

Alabama Department of Environmental Management adem.alabama.gov

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FEBRUARY 6, 2014

MR DAVID GORDON
PLANT MANAGER
CER GENERATION LLC
152 BRICK PLANT ROAD
ALEXANDER CITY AL 35010

RE:

DRAFT PERMIT MODIFICATION NPDES PERMIT NUMBER: AL0073784

Dear Mr. Gordon:

Transmitted herein is a draft of the referenced permit modification.

We would appreciate your comments on the permit within 30 days of the date of this letter. Please direct any comments of a technical or administrative nature to the undersigned.

By copy of this letter and the draft permit, we are also requesting comments within the same time frame from EPA.

The Alabama Department of Environmental Management encourages you to voluntarily consider pollution prevention practices and alternatives at your facility. Pollution Prevention may assist you in complying with effluent limitations, and possibly reduce or eliminate monitoring requirements.

Should you have any questions, please contact Brian Marshall by e-mail at bmarshall@adem.state.al.us or by phone at (334)271-7895.

Scott Ramsey, Chief Industrial Section

Industrial/Municipal Branch

Water Division

Enclosure:

Draft Permit

pc via website:

Montgomery Field Office

EPA Region IV

U.S. Fish & Wildlife Service AL Historical Commission

Advisory Council on Historic Preservation

Department of Conservation and Natural Resources

Mobile-Coastal





NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM PERMIT

PERMITTEE: CER GENERATION, LLC

FACILITY LOCATION: 152 BRICK PLANT ROAD

ALEXANDER CITY, AL 35010

PERMIT NUMBER: AL0073784

RECEIVING WATERS: DSN001 – DSN006: OAKTASASI CREEK

In accordance with and subject to the provisions of the Federal Water Pollution Control Act, as amended, 33 U.S.C. §§1251-1378 (the "FWPCA"), the Alabama Water Pollution Control Act, as amended, Code of Alabama 1975, §§ 22-22-1 to 22-22-14 (the "AWPCA"), the Alabama Environmental Management Act, as amended, Code of Alabama 1975, §§22-22A-1 to 22-22A-15, and rules and regulations adopted thereunder, and subject further to the terms and conditions set forth in this permit, the Permittee is hereby authorized to discharge into the above-named receiving waters.

ISSUANCE DATE: MAY 30, 2012

EFFECTIVE DATE: JUNE 1, 2012

EXPIRATION DATE: MAY 31, 2017

MODIFICATION ISSUED DATE: AUGUST 14, 2012

MODIFICATION EFFECTIVE DATE: AUGUST 14, 2012

MODIFICATION ISSUED DATE: SEPTEMBER 13, 2012

MODIFICATION EFFECTIVE DATE: OCTOBER 1, 2012

MODIFICATION ISSUED DATE:

MODIFICATION EFFECTIVE DATE:

INDUSTRIAL SECTION NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT

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PART I DISCHARGE LIMITATIONS, CONDITIONS, AND REQUIREMENTS

A. DISCHARGE LIMITATIONS AND MONITORING REQUIREMENTS

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN0011: Cooling tower blowdown, low volume waste streams, and demineralizer regeneration rinse water. 3/4/

Such discharge shall be limited and monitored by the permittee as specified below:

		LIMITATIONS				MONITORING F	REQUIREMENTS 1/	
EFFLUENT CHARACTERISTIC	Monthly Average	<u>Daily</u> Maximum	<u>Daily</u> Minimum	Monthly Average	<u>Daily</u> Maximum	Measurement Frequency 2/	Sample Type	Seasonal
Temperature, Water Deg. Fahrenheit	•	-	-	-	90 F	Daily	Continuous	-
рН	-	-	6.0 S.U.	-	9.0 S.U.	Daily	Continuous	-
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Daily	Totalizer	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ Polychlorinated Biphenyls (PCBs) shall not be discharged to receiving stream.
- 4/ The permittee is prohibited from discharging any chemical metal cleaning wastes or metal cleaning wastes. Chemical metal cleaning wastes are defined in 40 CFR 423.11(c).

NPDES PERMIT NUMBER AL0073784 PART 1 Page 2 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN001Q: Cooling tower blowdown and low volume waste streams. 4/5/

Such discharge shall be limited and monitored by the permittee as specified below:

C	DISCHARGE	LIMITATIONS	<u>S</u>			MONITORING I	REQUIREMENTS 1/	
	Monthly	<u>Daily</u>	Daily	Monthly	<u>Daily</u>	Measurement		
EFFLUENT CHARACTERISTIC	Average	<u>Maximum</u>	<u>Minimum</u>	<u>Average</u>	<u>Maximum</u>	Frequency 2/	Sample Type	<u>Seasonal</u>
Nitrogen, Ammonia Total (As N)	-	-	-	-	REPORT mg/l	Quarterly	Grab	-
Nitrite Plus Nitrate Total 1 Det. (As N)	-	-	-	-	REPORT mg/l	Quarterly	Grab	-
Phosphorus, Total (As P)	-	-	•	-	REPORT mg/l	Quarterly	Grab	-
Zinc Total Recoverable	-	-	-	-	REPORT mg/l	Quarterly	Grab	-
Chromium Total Recoverable	-	-	-	-	REPORT mg/l	Quarterly	Grab	-

- V Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ Monitoring requirements are not applicable unless maintenance chemicals containing chromium or zinc are added to the cooling tower or boilers. Annual certification shall be submitted by January 28th of each year stating the non-use of maintenance chemicals containing chromium or zinc.
- 4/ Polychlorinated Biphenyls (PCBs) shall not be discharged to receiving stream.
- 5/ The permittee is prohibited from discharging any chemical metal cleaning wastes or metal cleaning wastes. Chemical metal cleaning wastes are defined in 40 CFR 423.11(c).

NPDES PERMIT NUMBER AL0073784 PART I Page 3 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN001S: Cooling tower blowdown and low volume waste streams, 3/

Such discharge shall be limited and monitored by the permittee as specified below:

	DISCHARGE	<u>LIMITATIONS</u>				MONITORING	REQUIREMENTS 1/	
EFFLUENT CHARACTERISTIC	Monthly Average	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> <u>Minimum</u>	<u>Monthly</u> Average	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	<u>Seasonal</u>
Toxicity, Ceriodaphnia Chronic	-	0 pass(0)/fail(1)	-	-	-	Twice per Year	24-Hr Composite	-
Toxicity, Pimephales Chronic	-	0 pass(0)/fail(1)	-	•	-	Twice per Year	24-Hr Composite	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.C for Effluent Toxicity Limitations and Biomonitoring Requirements.

NPDES PERMIT NUMBER AL0073784 PART I Page 4 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN002Q: Storm water associated with industrial activities. 3/

Such discharge shall be limited and monitored by the permittee as specified below:

		LIMITATIONS	-				REQUIREMENTS 1/	
EFFLUENT CHARACTERISTIC	Monthly Average	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> Minimum	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	Seasonal
рН	-	-	-	-	REPORT S.U,	Quarterly	Grab	-
Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	-
Oil & Grease	-	-	-	•	15 mg/l	Quarterly	Grab	-
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-		-	Quarterly	Calculated 4/	-

- Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.A for Best Management Practices (BMP) Plan Requirements.
- 4/ See Part IV.B for Stormwater Measurement and Sampling Requirements.

NPDES PERMIT NUMBER AL0073784 PART I Page 5 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN002Y: Fire system test water. 3/4/

Such discharge shall be limited and monitored by the permittee as specified below:

J	DISCHARGE Monthly	LIMITATIONS Daily	<u>S</u> Daily	Monthly	Daily	MONITORING R Measurement	EQUIREMENTS 1/	
EFFLUENT CHARACTERISTIC	Average	<u>Maximum</u>	<u>Dany</u> <u>Minimum</u>	Average	<u>Maximum</u>	Frequency 2/	Sample Type	Seasonal
рН	-	-	REPORT S.U.	-	REPORT S.U.	Once/Discharge	Grab	-
Solids, Total Suspended	-	-	-	REPORT mg/l	REPORT mg/l	Once/Discharge	Grab	-
Oil & Grease	-	-	•	-	15.0 mg/l	Once/Discharge	Grab	-
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Once/Discharge	Calculated	-
Chlorine, Total Residual	•	-	-	0.24 mg/l	0.42 mg/l	Once/Discharge	Grab	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.A for Best Management Practices (BMP) Plan Requirements.
- 4/ This outfall should be sampled during a non-stormwater event.

NPDES PERMIT NUMBER AL0073784 PART I Page 6 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN003Q: Storm water associated with industrial activities. 3/

Such discharge shall be limited and monitored by the permittee as specified below:

Ų.		<u>LIMITATIONS</u>			MONITORING REQUIREMENTS 1/			
EFFLUENT CHARACTERISTIC	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> Minimum	Monthly Average	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	Seasonal
pН	-	-	-	-	REPORT S.U.	Quarterly	Grab	-
Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	•
Oil & Grease	-	-	-	-	15 mg/l	Quarterly	Grab	•
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Quarterly	Calculated 4/	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be eollected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.A for Best Management Practices (BMP) Plan Requirements.
- 4/ See Part IV.B for Stormwater Measurement and Sampling Requirements.

NPDES PERMIT NUMBER AL0073784 PART I Page 7 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN003Y: Fire system test water. 3/4/

Such discharge shall be limited and monitored by the permittee as specified below:

		LIMITATIONS	5		EQUIREMENTS 1/			
EFFLUENT CHARACTERISTIC	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> <u>Minimum</u>	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	Seasonal
рН	-	-	REPORT S.U.	-	REPORT S.U.	Once/Discharge	Grab	-
Solids, Total Suspended	-	-	-	REPORT mg/l	REPORT mg/l	Once/Discharge	Grab	-
Oil & Grease	-	-	-	-	15.0 mg/l	Once/Discharge	Grab	-
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Once/Discharge	Calculated	-
Chlorine, Total Residual	-	-	-	0.24 mg/l	0.42 mg/l	Once/Discharge	Grab	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.A for Best Management Practices (BMP) Plan Requirements.
- 4/ This outfall should be sampled during a non-stormwater event.

NPDES PERMIT NUMBER AL0073784 PART I Page 8 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN004Q: Storm water associated with industrial activities. 3/4/

Such discharge shall be limited and monitored by the permittee as specified below:

		<u>LIMITATIONS</u>	MONITORING REQUIREMENTS 1/					
EFFLUENT CHARACTERISTIC	Monthly Average	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> <u>Minimum</u>	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	Seasonal
рН	-	-	•	-	REPORT S.U.	Quarterly	Grab	-
Solids. Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	-
Oil & Grease	-	-	-	-	15 mg/l	Quarterly	Grab	-
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Quarterly	Calculated	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.A for Best Management Practices (BMP) Plan Requirements.
- 4/ See Part IV.B for Stormwater Measurement and Sampling Requirements.

NPDES PERMIT NUMBER AL0073784 PART I Page 9 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN004Y: Fire system test water. 3/4/

Such discharge shall be limited and monitored by the permittee as specified below:

		<u>LIMITATIONS</u>	_	N.C. (1) 1	D. 11		REQUIREMENTS 1/	
EFFLUENT CHARACTERISTIC	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> <u>Minimum</u>	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	<u>Seasonal</u>
рН	-	-	REPORT S.U.	-	REPORT S.U.	Once/Discharge	Grab	-
Solids, Total Suspended	-	-	-	REPORT mg/l	REPORT mg/l	Once/Discharge	Grab	-
Oil & Grease	-	-	-	-	15.0 mg/l	Once/Discharge	Grab	•
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Once/Discharge	Calculated	-
Chlorine, Total Residual	-	-	-	0.24 mg/l	0.42 mg/l	Once/Discharge	Grab	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.A for Best Management Practices (BMP) Plan Requirements.
- 4/ This outfall should be sampled during a non-stormwater event.

NPDES PERMIT NUMBER AL0073784 PART I Page 10 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN005Q: Storm water associated with industrial activities. 3/4/

Such discharge shall be limited and monitored by the permittee as specified below:

_	DISCHARGE		MONITORING REQUIREMENTS 1/					
EFFLUENT CHARACTERISTIC	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> <u>Minimum</u>	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	Seasonal
pH	-	-	-	-	REPORT S.U.	Quarterly	Grab	-
Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	-
Oil & Grease	•	-	-	-	15 mg/l	Quarterly	Grab	-
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Quarterly	Calculated	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.A for Best Management Practices (BMP) Plan Requirements.
- 4/ See Part IV.B for Stormwater Measurement and Sampling Requirements.

