit is declared commercial in accordance with DOE Form EIA-860.
 - d. Pursuant to 40 CFR §75.10, the permittee shall ensure that the continuous emissions monitoring systems are in operation and monitoring all unit emissions at all times, except during periods of calibration, quality assurance, preventative maintenance or repair.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

SECTION V: COMPLIANCE PLAN AND SCHEDULE

CT1 - Arkansas Electric Cooperative Corp. is in compliance with the applicable regulations cited in the permit application. CT1 - Arkansas Electric Cooperative Corp. 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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

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 §7(a) 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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

- 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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

SECTION VII: INSIGNIFICANT ACTIVITIES

Pursuant to §26.3(d) 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 §3(d) of Regulation 26 or is listed below. Insignificant activity determinations rely upon the information submitted by the permittee in an application received by the Department on June 2, 2000.

Description	Category
250 kW Emergency Diesel Generator	A-12
500 Gallon Diesel Storage Tank	A-3
3.75 MMBtu/hr Fuel Heater	A-1

Pursuant to §26.3(d) 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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

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.
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.¹
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.²
17. Hand-held equipment for buffing, polishing, cutting, drilling, sawing, grinding, turning, or machining wood, metal, or plastic.

¹ 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.

² "Moved by hand" means that it can be moved by one person without assistance of any motorized or non-motorized vehicle, conveyance, or device.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

18. Brazing or soldering equipment related to manufacturing activities that do not result in emission of HAPs.³
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.⁴
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.

³ 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.

⁴ 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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

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.
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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

45. Oxygen scavenging (de-aeration) of water.
46. Ozone generators.
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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

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.
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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

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 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;

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

- 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. 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,

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

- 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 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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

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.

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

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:

Arkansas Electric Cooperative Corp. - CT1
Permit #: 1860-AOP-R1
CSN #: 29-0304

- 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 Policy

APPENDIX B

40 CFR, Part 60, Subpart GG

Appendix C

Fuel Monitoring Protocol for Stationary Gas Turbines

Fuel Monitoring Protocol for Stationary Turbines Subject to 40 CFR Part 60, Subpart GG

1. Monitoring of fuel nitrogen content shall not be required while natural gas is the only fuel fired in the gas turbine.
2. Analysis for fuel sulfur content of the natural gas shall be conducted using one of the approved ASTM reference methods for the measurement of sulfur in gaseous fuels, or an approved alternative method. The approved reference methods are: ASTM D1072-80; ASTM D3031-81; ASTM D3246-81; and ASTM D4084-82 as referenced in 40 CFR 60.335(b)(2). The Gas Processors Association (GPA) test method entitled "Test for Hydrogen Sulfide and Carbon Dioxide in Natural Gas Using Length of Stain Tubes" (GPA Standard 2377-86) is an approved alternative method.
3. The fuel supply shall be initially sampled daily for a period of two weeks to establish that the pipeline quality natural gas fuel supply is low in sulfur content.
4. After the monitoring required in item 3 above, sulfur monitoring shall be conducted twice monthly for six months. If this monitoring shows little variability in the fuel sulfur content, and indicates consistent compliance with 40 CFR 60.333, then sulfur monitoring shall be conducted once per quarter for six quarters.
5. If after the monitoring required in item 4 above, or herein, the sulfur content of the fuel shows little variability and, calculated as sulfur dioxide, represents consistent compliance with the sulfur dioxide emission limits specified under 40 CFR 60.333, sample analysis shall be conducted twice per annum. This monitoring shall be conducted during the first and third quarters of each calendar year.
6. Should any sulfur analysis as required in items 4 or 5 above indicate noncompliance with 40 CFR 60.333, the owner or operator shall notify the ADEQ of such excess emissions and the custom schedule shall be re-examined. Sulfur monitoring shall be conducted weekly during the interim period when this custom schedule is being re-examined.
7. If there is a change in fuel supply (supplier), the fuel shall be sampled daily for a period of two weeks to re-establish for the record that the fuel supply is low in sulfur content. If the fuel supply's low sulfur content is re-established, then the custom fuel monitoring schedule can be resumed.
8. Stationary gas turbines that use the same supply of pipeline quality natural gas to fuel multiple gas turbines may monitor the fuel sulfur content at a single common location.
9. Records of sample analysis and fuel supply pertinent to this custom schedule shall be retained for a period of three years, and be available for inspection by personnel of federal, state, and local air pollution control agencies.

APPENDIX D

40 CFR, Part 75, *Continuous Emissions Monitoring*

INVOICE REQUEST FORM

PDS- _____

Date October 11, 2001

- | | |
|-------------------------------------|----------------------|
| <input checked="" type="checkbox"/> | Air |
| <input type="checkbox"/> | NPDES |
| <input type="checkbox"/> | Stormwater |
| <input type="checkbox"/> | State Permits Branch |
| <input type="checkbox"/> | Solid Waste |

CSN 29-0304

Facility Name Arkansas Electric Cooperative Corp. - CT1

Invoice Mailing Address PO Box 194208

Little Rock, Arkansas 72219-4208

- | | |
|-------------------------------------|--------------|
| <input type="checkbox"/> | Initial |
| <input checked="" type="checkbox"/> | Modification |
| <input type="checkbox"/> | Annual |

Permit Number 1860-AOP-R1

Permit Description Title 5

Permit Fee Code A

Amount Due \$ 500

Engineer Bryan Leamons

Paid? GNo GYes Check # _____

Comments: Air Permit Fee Calculation: Minor Mod = \$500

Public Notice

Pursuant to the Arkansas Operating Air Permit Program (Regulation #26) Section 6(b), the Air Division of the Arkansas Department of Environmental Quality gives the following notice:

Arkansas Electric Cooperative Corporation (AECC) is permitted to operate an electric power station in Hempstead County (CSN: 29-0304). The facility is located at Exit 18, Interstate 30, Fulton, AR 71838. The facility has applied for modification to their existing air permit. Upon final approval by the Department, the modification will permit an emergency diesel generator, its associated diesel storage tank, and a fuel heater for their primary operating unit.

The application has been reviewed by the staff of the Department and has received the Department's tentative approval subject to the terms of this notice.

Citizens wishing to examine the permit application and staff findings and recommendations may do so by contacting Suzanne Carswell, Information Officer. Citizens desiring technical information concerning the application or permit should contact Bryan Leamons, Engineer. Both Suzanne Carswell and Bryan Leamons can be reached at the Department's central office, 8001 National Drive, Little Rock, Arkansas 72209, telephone: (501) 682-0744.

The draft permit and permit application are available for copying at the above address. A copy of the draft permit has also been placed at the Hempstead County Public Library, Fifth & Elm Streets, Hope, Arkansas 71801. This information may be reviewed during normal business hours.

Interested or affected persons may also submit written comments or request a hearing on the proposal, or the proposed modification, to the Department at the above address - Attention: Suzanne Carswell. In order to be considered, the comments must be submitted within thirty (30) days of publication of this notice. Although the Department is not proposing to conduct a public hearing, one will be scheduled if significant comments on the permit provisions are received. If a hearing is scheduled, adequate public notice will be given in the newspaper of largest circulation in the county in which the facility in question is, or will be, located.

The Director shall make a final decision to issue or deny this application or to impose special conditions in accordance with Section 2.1 of the Arkansas Pollution Control and Ecology Commission's Administrative Procedures (Regulation #8) and Regulation #26.

Dated this

Randall Mathis
Director