NPDES PERMIT NUMBER AL0073784 PART I Page 11 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN006Q: Storm water associated with industrial activities. 3/4/

Such discharge shall be limited and monitored by the permittee as specified below:

Ü		<u>LIMITATIONS</u>			REQUIREMENTS 1/			
EFFLUENT CHARACTERISTIC	Monthly Average	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> <u>Minimum</u>	Monthly Average	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	Seasonal
Нq	-	-	-	-	REPORT S.U.	Quarterly	Grab	-
Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	-
Oil & Grease	-	-	-	-	15 mg/l	Quarterly	Grab	-
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Quarterly	Calculated	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of cight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.
- 3/ See Part IV.A for Best Management Practices (BMP) Plan Requirements.
- 4/ See Part IV.B for Stormwater Measurement and Sampling Requirements.

NPDES PERMIT NUMBER AL0073784 PART I Page 12 of 36

During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN01A1: Cooling tower blowdown.

Such discharge shall be limited and monitored by the permittee as specified below:

	<u>DISCHARGE LIMITATIONS</u>					MONITORING REQUIREMENTS 1/		
EFFLUENT CHARACTERISTIC	Monthly Average	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> Minimum	<u>Monthly</u> <u>Average</u>	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	Seasonal
pН	-	-	6.0 S.U.	-	9.0 S.U.	Daily	Continuous	-
Chromium, Total (As Cr)	-	-	-	0.2 mg/l	0.2 mg/l	Monthly	Grab	-
Zinc. Total (As Zn)	-	-	-	1.0 mg/l	1.0 mg/l	Monthly	Grab	-
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Monthly	Totalizer	-
Chlorine, Total Residual	-	-	-	REPORT mg/l	REPORT mg/l	Monthly	Grab	-
Chlorine, Free Available	-	-	-	0.2 mg/l	0.5 mg/l	Monthly	Grab	-
Chlorination Duration	-	-	-	-	120 min/day	Daily	Pump Log	

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.

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During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN01AY: Cooling tower blowdown.

Such discharge shall be limited and monitored by the permittee as specified below:

	<u>DISCHARGE LIMITATIONS</u>				MONITORING REQUIREMENTS 1/				
	<u>Monthly</u>	<u>Daily</u>	Daily	<u>Monthly</u>	<u>Daily</u>	Measurement		_	
EFFLUENT CHARACTERISTIC	<u>Average</u>	<u>Maximum</u>	<u>Minimum</u>	<u>Average</u>	<u>Maximum</u>	Frequency 2/	Sample Type	<u>Seasonal</u>	
Priority Pollutants Total Effluent	-	-	-	0 mg/l	0 mg/l	Annually	Grab	-	

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.

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During the period beginning on the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge from the following point source(s) outfall(s), described more fully in the permittee's application:

DSN01B1: Discharges from low volume waste streams.

Such discharge shall be limited and monitored by the permittee as specified below:

DISCHARGE LIMITATIONS					MONITORING REQUIREMENTS 1/			
EFFLUENT CHARACTERISTIC	Monthly Average	<u>Daily</u> <u>Maximum</u>	<u>Daily</u> Minimum	Monthly Average	<u>Daily</u> <u>Maximum</u>	Measurement Frequency 2/	Sample Type	Seasonal
Solids, Total Suspended	-	-	-	30 mg/l	100 mg/l	Monthly	Grab	-
Oil & Grease	-	-	-	10 mg/l	15 mg/i	Monthly	Grab	-
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Monthly	Totalizer	-

- 1/ Samples collected to comply with the monitoring requirements specified above shall be collected at the following location: At the nearest accessible location just prior to discharge and after final treatment. Unless otherwise specified, composite samples shall be time composite samples collected using automatic sampling equipment or a minimum of eight (8) equal volume grab samples collected over equal time intervals. All composite samples shall be collected for the total period of discharge not to exceed 24 hours.
- 2/ If only one sampling event occurs during a month, the sample result shall be reported on the discharge monitoring report as both the monthly average and daily maximum value for all parameters with a monthly average limitation.

B. DISCHARGE MONITORING AND RECORD KEEPING REQUIREMENTS

1. Representative Sampling

Samples and measurements taken as required herein shall be representative of the volume and nature of the monitored discharge and shall be in accordance with the provisions of this permit.

2. Test Procedures

For the purpose of reporting and compliance, permittees shall use one of the following procedures:

- a. For parameters with an EPA established Minimum Level (ML), report the measured value if the analytical result is at or above the ML and report "0" for values below the ML. Test procedures for the analysis of pollutants shall conform to 40 CFR Part 136 and guidelines published pursuant to Section 304(h) of the FWPCA, 33 U.S.C. Section 1314(h). If more than one method for analysis of a substance is approved for use, a method having a minimum level lower than the permit limit shall be used. If the minimum level of all methods is higher than the permit limit, the method having the lowest minimum level shall be used and a report of less than the minimum level shall be reported as zero and will constitute compliance; however, should EPA approve a method with a lower minimum level during the term of this permit the permittee shall use the newly approved method.
- b. For pollutants parameters without an established ML, an interim ML may be utilized. The interim ML shall be calculated as 3.18 times the Method Detection Level (MDL) calculated pursuant to 40 CFR Part 136, Appendix B.

Permittees may develop an effluent matrix-specific ML, where an effluent matrix prevents attainment of the established ML. However, a matrix specific ML shall be based upon proper laboratory method and technique. Matrix-specific MLs must be approved by the Department, and may be developed by the permittee during permit issuance, reissuance, modification, or during compliance schedule.

In either case the measured value should be reported if the analytical result is at or above the ML and "0" reported for values below the ML.

c. For parameters without an EPA established ML, interim ML, or matrix-specific ML, a report of less than the detection limit shall constitute compliance if the detection limit of all analytical methods is higher than the permit limit using the most sensitive EPA approved method. For the purpose of calculating a monthly average, "0" shall be used for values reported less than the detection limit.

The Minimum Level utilized for procedures A and B above shall be reported on the permittee's DMR. When an EPA approved test procedure for analysis of a pollutant does not exist, the Director shall approve the procedure to be used.

3. Recording of Results

For each measurement or sample taken pursuant to the requirements of this permit, the permittee shall record the following information:

- a. The facility name and location, point source number, date, time and exact place of sampling:
- b. The name(s) of person(s) who obtained the samples or measurements:
- c. The dates and times the analyses were performed;
- d. The name(s) of the person(s) who performed the analyses;
- c. The analytical techniques or methods used, including source of method and method number; and
- f. The results of all required analyses.

4. Records Retention and Production

The permittee shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by the permit, and records of all data used to complete the above reports or the application for this permit, for a period of at least three years from the date of the sample measurement, report or application. This period may be extended by request of the Director at any time. If litigation or other enforcement action, under the AWPCA and/or the FWPCA, is ongoing which involves any of the above records, the records shall be kept until the litigation is resolved. Upon the written request of the Director or his designee, the permittee shall provide the Director with a copy of any record required to be retained by this paragraph. Copies of these records shall not be submitted unless requested.

All records required to be kept for a period of three years shall be kept at the permitted facility or an alternate location approved by the Department in writing and shall be available for inspection.

5. Monitoring Equipment and Instrumentation

All equipment and instrumentation used to determine compliance with the requirements of this permit shall be installed, maintained, and calibrated in accordance with the manufacturer's instructions or, in the absence of manufacturer's instructions, in accordance with accepted practices. The permittee shall develop and maintain quality assurance procedures to ensure proper operation and maintenance of all equipment and instrumentation. The quality assurance procedures shall include the proper use, maintenance, and installation, when appropriate, of monitoring equipment at the plant site.

C. DISCHARGE REPORTING REQUIREMENTS

- 1. Reporting of Monitoring Requirements
 - a. The permittee shall conduct the required monitoring in accordance with the following schedule:

MONITORING REQUIRED MORE FREQUENTLY THAN MONTHLY AND MONTHLY shall be conducted during the first full month following the effective date of coverage under this permit and every month thereafter.

QUARTERLY MONITORING shall be conducted at least once during each calendar quarter. Calendar quarters are the periods of January through March, April through June, July through September, and October through December. The permittee shall conduct the quarterly monitoring during the first complete calendar quarter following the effective date of this permit and is then required to monitor once during each quarter thereafter. Quarterly monitoring may be done anytime during the quarter, unless restricted elsewhere in this permit, but it should be submitted with the last DMR due for the quarter, i.e. (March, June, September and December DMRs).

SEMIANNUAL MONITORING shall be conducted at least once during the period of January through June and at least once during the period of July through December. The permittee shall conduct the semiannual monitoring during the first complete calendar semiannual period following the effective date of this permit and is then required to monitor once during each semiannual period thereafter. Semiannual monitoring may be done anytime during the semiannual period, unless restricted elsewhere in this permit, but it should be submitted with the last DMR due for the month of the semiannual period, i.e. (June and December DMRs).

ANNUAL MONITORING shall be conducted at least once during the period of January through December. The permittee shall conduct the annual monitoring during the first complete calendar annual period following the effective date of this permit and is then required to monitor once during each annual period thereafter. Annual monitoring may be done anytime during the year, unless restricted elsewhere in this permit, but it should be submitted with the December DMR.

b. The permittee shall submit discharge monitoring reports (DMRs) on the forms provided by the Department and in accordance with the following schedule:

REPORTS OF MORE FREQUENTLY THAN MONTHLY AND MONTHLY TESTING shall be submitted on a **monthly** basis. The first report is due on the **28th** day of []. The reports shall be submitted so that they are received by the Department no later than the 28th day of the month following the reporting period.

REPORTS OF QUARTERLY TESTING shall be submitted on a quarterly basis. The first report is due on the 28th day of []. The reports shall be submitted so that they are received by the Department no later than the 28th day of the month following the reporting period.

REPORTS OF SEMIANNUAL TESTING shall be submitted on a semiannual basis. The reports are due on the 28th day of JANUARY and the 28th day of JULY. The reports shall be submitted so that they are received by the Department no later than the 28th day of the month following the reporting period.

REPORTS OF ANNUAL TESTING shall be submitted on an annual basis. The first report is due on the 28th day of JANUARY. The reports shall be submitted so that they are received by the Department no later than the 28th day of the month following the reporting period.

c. The Department is utilizing a web-based electronic environmental (E2) reporting system for submittal of DMRs. The E2 DMR system allows ADEM to electronically validate, acknowledge receipt, and upload data to the state's central wastewater database. This improves the accuracy of reported compliance data and reduces costs to both the regulated community and ADEM. If the permittee is not already participating in the e-DMR system, within 180 days of coverage under this permit, permittee must apply for participation in the e-DMR system unless the facility submits in writing valid justification as to why they cannot participate and the Department approves in writing utilization of hard copy DMR submittals. To participate in this program, the Permittee Participation Package may be downloaded online at https://e2.adem.alabama.gov/npdes. If the electronic environmental (E2) reporting system is down (i.e. electronic submittal of DMR data is unable to be completed due to technical problems originating with the

Department's system: this could include entry/submittal issues with an entire set of DMRs or individual parameters). permittee is not relieved of their obligation to submit DMR data to the Department by the required submittal date. However, if the E2 system is down on the 28th day of the month or is down for an extended period of time as determined by the Department when a DMR is required to be submitted, the facility may submit the data in an alternate manner and format acceptable to the Department. Preapproved alternate acceptable methods include faxing, e-mailing, mailing, or hand-delivery of data such that they are received by the required reporting date. Within five calendar days of the E2 system resuming operation, the permittee shall enter the data into the E2 reporting system, unless an alternate timeframe is approved by the Department. An attachment should be included with the E2 DMR submittal verifying the original submittal date (date of the fax, copy of dated e-mail, or hand-delivery stamped date). If a permittee is allowed to submit via the US Postal Service, the DMR must be legible and bear an original signature. Photo and electronic copies of the signature are not acceptable and shall not satisfy the reporting requirements of this permit. If the permittee, using approved analytical methods as specified in Provision I.B.2 monitors any discharge from a point source for a limited substance identified in Provision I.A of this permit more frequently than required by this permit, the results of such monitoring shall be included in the calculation and reporting of values on the DMR form and the increased frequency shall be indicated on the DMR form. In the event no discharge from a point source identified in Provision I.A of this permit and described more fully in the permittee's application occurs during a monitoring period, the permittee shall report "No Discharge" for such period on the appropriate DMR form.

d. All reports and forms required to be submitted by this permit, the AWPCA and the Department's Rules and Regulations, shall be electronically signed (or, if allowed by the Department, traditionally signed) by a "responsible official" of the permittee as defined in ADEM Administrative Code Rule 335-6-6-.09 or a "duly authorized representative" of such official as defined in ADEM Administrative Code Rule 335-6-6-.09 and shall bear the following certification:

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

- e. The permittee may certify in writing that a discharge will not occur for an extended period of time and after such certification shall not be required to submit monitoring reports. Written notification of a planned resumption of discharge shall be submitted at least 30 days prior to resumption of the discharge. If an unplanned resumption of discharge occurs, written notification shall be submitted within 7 days of the resumption. In any case, all discharges shall comply with all provisions of this permit.
- f. All Discharge Monitoring Report forms required to be submitted by this permit, the AWPCA, and the Department's Rules shall be addressed to:

Alabama Department of Environmental Management
Permits and Services Division
Environmental Data Section
Post Office Box 301463
Montgomery, Alabama 36130-1463

Certified and Registered Mail containing Discharge Monitoring Reports shall be addressed to:

Alabama Department of Environmental Management
Permits and Services Division
Environmental Data Section
1400 Coliseum Boulevard
Montgomery, Alabama 36110-2059

g. All other correspondence and reports required to be submitted by this permit, the AWPCA, and the Department's Rules shall be addressed to:

> Alabama Department of Environmental Management Water Division Post Office Box 301463 Montgomery, Alabama 36130-1463

Alabama Department of Environmental Management Water Division 1400 Coliseum Boulevard Montgomery, Alabama 36110-2059

h. If this permit is a reissuance, then the permittee shall continue to submit DMRs in accordance with the requirements of their previous permit until such time as DMRs are due as discussed in Part I.C.1.b. above.

2. Noncompliance Notification

a. 24-Hour Noncompliance Reporting

The permittee shall report to the Director, within 24-hours of becoming aware of the noncompliance, any noncompliance which may endanger health or the environment. This shall include but is not limited to the following circumstances:

- (1) does not comply with any daily minimum or maximum discharge limitation for an effluent characteristic specified in Provision I. A. of this permit which is denoted by an "(X)":
- (2) threatens human health or welfare, fish or aquatic life, or water quality standards;
- does not comply with an applicable toxic pollutant effluent standard or prohibition established under Section 307(a) of the FWPCA, 33 U.S.C. Section 1317(a);
- (4) contains a quantity of a hazardous substance which has been determined may be harmful to public health or welfare under Section 311(b)(4) of the FWPCA, 33 U.S.C. Section 1321(b)(4);
- (5) exceeds any discharge limitation for an effluent characteristic as a result of an unanticipated bypass or upset; and
- is an unpermitted direct or indirect discharge of a pollutant to a water of the state (unpermitted discharges properly reported to the Department under any other requirement are not required to be reported under this provision).

The permittee shall orally report the occurrence and circumstances of such discharge to the Director within 24-hours after the permittee becomes aware of the occurrence of such discharge. In addition to the oral report, the permittee shall submit to the Director or Designee a written report as provided in Part I.C.2.c no later than five (5) days after becoming aware of the occurrence of such discharge.

- b. If for any reason, the permittee's discharge does not comply with any limitation of this permit, the permittee shall submit to the Director or Designee a written report as provided in Part I.C.2.c below, such report shall be submitted with the next Discharge Monitoring Report required to be submitted by Part I.C.1 of this permit after becoming aware of the occurrence of such noncompliance.
- c. Any written report required to be submitted to the Director or Designee by Part I.C.2 a. or b. shall be submitted using a copy of the Noncompliance Notification Form provided with this permit and shall include the following information:
 - (1) A description of the discharge and cause of noncompliance:
 - (2) The period of noncompliance, including exact dates and times or, if not corrected, the anticipated time the noncompliance is expected to continue; and
 - A description of the steps taken and/or being taken to reduce or eliminate the noncomplying discharge and to prevent its recurrence.

D. OTHER REPORTING AND NOTIFICATION REQUIREMENTS

1. Anticipated Noncompliance

The permittee shall give the Director written advance notice of any planned changes or other circumstances regarding a facility which may result in noncompliance with permit requirements.

2. Termination of Discharge

The permittee shall notify the Director, in writing, when all discharges from any point source(s) identified in Provision I. A. of this permit have permanently ceased. This notification shall serve as sufficient cause for instituting procedures for modification or termination of the permit.

3. Updating Information

- a. The permittee shall inform the Director of any change in the permittee's mailing address, telephone number or in the permittee's designation of a facility contact or office having the authority and responsibility to prevent and abate violations of the AWPCA, the Department's Rules, and the terms and conditions of this permit, in writing, no later than ten (10) days after such change. Upon request of the Director or his designee, the permittee shall furnish the Director with an update of any information provided in the permit application.
- b. If the permittee becomes aware that it failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or in any report to the Director, it shall promptly submit such facts or information with a written explanation for the mistake and/or omission.

4. Duty to Provide Information

The permittee shall furnish to the Director, within a reasonable time, any information which the Director or his designee may request to determine whether cause exists for modifying, revoking and re-issuing, suspending, or terminating this permit, in whole or in part, or to determine compliance with this permit.

5. Cooling Water and Boiler Water Additives

- a. The permittee shall notify the Director in writing not later than thirty (30) days prior to instituting the use of any biocide corrosion inhibitor or chemical additive in a cooling or boiler system, not identified in the application for this permit, from which discharge is allowed by this permit. Notification is not required for additives that do not contain a heavy metal(s) as an active ingredient and that pass through a wastewater treatment system prior to discharge nor is notification required for additives that should not reasonably be expected to cause the cooling water or boiler water to exhibit toxicity as determined by analysis of manufacturer's data or testing by the permittee. Such notification shall include:
 - (1) name and general composition of biocide or chemical;
 - (2) 96-hour median tolerance limit data for organisms representative of the biota of the waterway into which the discharge will ultimately reach;
 - (2) quantities to be used:
 - (3) frequencies of use;
 - (4) proposed discharge concentrations; and
 - (6) EPA registration number, if applicable.
- b. The use of a biocide or additive containing tributyl tin, tributyl tin oxide, zinc, chromium or related compounds in cooling or boiler system(s), from which a discharge regulated by this permit occurs, is prohibited except as exempted below. The use of a biocide or additive containing zinc, chromium or related compounds may be used in special circumstances if (1) the permit contains limits for these substances, or (2) the applicant demonstrates during the application process that the use of zinc, chromium or related compounds as a biocide or additive will not pose a reasonable potential to violate the applicable State water quality standards for these substances. The use of any additive, not identified in this permit or in the application for this permit or not exempted from notification under this permit is prohibited, prior to a determination by the Department that permit modification to control discharge of the additive is not required or prior to issuance of a permit modification controlling discharge of the additive.

Permit Issued Based On Estimated Characteristics

- a. If this permit was issued based on estimates of the characteristics of a process discharge reported on an EPA NPDES Application Form 2D (EPA Form 3510-2D), the permittee shall complete and submit an EPA NPDES Application Form 2C (EPA Form 3510-2C) no later than two years after the date that discharge begins. Sampling required for completion of the Form 2C shall occur when a discharge(s) from the process(s) causing the new or increased discharge is occurring. If this permit was issued based on estimates concerning the composition of a stormwater discharge(s), the permittee shall perform the sampling required by EPA NPDES Application Form 2F (EPA Form 3510-2F) no later than one year after the industrial activity generating the stormwater discharge has been fully initiated.
- b. This permit shall be reopened if required to address any new information resulting from the completion and submittal of the Form 2C and or 2F.

E. SCHEDULE OF COMPLIANCE

1. The permittee shall achieve compliance with the discharge limitations specified in Provision I. A. in accordance with the following schedule:

COMPLIANCE SHALL BE ATTAINED ON THE EFFECTIVE DATE OF THIS PERMIT

2. No later than 14 calendar days following a date identified in the above schedule of compliance, the permittee shall submit either a report of progress or, in the case of specific actions being required by identified dates, a written notice of compliance or noncompliance. In the latter case, the notice shall include the cause of noncompliance, any remedial actions taken, and the probability of meeting the next scheduled requirement.

PART II OTHER REQUIREMENTS, RESPONSIBILITIES, AND DUTIES

A. OPERATIONAL AND MANAGEMENT REQUIREMENTS

Facilities Operation and Maintenance

The permittee shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the permittee to achieve compliance with the conditions of the permit. Proper operation and maintenance includes effective performance, adequate funding, adequate operator staffing and training, and adequate laboratory and process controls, including appropriate quality assurance procedures. This provision requires the operation of backup or auxiliary facilities only when necessary to achieve compliance with the conditions of the permit.

2. Best Management Practices

- Dilution water shall not be added to achieve compliance with discharge limitations except when the Director or his
 designee has granted prior written authorization for dilution to meet water quality requirements.
- b. The permittee shall prepare, implement, and maintain a Spill Prevention. Control and Countermeasures (SPCC) Plan in accordance with 40 C.F.R. Section 112 if required thereby.
- c. The permittee shall prepare, submit for approval and implement a Best Management Practices (BMP) Plan for containment of any or all process liquids or solids, in a manner such that these materials do not present a significant potential for discharge, if so required by the Director or his designee. When submitted and approved, the BMP Plan shall become a part of this permit and all requirements of the BMP Plan shall become requirements of this permit.

3. Spill Prevention, Control, and Management

The permittee shall provide spill prevention, control, and/or management sufficient to prevent any spills of pollutants from entering a water of the state or a publicly or privately owned treatment works. Any containment system used to implement this requirement shall be constructed of materials compatible with the substance(s) contained and which shall prevent the contamination of groundwater and such containment system shall be capable of retaining a volume equal to 110 percent of the capacity of the largest tank for which containment is provided.

B. OTHER RESPONSIBILITIES

1. Duty to Mitigate Adverse Impacts

The permittee shall promptly take all reasonable steps to mitigate and minimize or prevent any adverse impact on human health or the environment resulting from noncompliance with any discharge limitation specified in Provision I. A. of this permit, including such accelerated or additional monitoring of the discharge and/or the receiving waterbody as necessary to determine the nature and impact of the noncomplying discharge.

2. Right of Entry and Inspection

The permittee shall allow the Director, or an authorized representative, upon the presentation of proper credentials and other documents as may be required by law to:

- a. enter upon the permittee's premises where a regulated facility or activity or point source is located or conducted, or where records must be kept under the conditions of the permit:
- b. have access to and copy, at reasonable times, any records that must be kept under the conditions of the permit;
- inspect any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under the permit; and
- d. sample or monitor, for the purposes of assuring permit compliance or as otherwise authorized by the AWPCA, any substances or parameters at any location.

C. BYPASS AND UPSET

1. Bypass

a. Any bypass is prohibited except as provided in b. and c. below:

- b. A bypass is not prohibited if:
 - (1) It does not cause any discharge limitation specified in Provision I. A. of this permit to be exceeded;
 - (2) It enters the same receiving stream as the permitted outfall; and
 - (3) It is necessary for essential maintenance of a treatment or control facility or system to assure efficient operation of such facility or system.
- c. A bypass is not prohibited and need not meet the discharge limitations specified in Provision I. A. of this permit if:
 - (1) It is unavoidable to prevent loss of life, personal injury, or severe property damage;
 - (2) There are no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime (this condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to prevent a bypass which occurred during normal periods of equipment downtime or preventive maintenance); and
 - (3) The permittee submits a written request for authorization to bypass to the Director at least ten (10) days prior to the anticipated bypass (if possible), the permittee is granted such authorization, and the permittee complies with any conditions imposed by the Director to minimize any adverse impact on human health or the environment resulting from the bypass.
- d. The permittee has the burden of establishing that each of the conditions of Provision II.C.1.b or c. have been met to qualify for an exception to the general prohibition against bypassing contained in a. and an exemption, where applicable, from the discharge limitations specified in Provision I. A. of this permit.

2. Upset

- a. A discharge which results from an upset need not meet the discharge limitations specified in Provision I. A. of this permit if:
 - (1) No later than 24-hours after becoming aware of the occurrence of the upset, the permittee orally reports the occurrence and circumstances of the upset to the Director or his designce; and
 - No later than five (5) days after becoming aware of the occurrence of the upset, the permittee furnishes the Director with evidence, including properly signed, contemporaneous operating logs, or other relevant evidence, demonstrating that (i) an upset occurred; (ii) the permittee can identify the specific cause(s) of the upset; (iii) the permittee's facility was being properly operated at the time of the upset; and (iv) the permittee promptly took all reasonable steps to minimize any adverse impact on human health or the environment resulting from the upset.
- b. The permittee has the burden of establishing that each of the conditions of Provision II. C.2.a. of this permit have been met to qualify for an exemption from the discharge limitations specified in Provision I.A. of this permit.

D. DUTY TO COMPLY WITH PERMIT, RULES, AND STATUTES

- 1. Duty to Comply
 - a. The permittee must comply with all conditions of this permit. Any permit noncompliance constitutes a violation of the AWPCA and the FWPCA and is grounds for enforcement action, for permit termination, revocation and reissuance, suspension, modification; or denial of a permit renewal application.
 - b. The necessity to halt or reduce production or other activities in order to maintain compliance with the conditions of the permit shall not be a defense for a permittee in an enforcement action.
 - c. The discharge of a pollutant from a source not specifically identified in the permit application for this permit and not specifically included in the description of an outfall in this permit is not authorized and shall constitute noncompliance with this permit.
 - d. The permittee shall take all reasonable steps, including cessation of production or other activities, to minimize or prevent any violation of this permit or to minimize or prevent any adverse impact of any permit violation.
 - e. Nothing in this permit shall be construed to preclude and negate the permittee's responsibility or liability to apply for obtain, or comply with other ADEM, Federal. State, or Local Government permits, certifications, licenses, or other approvals.

2. Removed Substances

Solids, sludges, filter backwash, or any other pollutant or other waste removed in the course of treatment or control of wastewaters shall be disposed of in a manner that complies with all applicable Department Rules.

3. Loss or Failure of Treatment Facilities

Upon the loss or failure of any treatment facilities, including but not limited to the loss or failure of the primary source of power of the treatment facility, the permittee shall, where necessary to maintain compliance with the discharge limitations specified in Provision I. A. of this permit, or any other terms or conditions of this permit, cease, reduce, or otherwise control production and/or all discharges until treatment is restored. If control of discharge during loss or failure of the primary source of power is to be accomplished by means of alternate power sources, standby generators, or retention of inadequately treated effluent, the permittee must furnish to the Director within six months a certification that such control mechanisms have been installed.

4. Compliance with Statutes and Rules

- a. This permit has been issued under ADEM Administrative Code, Chapter 335-6-6. All provisions of this chapter, that are applicable to this permit, are hereby made a part of this permit. A copy of this chapter may be obtained for a small charge from the Office of General Counsel, Alabama Department of Environmental Management, 1400 Coliseum Blvd., Montgomery, AL 36130.
- b. This permit does not authorize the noncompliance with or violation of any Laws of the State of Alabama or the United States of America or any regulations or rules implementing such laws. FWPCA. 33 U.S.C. Section 1319, and Code of Alabama 1975, Section 22-22-14.

PERMIT TRANSFER, MODIFICATION, SUSPENSION, REVOCATION, AND REISSUANCE

- 1. Duty to Reapply or Notify of Intent to Cease Discharge
 - a. If the permittee intends to continue to discharge beyond the expiration date of this permit, the permittee shall file a complete permit application for reissuance of this permit at least 180 days prior to its expiration. If the permittee does not intend to continue discharge beyond the expiration of this permit, the permittee shall submit written notification of this intent which shall be signed by an individual meeting the signatory requirements for a permit application as set forth in ADEM Administrative Code Rule 335-6-6-.09.
 - b. Failure of the permittee to apply for reissuance at least 180 days prior to permit expiration will void the automatic continuation of the expiring permit provided by ADEM Administrative Code Rule 335-6-6-.06 and should the permit not be reissued for any reason any discharge after expiration of this permit will be an unpermitted discharge.

2. Change in Discharge

- The permittee shall apply for a permit modification at least 180 days in advance of any facility expansion, production increase, process change, or other action that could result in the discharge of additional pollutants or increase the quantity of a discharged pollutant such that existing permit limitations would be exceeded or that could result in an additional discharge point. This requirement applies to pollutants that are or that are not subject to discharge limitations in this permit. No new or increased discharge may begin until the Director has authorized it by issuance of a permit modification or a reissued permit.
- b. The permittee shall notify the Director as soon as it is known or there is reason to believe:
 - (1) That any activity has occurred or will occur which would result in the discharge on a routine or frequent basis, of any toxic pollutant which is not limited in this permit, if that discharge will exceed the highest of the following notification levels:
 - (a) one hundred micrograms per liter;
 - (b) two hundred micrograms per liter for acrolein and acrylonitrile; five hundred micrograms per liter for 2,4-dinitrophenol and for 2-methyl-4.6-dini-trophenol; and one milligram per liter for antimony:
 - (c) five times the maximum concentration value reported for that pollutant in the permit application; or
 - (2) That any activity has occurred or will occur which would result in any discharge, on a non-routine or infrequent basis, of a toxic pollutant which is not limited in the permit, if that discharge will exceed the highest of the following notification levels:
 - (a) five hundred micrograms per liter;
 - (b) one milligram per liter for antimony;

(c) ten times the maximum concentration value reported for that pollutant in the permit application.

Transfer of Permit

This permit may not be transferred or the name of the permittee changed without notice to the Director and subsequent modification or revocation and reissuance of the permit to identify the new permittee and to incorporate any other changes as may be required under the FWPCA or AWPCA. In the case of a change in name, ownership or control of the permittee's premises only, a request for permit modification in a format acceptable to the Director is required at least 30 days prior to the change. In the case of a change in name, ownership or control of the permittee's premises accompanied by a change or proposed change in effluent characteristics, a complete permit application is required to be submitted to the Director at least 180 days prior to the change. Whenever the Director is notified of a change in name, ownership or control, he may decide not to modify the existing permit and require the submission of a new permit application.

4. Permit Modification and Revocation

- a. This permit may be modified or revoked and reissued, in whole or in part, during its term for cause, including but not limited to, the following:
 - (1) If cause for termination under Provision II. E. 5. of this permit exists, the Director may choose to revoke and reissue this permit instead of terminating the permit:
 - (2) If a request to transfer this permit has been received, the Director may decide to revoke and reissue or to modify the permit: or
 - (3) If modification or revocation and reissuance is requested by the permittee and cause exists, the Director may grant the request.
- b. This permit may be modified during its term for cause, including but not limited to, the following:
 - (1) If cause for termination under Provision II. E. 5. of this permit exists, the Director may choose to modify this permit instead of terminating this permit;
 - (2) There are material and substantial alterations or additions to the facility or activity generating wastewater which occurred after permit issuance which justify the application of permit conditions that are different or absent in the existing permit:
 - (3) The Director has received new information that was not available at the time of permit issuance and that would have justified the application of different permit conditions at the time of issuance;
 - (4) A new or revised requirement(s) of any applicable standard or limitation is promulgated under Sections 301(b)(2)(C). (D). (E), and (F), and 307(a)(2) of the FWPCA;
 - (5) Errors in calculation of discharge limitations or typographical or clerical errors were made:
 - (6) To the extent allowed by ADEM Administrative Code, Rule 335-6-6-17, when the standards or regulations on which the permit was based have been changed by promulgation of amended standards or regulations or by judicial decision after the permit was issued;
 - (7) To the extent allowed by ADEM Administrative Code. Rule 335-6-6-.17, permits may be modified to change compliance schedules;
 - (8) To agree with a granted variance under 30l(c), 30l(g), 30l(h), 30l(k), or 3l6(a) of the FWPCA or for fundamentally different factors:
 - (9) To incorporate an applicable 307(a) FWPCA toxic effluent standard or prohibition;
 - (10) When required by the reopener conditions in this permit;
 - (11) When required under 40 CFR 403.8(e) (compliance schedule for development of pretreatment program);
 - (12) Upon failure of the state to notify, as required by Section 402(b)(3) of the FWPCA, another state whose waters may be affected by a discharge permitted by this permit;
 - When required to correct technical mistakes, such as errors in calculation, or mistaken interpretations of law made in determining permit conditions; or

(14) When requested by the permittee and the Director determines that the modification has cause and will not result in a violation of federal or state law, regulations or rules.

5. Permit Termination

This permit may be terminated during its term for cause, including but not limited to, the following:

- a. Violation of any term or condition of this permit:
- b. The permittee's misrepresentation or failure to disclose fully all relevant facts in the permit application or during the permit issuance process or the permittee's misrepresentation of any relevant facts at any time;
- c. Materially false or inaccurate statements or information in the permit application or the permit;
- A change in any condition that requires either a temporary or permanent reduction or elimination of the permitted discharge;
- c. The permittee's discharge threatens human life or welfare or the maintenance of water quality standards;
- f. Permanent closure of the facility generating the wastewater permitted to be discharged by this permit or permanent cessation of wastewater discharge;
- g. New or revised requirements of any applicable standard or limitation that is promulgated under Sections 301(b)(2)(C).
 (D), (E), and (F), and 307(a)(2) of the FWPCA that the Director determines cannot be complied with by the permittee; or
- h. Any other cause allowed by the ADEM Administrative Code, Chapter 335-6-6.

6. Permit Suspension

This permit may be suspended during its term for noncompliance until the permittee has taken action(s) necessary to achieve compliance.

7. Request for Permit Action Does Not Stay Any Permit Requirement

The filing of a request by the permittee for modification, suspension or revocation of this permit, in whole or in part, does not stay any permit term or condition.

F. COMPLIANCE WITH TOXIC POLLUTANT STANDARD OR PROHIBITION

If any applicable effluent standard or prohibition (including any schedule of compliance specified in such effluent standard or prohibition) is established under Section 307(a) of the FWPCA. 33 U.S.C. Section 1317(a), for a toxic pollutant discharged by the permittee and such standard or prohibition is more stringent than any discharge limitation on the pollutant specified in Provision I. A. of this permit, or controls a pollutant not limited in Provision I. A. of this permit, this permit shall be modified to conform to the toxic pollutant effluent standard or prohibition and the permittee shall be notified of such modification. If this permit has not been modified to conform to the toxic pollutant effluent standard or prohibition before the effective date of such standard or prohibition, the permittee shall attain compliance with the requirements of the standard or prohibition within the time period required by the standard or prohibition and shall continue to comply with the standard or prohibition until this permit is modified or reissued.

G. DISCHARGE OF WASTEWATER GENERATED BY OTHERS

The discharge of wastewater, generated by any process, facility, or by any other means not under the operational control of the permittee or not identified in the application for this permit or not identified specifically in the description of an outfall in this permit is not authorized by this permit.

PART III OTHER PERMIT CONDITIONS

A. CIVIL AND CRIMINAL LIABILITY

1. Tampering

Any person who falsifies, tampers with, or knowingly renders inaccurate any monitoring device or method required to be maintained or performed under the permit shall, upon conviction, be subject to penalties as provided by the AWPCA.

False Statements

Any person who knowingly makes any false statement, representation, or certification in any record or other document submitted or required to be maintained under this permit, including monitoring reports or reports of compliance or noncompliance shall, upon conviction, be subject to penalties as provided by the AWPCA.

Permit Enforcement

- a. Any NPDES permit issued or reissued by the Department is a permit for the purpose of the AWPCA and the FWPCA and as such any terms, conditions, or limitations of the permit are enforceable under state and federal law.
- b. Any person required to have a NPDES permit pursuant to ADEM Administrative Code Chapter 335-6-6 and who discharges pollutants without said permit, who violates the conditions of said permit, who discharges pollutants in a manner not authorized by the permit, or who violates applicable orders of the Department or any applicable rule or standard of the Department, is subject to any one or combination of the following enforcement actions under applicable state statutes.
 - (1) An administrative order requiring abatement, compliance, mitigation, cessation, clean-up, and/or penalties;
 - (2) An action for damages:
 - (3) An action for injunctive relief; or
 - (4) An action for penalties.
- c. If the permittee is not in compliance with the conditions of an expiring or expired permit the Director may choose to do any or all of the following provided the permittee has made a timely and complete application for reissuance of the permit:
 - (1) initiate enforcement action based upon the permit which has been continued;
 - (2) issue a notice of intent to deny the permit reissuance. If the permit is denied, the owner or operator would then be required to cease the activities authorized by the continued permit or be subject to enforcement action for operating without a permit;
 - (3) reissue the new permit with appropriate conditions; or
 - (4) take other actions authorized by these rules and AWPCA.

4. Relief from Liability

Except as provided in Provision II.C.1 (Bypass) and Provision II.C.2 (Upset), nothing in this permit shall be construed to relieve the permittee of civil or criminal liability under the AWPCA or FWPCA for noncompliance with any term or condition of this permit.

B. OIL AND HAZARDOUS SUBSTANCE LIABILITY

Nothing in this permit shall be construed to preclude the institution of any legal action or relieve the permittee from any responsibilities. liabilities or penalties to which the permittee is or may be subject under Section 311 of the FWPCA. 33 U.S.C. Section 1321.

C. PROPERTY AND OTHER RIGHTS

This permit does not convey any property rights in either real or personal property, or any exclusive privileges, nor does it authorize any injury to persons or property or invasion of other private rights, trespass, or any infringement of federal, state, or local laws or regulations, nor does it authorize or approve the construction of any physical structures or facilities or the undertaking of any work in any waters of the state or of the United States.

D. AVAILABILITY OF REPORTS

Except for data determined to be confidential under <u>Code of Alabama</u> 1975, Section 22-22-9(c), all reports prepared in accordance with the terms of this permit shall be available for public inspection at the offices of the Department. Effluent data shall not be considered confidential.

E. EXPIRATION OF PERMITS FOR NEW OR INCREASED DISCHARGES

- 1. If this permit was issued for a new discharger or new source, this permit shall expire eighteen months after the issuance date if construction of the facility has not begun during the eighteen-month period.
- 2. If this permit was issued or modified to allow the discharge of increased quantities of pollutants to accommodate the modification of an existing facility and if construction of this modification has not begun during the eighteen month period after issuance of this permit or permit modification, this permit shall be modified to reduce the quantities of pollutants allowed to be discharged to those levels that would have been allowed if the modification of the facility had not been planned.
- 3. Construction has begun when the owner or operator has:
 - a. begun, or caused to begin as part of a continuous on-site construction program:
 - (1) any placement, assembly, or installation of facilities or equipment; or
 - (2) significant site preparation work including clearing, excavation, or removal of existing buildings, structures, or facilities which is necessary for the placement, assembly, or installation of new source facilities or equipment; or
 - b. entered into a binding contractual obligation for the purpose of placement, assembly, or installation of facilities or equipment which are intended to be used in its operation within a reasonable time. Options to purchase or contracts which can be terminated or modified without substantial loss, and contracts for feasibility, engineering, and design studies do not constitute a contractual obligation under the paragraph. The entering into a lease with the State of Alabama for exploration and production of hydrocarbons shall also be considered beginning construction.

F. COMPLIANCE WITH WATER QUALITY STANDARDS

- 1. On the basis of the permittee's application, plans, or other available information, the Department has determined that compliance with the terms and conditions of this permit should assure compliance with the applicable water quality standards.
- 2. Compliance with permit terms and conditions notwithstanding, if the permittee's discharge(s) from point sources identified in Provision I. A. of this permit cause or contribute to a condition in contravention of state water quality standards, the Department may require abatement action to be taken by the permittee in emergency situations or modify the permit pursuant to the Department's Rules, or both.
- 3. If the Department determines, on the basis of a notice provided pursuant to this permit or any investigation, inspection or sampling, that a modification of this permit is necessary to assure maintenance of water quality standards or compliance with other provisions of the AWPCA or FWPCA, the Department may require such modification and, in cases of emergency, the Director may prohibit the discharge until the permit has been modified.

G. GROUNDWATER

Unless specifically authorized under this permit, this permit does not authorize the discharge of pollutants to groundwater. Should a threat of groundwater contamination occur, the Director may require groundwater monitoring to properly assess the degree of the problem and the Director may require that the Permittee undertake measures to abate any such discharge and/or contamination.

H. DEFINITIONS

- 1. Average monthly discharge limitation means the highest allowable average of "daily discharges" over a calendar month, calculated as the sum of all "daily discharges" measured during a calendar month divided by the number of "daily discharges" measured during that month (zero discharge days shall not be included in the number of "daily discharges" measured and a less than detectable test result shall be treated as a concentration of zero if the most sensitive EPA approved method was used).
- 2. Average weekly discharge limitation means the highest allowable average of "daily discharges" over a calendar week, calculated as the sum of all "daily discharges" measured during a calendar week divided by the number of "daily discharges" measured during that week (zero discharge days shall not be included in the number of "daily discharges" measured and a less than detectable test result shall be treated as a concentration of zero if the most sensitive EPA approved method was used).

- 3. Arithmetic Mean means the summation of the individual values of any set of values divided by the number of individual values.
- 4. AWPCA means the Alabama Water Pollution Control Act.
- 5. BOD means the five-day measure of the pollutant parameter biochemical oxygen demand.
- 6. Bypass means the intentional diversion of waste streams from any portion of a treatment facility.
- 7. CBOD means the five-day measure of the pollutant parameter carbonaeeous biochemical oxygen demand.
- 8. Daily discharge means the discharge of a pollutant measured during any consecutive 24-hour period in accordance with the sample type and analytical methodology specified by the discharge permit.
- 9. Daily maximum means the highest value of any individual sample result obtained during a day.
- 10. Daily minimum means the lowest value of any individual sample result obtained during a day.
- 11. Day means any consecutive 24-hour period.
- 12. Department means the Alabama Department of Environmental Management.
- 13. Director means the Director of the Department.
- 14. Discharge means "[t]he addition, introduction, leaking, spilling or emitting of any sewage, industrial waste, pollutant or other wastes into waters of the state". <u>Code of Alabama</u> 1975. Section 22-22-1(b)(8).
- 15. Discharge Monitoring Report (DMR) means the form approved by the Director to accomplish reporting requirements of an NPDES permit.
- 16. DO means dissolved oxygen.
- 17. 8HC means 8-hour composite sample, including any of the following:
 - a. The mixing of at least 5 equal volume samples collected at constant time intervals of not more than 2 hours over a period of not less than 8 hours between the hours of 6:00 a.m. and 6:00 p.m. If the sampling period exceeds 8 hours, sampling may be conducted beyond the 6:00 a.m. to 6:00 p.m. period.
 - b. A sample continuously collected at a constant rate over period of not less than 8 hours between the hours of 6:00 a.m. and 6:00 p.m. If the sampling period exceeds 8 hours, sampling may be conducted beyond the 6:00 a.m. to 6:00 p.m. period.
- 18. EPA means the United States Environmental Protection Agency.
- 19. FC means the pollutant parameter fecal coliform.
- 20. Flow means the total volume of discharge in a 24-hour period.
- 21. FWPCA means the Federal Water Pollution Control Act.
- Geometric Mean means the Nth root of the product of the individual values of any set of values where N is equal to the number of individual values. The geometric mean is equivalent to the antilog of the arithmetic mean of the logarithms of the individual values. For purposes of calculating the geometric mean, values of zero (0) shall be considered one (1).
- 23. Grab Sample means a single influent or effluent portion which is not a composite sample. The sample(s) shall be collected at the period(s) most representative of the discharge.
- 24. Indirect Discharger means a nondomestic discharger who discharges pollutants to a publicly owned treatment works or a privately owned treatment facility operated by another person.
- 25. Industrial User means those industries identified in the Standard Industrial Classification manual, Bureau of the Budget 1967, as amended and supplemented, under the category "Division D Manufacturing" and such other classes of significant waste producers as, by regulation, the Director deems appropriate.
- 26. MGD means million gallons per day.
- 27. Monthly Average means, other than for fecal coliform bacteria, the arithmetic mean of the entire composite or grab samples taken for the daily discharges collected in one month period. The monthly average for fecal coliform bacteria is the geometric

mean of daily discharge samples collected in a one month period. The monthly average for flow is the arithmetic mean of all flow measurements taken in a one month period.

- 28. New Discharger means a person, owning or operating any building, structure, facility or installation:
 - a. from which there is or may be a discharge of pollutants;
 - b. that did not commence the discharge of pollutants prior to August 13, 1979, and which is not a new source: and
 - c. which has never received a final effective NPDES permit for dischargers at that site.
- 29. NH3-N means the pollutant parameter ammonia, measured as nitrogen.
- 30. Permit application means forms and additional information that is required by ADEM Administrative Code Rule 335-6-6-.08 and applicable permit fees.
- Point source means "any discernible, confined and discrete conveyance, including but not limited to any pipe, channel, ditch, tunnel, conduit, well, discrete fissure, container, rolling stock, concentrated animal feeding operation, or vessel or other floating craft, . . . from which pollutants are or may be discharged." Section 502(14) of the FWPCA, 33 U.S.C. Section 1362(14).
- Pollutant includes for purposes of this permit, but is not limited to, those pollutants specified in Code of Alabama 1975, Section 22-22-1(b)(3) and those effluent characteristics specified in Provision I. A. of this permit.
- 33. Privately Owned Treatment Works means any devices or system which is used to treat wastes from any facility whose operator is not the operator of the treatment works, and which is not a "POTW".
- 34. Publicly Owned Treatment Works means a wastewater collection and treatment facility owned by the State, municipality, regional entity composed of two or more municipalities, or another entity created by the State or local authority for the purpose of collecting and treating municipal wastewater.
- 35. Receiving Stream means the "waters" receiving a "discharge" from a "point source".
- 36. Severe property damage means substantial physical damage to property, damage to the treatment facilities which causes them to become inoperable, or substantial and permanent loss of natural resources which can reasonably be expected to occur in the absence of a bypass. Severe property damage does not mean economic loss caused by delays in production.
- 37. Significant Source means a source which discharges 0.025 MGD or more to a POTW or greater than five percent of the treatment work's capacity, or a source which is a primary industry as defined by the U.S. EPA or which discharges a priority or toxic pollutant.
- 38. TKN means the pollutant parameter Total Kjeldahl Nitrogen.
- 39. TON means the pollutant parameter Total Organic Nitrogen.
- 40. TRC means Total Residual Chlorine.
- 41. TSS means the pollutant parameter Total Suspended Solids.
- 42. 24HC means 24-hour composite sample, including any of the following:
 - a. the mixing of at least 12 equal volume samples collected at constant time intervals of not more than 2 hours over a period of 24 hours;
 - b. a sample collected over a consecutive 24-hour period using an automatic sampler composite to one sample. As a minimum, samples shall be collected hourly and each shall be no more than one twenty-fourth (1/24) of the total sample volume collected; or
 - c. a sample collected over a consecutive 24-hour period using an automatic composite sampler composited proportional to
- 43. Upset means an exceptional incident in which there is an unintentional and temporary noncompliance with technology-based permit discharge limitations because of factors beyond the reasonable control of the permittee. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, lack of preventive maintenance, or careless or improper operation.
- Waters means "[a]ll waters of any river, stream, watercourse, pond. lake, coastal, ground or surface water, wholly or partially within the state, natural or artificial. This does not include waters which are entirely confined and retained completely upon the

property of a single individual, partnership or corporation unless such waters are used in interstate commerce." <u>Code of Alabama</u> 1975. Section 22-22-1(b)(2). Waters "include all navigable waters" as defined in Section 502(7) of the FWPCA, 22 U.S.C. Section 1362(7), which are within the State of Alabama.

- 45. Week means the period beginning at twelve midnight Saturday and ending at twelve midnight the following Saturday.
- Weekly (7-day and calendar week) Average is the arithmetic mean of all samples collected during a consecutive 7-day period or calendar week, whichever is applicable. The ealendar week is defined as beginning on Sunday and ending on Saturday. Weekly averages shall be calculated for all calendar weeks with Saturdays in the month. If a ealendar week overlaps two months (i.e., the Sunday is in one month and the Saturday in the following month), the weekly average calculated for the calendar week shall be included in the data for the month that contains the Saturday.

I. SEVERABILITY

The provisions of this permit are severable, and if any provision of this permit or the application of any provision of this permit to any circumstance is held invalid, the application of such provision to other circumstances, and the remainder of this permit, shall not be affected thereby.

PART IV ADDITIONAL REQUIREMENTS, CONDITIONS, AND LIMITATIONS

A. BEST MANAGEMENT PRACTICES (BMP) PLAN REQUIREMENTS

BMP Plan

The permittee shall develop and implement a Best Management Practices (BMP) Plan which prevents, or minimizes the potential for, the release of pollutants from ancillary activities, including material storage areas; plant site runoff; in-plant transfer, process and material handling areas; loading and unloading operations, and sludge and waste disposal areas, to the waters of the State through plant site runoff; spillage or leaks; sludge or waste disposal; or drainage from raw material storage.

2. Plan Content

The permittee shall prepare and implement a best management practices (BMP) plan, which shall:

- a. Establish specific objectives for the control of pollutants:
 - (1) Each facility component or system shall be examined for its potential for causing a release of significant amounts of pollutants to waters of the State due to equipment failure, improper operation, natural phenomena such as rain or snowfall, etc.
 - (2) Where experience indicates a reasonable potential for equipment failure (e.g., a tank overflow or leakage), natural condition (e.g. precipitation), or circumstances to result in significant amounts of pollutants reaching surface waters, the plan should include a prediction of the direction, rate of flow, and total quantity of pollutants which could be discharged from the facility as a result of each condition or circumstance.
- b. Establish specific best management practices to meet the objectives identified under paragraph a. of this section, addressing each component or system capable of causing a release of significant amounts of pollutants to the waters of the State, and identifying specific preventative or remedial measures to be implemented:
- c Establish a program to identify and repair leaking equipment items and damaged containment structures, which may contribute to contaminated stormwater runoff. This program must include regular visual inspections of equipment, containment structures and of the facility in general to ensure that the BMP is continually implemented and effective:
- d. Prevent the spillage or loss of fluids, oil, grease, gasoline, etc. from vehicle and equipment maintenance activities and thereby prevent the contamination of stormwater from these substances:
- e. Prevent or minimize stormwater contact with material stored on site;
- f. Designate by position or name the person or persons responsible for the day to day implementation of the BMP;
- g. Provide for routine inspections, on days during which the facility is manned, of any structures that function to prevent stormwater pollution or to remove pollutants from stormwater and of the facility in general to ensure that the BMP is continually implemented and effective:
- h. Provide for the use and disposal of any material used to absorb spilled fluids that could contaminate stormwater:
- Develop a solvent management plan, if solvents are used on site. The solvent management plan shall include as a
 minimum lists of the total organic compounds on site; the method of disposal used instead of dumping, such as
 reclamation, contract hauling; and the procedures for assuring that toxic organics do not routinely spill or leak into the
 stormwater;
- j. Provide for the disposal of all used oils, hydraulic fluids, solvent degreasing material, etc. in accordance with good management practices and any applicable state or federal regulations;
- k. Include a diagram of the facility showing the locations where stormwater exits the facility, the locations of any structure or other mechanisms intended to prevent pollution of stormwater or to remove pollutants from stormwater, the locations of any collection and handling systems;
- l. Provide control sufficient to prevent or control pollution of stormwater by soil particles to the degree required to maintain compliance with the water quality standard for turbidity applicable to the waterbody(s) receiving discharge(s) under this permit;
- m. Provide spill prevention, control, and/or management sufficient to prevent or minimize contaminated stormwater runoff. Any containment system used to implement this requirement shall be constructed of materials compatible with

the substance(s) contained and shall prevent the contamination of groundwater. The containment system shall also be capable of retaining a volume equal to 110 percent of the capacity of the largest tank for which containment is provided;

- n. Provide and maintain curbing, diking or other means of isolating process areas to the extent necessary to allow segregation and collection for treatment of contaminated stormwater from process areas:
- o. Be reviewed by plant engineering staff and the plant manager; and
- p. Bear the signature of the plant manager.

3. Compliance Schedule

The permittee shall have reviewed (and revised if necessary) and fully implemented the BMP plan as soon as practicable but no later than six months after the effective date of this permit.

4. Department Review

- a. When requested by the Director or his designee, the permittee shall make the BMP available for Department review.
- b. The Director or his designee may notify the permittee at any time that the BMP is deficient and require correction of the deficiency.
- c. The permittee shall correct any BMP deficiency identified by the Director or his designee within 30 days of receipt of notification and shall certify to the Department that the correction has been made and implemented.

5. Administrative Procedures

- a. A copy of the BMP shall be maintained at the facility and shall be available for inspection by representatives of the Department.
- b. A log of the routine inspection required above shall be maintained at the facility and shall be available for inspection by representatives of the Department. The log shall contain records of all inspections performed for the last three years and each entry shall be signed by the person performing the inspection.
- c. The permittee shall provide training for any personnel required to implement the BMP and shall retain documentation of such training at the facility. This documentation shall be available for inspection by representatives of the Department. Training shall be performed prior to the date that implementation of the BMP is required.
- d. BMP Plan Modification. The permittee shall amend the BMP plan whenever there is a change in the facility or change in operation of the facility which materially increases the potential for the ancillary activities to result in a discharge of significant amounts of pollutants.
- e. BMP Plan Review. The permittee shall complete a review and evaluation of the BMP plan at least once every three years from the date of preparation of the BMP plan. Documentation of the BMP Plan review and evaluation shall be signed and dated by the Plant Manager.

B. STORMWATER FLOW MEASUREMENT AND SAMPLING REQUIREMENTS

1. Stormwater Flow Measurement

- All stormwater samples shall be collected from the discharge resulting from a storm event that is greater than 0.1 inches
- b. The total volume of stormwater discharged for the event must be monitored, including the date and duration (in hours) and rainfall (in inches) for storm event(s) sampled. The duration between the storm event sampled and the end of the previous measurable (greater than 0.1 inch rainfall) storm event must be a minimum of 72 hours. This information must be recorded as part of the sampling procedure and records retained according to Part I.B. of this permit.
- c. The volume may be measured using flow measuring devices, or estimated based on a modification of the Rational Method using total depth of rainfall, the size of the drainage area serving a stormwater outfall, and an estimate of the runoff coefficient of the drainage area. This information must be recorded as part of the sampling procedure and records retained according to Part I.B. of this permit.

Stormwater Sampling

- a. A grab sample, if required by this permit, shall be taken during the first thirty minutes of the discharge (or as soon thereafter as practicable); and a flow-weighted composite sample, if required by this permit, shall be taken for the entire event or for the first three hours of the event.
- b. All test procedures will be in accordance with part I.B. of this permit.

C. EFFLUENT TOXICITY LIMITATIONS AND BIOMONITORING REQUIREMENTS

- 1. The permittee shall perform short-term chronic toxicity tests on the wastewater discharges required to be tested for chronic toxicity by Part I of this permit.
 - a. Test Requirements (Screening Test)
 - (1) The samples shall be diluted using appropriate control water, to the Instream Waste Concentration (IWC) which is 55 % effluent. The IWC is the actual concentration of effluent, after mixing, in the receiving stream during a 7-day, 10-year flow period.
 - (2) Any test result that shows a statistically significant reduction in survival, growth, or reproduction between the control and the test at the 95% confidence level indicate chronic toxicity and constitute noncompliance with this permit.

b. General Test Requirements

- A minimum of three (3) 24-hour composite samples shall be obtained for use in the above biomonitoring tests and collected every other day so that the laboratory receives water samples on the first, third, and fifth day of the seven-day test period. The holding time for each composite sample shall not exceed 36 hours. The control water shall be a water prepared in the laboratory in accordance with the EPA procedure described in EPA 821-R-02-013 or the most current edition or another control water selected by the permittee and approved by the Department.
- (2) Effluent toxicity tests in which the control survival is less than 80%, P. promelas dry weight per surviving control organism is less than 0.25 mg, Ceriodaphnia number of young per surviving control organism is less than 15, Ceriodaphnia reproduction where less than 60% of surviving control females produce three broods or in which the other requirements of the EPA Test Procedure are not met shall be unacceptable and the permittee shall rerun the tests as soon as practical within the monitoring period.
- (3) In the event of an invalid test, upon subsequent completion of a valid test, the results of all tests, valid and invalid, are reported with an explanation of the tests performed and results.

c. Reporting Requirements

- (1) The permittee shall notify the Department in writing within 48 hours after toxicity has been demonstrated by the scheduled test(s).
- Biomonitoring test results obtained during each monitoring period shall be summarized and reported using the appropriate Discharge Monitoring Report (DMR) form approved by the Department. In accordance with Section 2 of this part, an effluent toxicity report containing the information in Section 2 shall be included with the DMR. Two copies of the test results must be submitted to the Department no later than 28 days after the month in which the tests were performed.

d. Additional Testing Requirements

- (1) If chronic toxicity is indicated (noncompliance with permit limit), the permittee shall perform two additional valid chronic toxicity tests in accordance with these procedures to determine the extent and duration of the toxic condition. The toxicity tests shall run consecutively beginning on the first calendar week following the date on which the permittee became aware of the permit noncompliance and the results of these tests shall be submitted no later than 28 days following the month in which the tests were performed.
- After evaluation of the results of the follow-up tests, the Department will determine if additional action is appropriate and may require additional testing and/or toxicity reduction measures. The permittee may be required to perform a Toxicity Identification Evaluation (TIE) and/or a Toxicity Reduction Evaluation (TRE). The TIE/TRE shall be performed in accordance with the most recent protocols/guidance outlined by EPA (e.g., EPA/600/2-88/062, EPA/600/R-92/080, EPA/600/R-91-003, EPA/600/R-92/081, EPA/833/B-99/022 and/or EPA/600/6-91/005F, etc.)

e. Test Methods

(1) The tests shall be performed in accordance with the latest edition of the "EPA Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Water to Freshwater Organisms". The Larval Survival and Growth Test, Methods 1000.0, shall be used for the fathead minnow (*Pimephales promelas*) test and the Survival and Reproduction Test, Method 1002.0, shall be used for the cladoceran (*Ceriodaphnia dubia*) test.

2. Effluent Toxicity Testing Reports

The following information shall be submitted with each discharge monitoring report unless otherwise directed by the Department. The Department may at any times suspend or reinstate this requirements or may decrease or increase the frequency of submittals.

a. Introduction

- (1) Facility name, location, and country
- (2) Permit number
- (3) Toxicity testing requirements of permit
- (4) Name of receiving water body
- (5) Contract laboratory information (if tests are performed under contract)
 - (a) Name of firm
 - (b) Telephone number
 - (c) Address
- (6) Objective of test

b. Plant Operations

- (1) Discharge Operating schedule (if other than continuous)
- (2) Volume of discharge during sample collection to include mean daily discharge on sample collection dates (MGD, CFS, GPM)
- (3) Design flow of treatment facility at the time of sampling
- c. Source of Effluent and Dilution Water
 - (1) Effluent samples
 - (a) Sampling point
 - (b) Sample collection dates and times (to include composite sample start and finish times)
- d. Plant Operation
 - (1) Discharge Operating schedule (if other than continuous)
 - (2) Volume of discharge during sample collection to include Mean daily discharge on sample collection dates (MGD, CFS, GPM)
 - (3) Design flow of treatment facility at time of sampling
- c. Source of Effluent and Dilution Water
 - (1) Effluent samples
 - (a) Sampling point
 - (b) Sample collection dates and times (to include composite sample start and finish times)
 - (c) Sample collection method
 - Physical and chemical data of undiluted effluent samples (water temperature, pH, alkalinity, hardness, specific conductance, total residual chlorine (if applicable), etc.)

- (e) Lapsed time from sample collection to delivery
- (f) Lapsed time from sample collection to test initiation
- (g) Sample temperature when received at the laborator
- (2) Dilution Water
 - (a) Source
 - (b) Collection/preparation date(s) and time(s)
 - (c) Pretreatment (if applicable)
 - (d) Physical and chemical characteristics (water temperature, pH, alkalinity, hardness, specific conductance, etc.)
- d. Test Conditions
 - (1) Toxicity test method utilized
 - (2) End point(s) of test
 - (3) Deviations from referenced method, if any, and reason(s)
 - (4) Date and time test started
 - (5) Date and time test terminated
 - (6) Type and volume of test chambers
 - (7) Volume of solution per chamber
 - (8) Number of organisms per test chamber
 - (9) Number of replicate test chambers per treatment
 - (10) Test temperature, pH, and dissolved oxygen as recommended by the method (to include ranges)
 - (11) Specify if aeration was needed
 - (12) Feeding frequency, amount, and type of food
 - (13) Specify if (and how) pH control measures were implemented
 - (14) Light intensity (mean)
- e. Test Organisms
 - (1) Scientific name
 - (2) Life stage and age
 - (3) Source
 - (4) Disease(s) treatment (if applicable)
- f. Quality Assurance
 - (1) Reference toxicant utilized and source
 - (2) Date and time of most recent chronic reference toxicant test(s), raw data and current control chart(s). The most recent chronic reference toxicant test shall be conducted within 30 days of the routine.
 - (3) Dilution water utilized in reference toxicant test
 - (4) Results of reference toxicant test(s) (NOEC, IC25, PASS/FAIL, etc.), report concentration response relationship and evaluate test sensitivity
 - (5) Physical and chemical methods utilized

- g. Results
 - (1) Provide raw toxicity data in tabular form, including daily records of affected organisms in each concentration (including controls) and replicate
 - (2) Provide table of endpoints: NOECs, IC25s, PASS/FAIL, etc. (as required in the applicable NPDES permit)
 - (3) Indicate statistical methods used to calculate endpoints
 - (4) Provide all physical and chemical data required by method
 - (5) Results of test(s) (NOEC, IC25, PASS/FAIL, etc.), report concentration-response relationship (definitive test only), report percent minimum significant difference (PMSD) calculated for sub-lethal endpoints determined by hypothesis testing
- h. Conclusions and Recommendations
 - (1) Relationship between test endpoints and permit limits
 - (2) Actions to be taken
- g. Conclusions and Recommendations
 - (1) Relationship between test endpoints and permit limits
 - (2) Actions to be taken

1/ Adapted from "Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms", Fourth Edition, October 2002 (EPA 821-R-02-013), Section 10, Report Preparation

ALABAMA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT WATER DIVISION – INDUSTRIAL AND MUNICIPAL SECTIONS NONCOMPLIANCE NOTIFICATION FORM

PERM	RMITTEE NAME:	PERMIT NO:								
FACIL	LITY LOCATION:									
DMR	REPORTING PERIOD:									
1.	DESCRIPTION OF DISC	CHARGE: (Include outfall numbe	er (s))							
2.	DESCRIPTION OF NON	N-COMPLIANCE: (Attach additio	onal pages if necessary):							
		LIST EFFLUENT VIOL	ATIONS (If applicable)							
	Outfall Number (s)	NONCOMPLIANCE PARAMETER(S)	Result Reported (Include units)	Permit Limit (Include units)						
	LIS	T MONITORING / REPORTI								
	Outfall Number (s)	NONCOMPLIANCE PARAMETER(S)		/ Reporting Violation vide description)						
3.	CAUSE OF NON-COMP	PLIANCE (Attach additional page	es if necessary):							
4.	PERIOD OF NONCOMP	PLIANCE: (Include exact date(s) ted to continue):	and time(s) or, if not correc	cted, the anticipated time the						
5.		PS TAKEN AND/OR BEING TA PREVENT ITS RECURRENCE (MINATE THE NONCOMPLYING ecessary):						
with a the po subm	a system designed to assure erson or persons who man itted is, to the best of my l	that qualified personnel properly age the system, or those perso	y gather and evaluate the in ons directly responsible for trate, and complete. I am a	er my direction or supervision in accordance formation submitted. Based on my inquiry of gathering the information, the information ware that there are significant penalties for iolations."						
NAME	AND TITLE OF RESPONS	SIBLE OFFICIAL (type or print)								
SIGN	ATURE OF RESPONSIBLE	/ E OFFICIAL / DATE SIGNED								

ADEM Form 421 09/05

ADEM PERMIT RATIONALE

PREPARED DATE: February 4, 2014 PREPARED BY: Brian Marshall

Permittee Name: CER Generation, LLC

Facility Name: Tallapoosa County Facility

Permit Number: AL0073784

PERMIT IS MODIFICATION

DISCHARGE SERIAL NUMBERS & DESCRIPTIONS:

DSN001: Cooling tower blowdown, low volume waste streams, and demineralizer regeneration rinse water.

DSN002: Storm water runoff associated with industrial activities.

DSN003: Storm water associated with industrial activities.

DSN004: Storm water associated with industrial activities.

DSN005: Storm water associated with industrial activities.

DSN006: Storm water associated with industrial activities.

DSN01A: Cooling tower blowdown.

DSN01B: Discharges from low volume waste streams.

INDUSTRIAL CATEGORY: 40 CFR Part 423.15 – Steam Electric Point Source Category

MAJOR: N

STREAM INFORMATION:

Receiving Stream: Oaktasasi Creek

Classification: Fish & Wildlife

River Basin: Tallapoosa

7Q10: 5.2 cfs 1010: 3.9 cfs

303(d) List: NO

Impairment:

N/A NO

DISCUSSION:

TMDL:

This facility is a natural gas fired steam electric power generating plant providing 700 MW of electricity to the general public. The plant consists of two gas turbine generating units and one steam turbine generating unit.

ADEM Administrative Rule 335-6-10-.12 requires applicants to new or expanded discharges to Tier II waters demonstrate that the proposed discharge is necessary for important economic or social development in the area in which the waters are located. The application submitted by the facility is for an expanded discharge and the antidegradation rationale is attached.

The proposed frequencies continue to be based on a review of site specific conditions and an evaluation of similar facilities.

01A1: Cooling tower blowdown.								
<u>Parameter</u>	Monthly Avg Loading	<u>Daily Max</u> <u>Loading</u>	<u>Daily Min</u> Concentration	Monthly Avg Concentration	<u>Daily Max</u> Concentration	<u>Sample</u> <u>Frequency</u>	Sample Type	Basis*
pН	-	-	6.0 S.U.	-	9.0 S.U.	Daily	Continuous	EGL
Chromium, Total (As Cr)	-	-	-	0.2 mg/l	0.2 mg/l	Monthly	Grab	EGL
Zinc, Total (As Zn)	-	-	-	1.0 mg/l	1.0 mg/l	Monthly	Grab	EGL
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	•	-	-	Monthly	Totalizer	Bbì
Chlorine, Total Residual	-	-	-	REPORT mg/l	REPORT mg/l	Monthly	Grab	BPJ
Chlorine, Free Available	-	-	-	0.2 mg/l	0.5 mg/l	Monthly	Grab	EGL
Chlorination Duration	-	-	•	-	120 min/day	Daily	Pump Log	EGL
<u>01AY:</u> Cooling tower blowdown.	M. All A.	Da No. Billion	Davida Milia	Marakhlar Asan	Dalla Mar	Samula	Comple Tune	
<u>Parameter</u>	<u>Monthly Avg</u> Loading	<u>Daily Max</u> Loading	<u>Daily Min</u> Concentration	Monthly Avg Concentration	<u>Daily Max</u> Concentration	<u>Sample</u> Frequency	Sample Type	Basis*
Priority Pollutants Total Effluent	<u></u>	-	-	0 mg/1	0 mg/l	Annually	Grab	EGL
01B1: Discharges from low volume	waste streams.							
Parameter	Monthly Avg Loading	<u>Daily Max</u> <u>Loading</u>	Daily Min Concentration	Monthly Avg Concentration	Daily Max Concentration	Sample Frequency	Sample Type	Basis*
Solids, Total Suspended	-	-	-	30 mg/l	100 mg/l	Monthly	Grab	EGL
Oil and Grease	-	-	-	10 mg/l	15 mg/l	Monthly	Grab	EGL
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Monthly	Totalizer	BPJ
002Q: Storm water runoff associated	d with industrial activi	ities.						
<u>Parameter</u>	Monthly Avg Loading	<u>Daily Max</u> <u>Loading</u>	<u>Daily Min</u> Concentration	Monthly Avg Concentration	<u>Daily Max</u> <u>Concentration</u>	<u>Sample</u> Frequency	Sample Type	<u>Basis*</u>
рН	-	-	-	-	REPORT S.U.	Quarterly	Grab	BPJ
Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	BPJ
Oil and Grease	-	-	-	-	15 mg/l	Quarterly	Grab	BPJ

Flow, In Conduit or Thru Treatment Plant	REPORT MGD	-	Quarterly	Calculated	ВРЈ			
003Q: Storm water runoff associated w	vith industrial activ	ities.						
	Monthly Avg	Daily Max	Daily Min	Monthly Avg	Daily Max	<u>Sample</u>	Sample Type	
<u>Parameter</u>	Loading	<u>Loading</u>	Concentration	Concentration	Concentration	<u>Frequency</u>		Basis*
pН	-	-	-	-	REPORT S.U.	Quarterly	Grab	BPJ
Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	BPJ
Oil and Grease	-	-	-	~	15 mg/l	Quarterly	Grab	BPJ
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Quarterly	Calculated	ВРЈ
001Q: Cooling tower blowdown and lo	ow volume waste st Monthly Avg	reams. Daily Max	<u>Daily Min</u>	Monthly Avg	<u>Daily Max</u>	<u>Sample</u>	Sample Type	
<u>Parameter</u>	Loading	Loading	Concentration	Concentration	Concentration	Frequency		Basis*
Nitrogen, Ammonia Total (As N)	-	-	-	-	REPORT mg/l	Quarterly	Grab	BPJ
Nitrite Plus Nitrate Total 1 Det. (As N)	-	-	-	-	REPORT mg/l	Quarterly	Grab	ВРЈ
Phosphorus, Total (As P)	-	-	-	-	REPORT mg/l	Quarterly	Grab	ВРЈ
Zinc Total Recoverable	-	_	-	-	REPORT mg/l	Quarterly	Grab	ВРЈ
Chromium Total Recoverable	-	-	-	-	REPORT mg/l	Quarterly	Grab	ВРЈ
001S: Cooling tower blowdown and lo	w volume waste str	reams.						
	Monthly Avg	Daily Max	Daily Min	Monthly Avg	Daily Max	<u>Sample</u>	Sample Type	
<u>Parameter</u>	Loading	Loading	Concentration	Concentration	Concentration	Frequency		Basis*
Toxicity, Ceriodaphnia Chronic	-	0 pass(0)/fail(1)	-	-	-	Semi-Annual	24-Hr Composite	ВРЈ
Toxicity, Pimephales Chronic	-	0 pass(0)/fail(1)	-	-	-	Semi-Annual	24-Hr Composite	ВРЈ

Parameter	Monthly Avg Loading	<u>Daily Max</u> <u>Loading</u>	<u>Daily Min</u> <u>Concentration</u>	Monthly Avg Concentration	<u>Daily Max</u> Concentration	Sample Frequency	Sample Type	Basis*
Temperature, Water Deg. Fahrenheit	-	~	-	-	90 F	Daily	Continuous	WQBEL
pН	-	-	6.0 S.U.	-	9.0 S.U.	Daily	Continuous	EGL
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Daily	Totalizer	ВРЈ

<u>004Q:</u> Storm water runoff associated with industrial activities.

	Monthly Avg	Daily Max	<u>Daily Min</u>	Monthly Avg	Daily Max	<u>Sample</u>	Sample Type	
<u>Parameter</u>	Loading	<u>Loading</u>	Concentration	Concentration	Concentration	Frequency Property		<u>Basis*</u>
рН	-	-	-	-	REPORT S.U.	Quarterly	Grab	BPJ
Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	ВРЈ
Oil and Grease	-	-	-	-	15 mg/l	Quarterly	Grab	ВРЈ
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Quarterly	Calculated	ВРЈ

<u>005Q:</u> Storm water runoff associated with industrial activities.

	Monthly Avg	Daily Max	Daily Min	Monthly Avg	Daily Max	<u>Sample</u>	Sample Type	
<u>Parameter</u>	<u>Loading</u>	<u>Loading</u>	Concentration	Concentration	<u>Concentration</u>	<u>Frequency</u>		<u>Basis*</u>
рН	-	-	-	-	REPORT S.U.	Quarterly	Grab	BPJ
Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	BPJ
Oil and Grease	-	-	-	-	15 mg/l	Quarterly	Grab	BPJ
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Quarterly	Calculated	ВРЈ

<u>006Q:</u> Storm water runoff associated with industrial activities.

	Monthly Avg	Daily Max	<u>Daily Min</u>	Monthly Avg	<u>Daily Max</u>	<u>Sample</u>	Sample Type	
<u>Parameter</u>	<u>Loading</u>	Loading	Concentration	Concentration	Concentration	Frequency		Basis*
pН	-	-	-	-	REPORT S.U.	Quarterly	Grab	BPJ

Solids, Total Suspended Oil and Grease 1. PROPRT MGD Flow, In Conduit or Thru Treatment Plant Monthly Avg Daily Max Daily Max Daily Min Concentration Concentration Plant Treatment Plant Monthly Avg Daily Max Daily Min Concentration Concentrati									
Flow, In Conduit or Thru Treatment Plant	Solids, Total Suspended	-	-	-	-	REPORT mg/l	Quarterly	Grab	ВРЈ
Treatment Plant One Parameter Parameter Daily Max REPORT S.U. REPORT mg/l Once/Discharge Grab BPJ Once/Discharge Grab BPJ Chlorine, Total Residual Once/Discharge Daily Max Concentration REPORT mg/l Once/Discharge Grab WQBEL Once/Discharge Grab BPJ Solids, Total Suspended Oli & Graese	Oil and Grease	-	-	-	-	15 mg/l	Quarterly	Grab	ВРЈ
Parameter Monthly Avg Loading Daily Max Concentration Concentration Monthly Avg Concentration Concentration Daily Max Concentration Concentration Sample Frequency Sample Type Frequency Basis* Grab 9H - - REPORT S.U. - REPORT S.U. Once/Discharge Grab BPJ Solids, Total Suspended Oil & Grease - - - - REPORT mg/l REPORT mg/l Once/Discharge Grab BPJ Flow, In Conduit or Thru Treatment Plant REPORT MGD REPORT MGD - - - Once/Discharge Calculated BPJ 603Y; Fire System Test Water Monthly Avg Parameter Monthly Avg Loading Daily Max Concentration Monthly Avg Concentration Daily Max Concentration Sample Type Frequency Basis* Sample Type Basis* Grab BPJ 901 & Grease - - REPORT S.U. - Once/Discharge Grab BPJ Flow, In Conduit or Thru Treatment Plant - - REPORT MGD REPORT MGD REPORT MGD REPORT MGD REPORT MGD REPORT MGD - - <td></td> <td>-</td> <td>REPORT MGD</td> <td>-</td> <td>-</td> <td>-</td> <td>Quarterly</td> <td>Calculated</td> <td>ВРЈ</td>		-	REPORT MGD	-	-	-	Quarterly	Calculated	ВРЈ
Parameter Monthly Avg Loading Daily Max Concentration Concentration Monthly Avg Concentration Concentration Daily Max Concentration Concentration Sample Frequency Sample Type Frequency Basis* Grab 9H - - REPORT S.U. - REPORT S.U. Once/Discharge Grab BPJ Solids, Total Suspended Oil & Grease - - - - REPORT mg/l REPORT mg/l Once/Discharge Grab BPJ Flow, In Conduit or Thru Treatment Plant REPORT MGD REPORT MGD - - - Once/Discharge Calculated BPJ 603Y; Fire System Test Water Monthly Avg Parameter Monthly Avg Loading Daily Max Concentration Monthly Avg Concentration Daily Max Concentration Sample Type Frequency Basis* Sample Type Basis* Grab BPJ 901 & Grease - - REPORT S.U. - Once/Discharge Grab BPJ Flow, In Conduit or Thru Treatment Plant - - REPORT MGD REPORT MGD REPORT MGD REPORT MGD REPORT MGD REPORT MGD - - <td>0041/ 51 0 5</td> <td></td> <td></td> <td>•</td> <td></td> <td></td> <td></td> <td></td> <td></td>	0041/ 51 0 5			•					
Parameter Loading Loading Concentration Concentration Concentration Erequency Basis*	002Y: Fire System Tes								
pH REPORT S.U REPORT S.U. Once/Discharge Grab BPJ Solids, Total Suspended REPORT mg/l Once/Discharge Grab BPJ Oil & Grease REPORT mg/l Once/Discharge Grab BPJ Flow, In Conduit or Thru Treatment Plant Chlorine, Total Residual 0.24 mg/l Once/Discharge Grab WQBEL Monthly Avg Daily Max Daily Min Concentration PH REPORT S.U. PRORT S.U. Once/Discharge Grab BPJ Solids, Total Suspended REPORT S.U. REPORT S.U. Once/Discharge Grab BPJ Solids, Total Suspended REPORT S.U. REPORT Mg/l REPORT mg/l Once/Discharge Grab BPJ Oil & Grease	Parameter							Sample Type	Racie*
Solids, Total Suspended REPORT mg/l Once/Discharge Grab BPJ Oil & Grease		<u>Loading</u>	<u>Loading</u>					Grab	
Oil & Grease Flow, In Conduit or Thru Treatment Plant Chlorine, Total Residual Once/Discharge Calculated BPJ Once/Discharge Once/Disch		-	-	-	REPORT mg/l		_		
Flow, In Conduit or Thru Treatment Plant Chlorine, Total Residual 0 0.24 mg/l 0.42 mg/l 0.00 ce/Discharge Grab WQBEL 0.03Y: Fire System Test Water		_	-	-	-	ŭ	Č		
Monthly Avg Daily Max Daily Min Monthly Avg Daily Max Daily Min Concentration Concentration Concentration REPORT S.U. Concentration REPORT S.U. Concentration REPORT mg/l Concentration Concentration Concentration Concentration Concentration REPORT S.U. Concentration Concentration Concentration REPORT S.U. Concentration Concentration Concentration REPORT S.U. Concentration Concentratio	1	REPORT MGD	REPORT MGD	-	-	_	Once/Discharge	Calculated	ВРЈ
ParameterMonthly Avg LoadingDaily Max LoadingDaily Min ConcentrationMonthly Avg ConcentrationDaily Max ConcentrationSample FrequencySample Type Basis*pHREPORT S.UREPORT S.U.Once/DischargeGrabBPJSolids, Total SuspendedREPORT mg/lREPORT mg/lOnce/DischargeGrabBPJOil & Grease15.0 mg/lOnce/DischargeGrabBPJFlow, In Conduit or Thru Treatment PlantREPORT MGDREPORT MGDOnce/DischargeCalculatedBPJChlorine, Total Residual0.24 mg/l0.42 mg/lOnce/DischargeGrabWQBEL004Y: Fire System Test WaterMonthly Avg LoadingDaily Max LoadingDaily Max ConcentrationMonthly Avg ConcentrationDaily Max ConcentrationDaily Max ConcentrationSample FrequencySample Type FrequencyBasis*	Chlorine, Total Residual	-	-	-	0.24 mg/l	0.42 mg/l	Once/Discharge	Grab	WQBEL
Parameter pHLoading -Loading -Concentration REPORT S.U.Concentration REPORT S.U.Concentration REPORT S.U.Frequency Once/DischargeBasis* BPJSolids, Total Suspended Oil & GreaseREPORT mg/lOnce/DischargeGrabBPJOil & Grease15.0 mg/lOnce/DischargeGrabBPJFlow, In Conduit or Thru Treatment PlantREPORT MGDREPORT MGDOnce/DischargeCalculatedBPJChlorine, Total Residual0.24 mg/l0.42 mg/lOnce/DischargeGrabWQBEL004Y: Fire System Test WaterMonthly Avg LoadingDaily Max LoadingDaily Min ConcentrationMonthly Avg ConcentrationDaily Max ConcentrationSample FrequencySample Type FrequencyBasis*	003Y: Fire System Test Water	Monthly Avg	Daily <u>Max</u>	Daily Min	Monthly Avg	Daily Max	Sample	Sample Type	
Solids, Total Suspended REPORT mg/l REPORT mg/l Once/Discharge Grab BPJ Oil & Grease 15.0 mg/l Once/Discharge Grab BPJ Flow, In Conduit or Thru Treatment Plant Chlorine, Total Residual 0.24 mg/l 0.42 mg/l Once/Discharge Grab WQBEL O04Y: Fire System Test Water Monthly Avg Loading Loading Concentration Concentration Concentration Concentration Frequency Basis*	<u>Parameter</u>	Loading	Loading	Concentration		Concentration	Frequency		<u>Basis*</u>
Oil & Grease 15.0 mg/l Once/Discharge Grab BPJ Flow, In Conduit or Thru Treatment Plant Chlorine, Total Residual 0.24 mg/l 0.42 mg/l Once/Discharge Grab WQBEL O04Y: Fire System Test Water Monthly Avg Daily Max Daily Min Monthly Avg Daily Max Concentration Concentration Concentration Concentration Frequency Basis*	рН	-	-	REPORT S.U.	-	REPORT S.U.	Once/Discharge	Grab	BPJ
Flow, In Conduit or Thru Treatment Plant Chlorine, Total Residual Chlorine, Total Residual Chlorine System Test Water Monthly Avg Daily Max Daily Min Concentration Daily Min Concentration Concentration Concentration Concentration Frequency BPJ Calculated BPJ Calculated BPJ Once/Discharge Calculated BPJ Once/Discharge Grab WQBEL Daily Max Sample Sample Type Basis*	Solids, Total Suspended	-	-	-	REPORT mg/l	REPORT mg/l	Once/Discharge	Grab	BPJ
Treatment Plant Chlorine, Total Residual Chlorine, Total Residual Once/Discharge Calculated BPJ Once/Discharge Once/Discharge Once/Discharge Once/Discharge Once/Discharge Calculated BPJ Once/Discharge Once/Disc	Oil & Grease	-	-	-	-	15.0 mg/l	Once/Discharge	Grab	ВРЈ
004Y: Fire System Test Water Monthly Avg Daily Max Daily Min Monthly Avg Daily Max Sample Sample Type Parameter Loading Concentration Concentration Frequency Basis*		REPORT MGD	REPORT MGD	-	-	-	Once/Discharge	Calculated	ВРЈ
Monthly AvgDaily MaxDaily MinMonthly AvgDaily MaxSampleSample TypeParameterLoadingLoadingConcentrationConcentrationConcentrationFrequencyBasis*	Chlorine, Total Residual	-	-	-	0.24 mg/l	0.42 mg/l	Once/Discharge	Grab	WQBEL
Monthly AvgDaily MaxDaily MinMonthly AvgDaily MaxSampleSample TypeParameterLoadingLoadingConcentrationConcentrationConcentrationFrequencyBasis*									
<u>Parameter</u> <u>Loading</u> <u>Loading</u> <u>Concentration</u> <u>Concentration</u> <u>Frequency</u> <u>Basis*</u>	004Y: Fire System Test Water								
	Parameter							Sample Type	Docie*
		Loaumg	Loading		Concentration	Concentration			

Solids, Total Suspended	-	-	-	REPORT mg/l	REPORT mg/l	Once/Discharge	Grab	BPJ
Oil & Grease	•	-	-	-	15.0 mg/l	Once/Discharge	Grab	BPJ
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Once/Discharge	Calculated	ВРЈ
Chlorine, Total Residual	-	-	-	0.24 mg/l	0.42 mg/l	Once/Discharge	Grab	WQBEL

*Basis for Permit Limitation

- BPJ Best Professional Judgment
- WQBEL Water Quality Based Effluent Limits EGL Federal Effluent Guideline Limitations
- 303(d) 303(d) List of Impaired Waters
- TMDL Total Maximum Daily Load Requirements

Discussion

The facility requested a modification to add demineralizer regeneration rinse water to the current discharges from DSN0011. The flow from the outfall is expected to increase from 193 gpd to 237 gpd. A review of the application sampling reveals that no significant pollutant loading will result from the inclusion of this discharge. As a result, no additional monitoring requirements are included. However, an Anti-Degradation Analysis rationale is required and is included as an attachment to this rationale.

ANTIDEGRADATION RATIONALE

Permit Number: AL0073784

Facility Name: CER Generation, LLC

Receiving Waters: Oaktasasi Creek

Stream Category: Tier 2 as defined by ADEM Admin. Code 335-6-10-.12

Discharge Description: Process Water

The following preliminary determination was prepared in accordance with ADEM Admin. Code 335-6-10-.12 (7) (c):

The Department has reviewed the information submitted by applicant in accordance with ADEM Admin. Code 335-6-10-.12 (9). The applicant has demonstrated that there are no technical or economical viable options in their alternatives analysis that would completely eliminate a direct discharge.

The permit applicant has indicated that the following economic and/or social benefits will result from this project:

- The demineralizer regeneration stream currently is trucked off-site.
- The facility spends approximately \$600,000 per year for resting and discposal fees associated with the demineralizer regeneration system.
- The proposed modification will allow cost reductions that could be reallocated into other capital projects and improvements, thereby improving the local economy by creating more employment opportunities for plant personnel and plant contractors.

The Department has determined that the discharge as proposed by the permit applicant is necessary for important economic and social development in the area in which the receiving water is located.

Reviewed By: Scott Ramsey
Date: February 6, 2014



December 4, 2013

Alabama Department of Environmental Management Attention Brian Marshall 1400 Coliseum Blvd Montgomery, AL, 36110-2059 (334) 271-7895



Mr. Marshall,

On January 22, 2013, the Hillabee Generation Station initially proposed the inclusion of the demineralizer regeneration rinse water to our current permitted outfall stream DSN0011. On April 4, 2013, we agreed to submit a permit modification application to properly represent the changes to the outfall. After discussions with you and your team, we have completed the Anti Degradation study to be included in this permit modification.

The data in the tables in EPA Form 2C represent a calculated value for the effluent characteristics. The water balance diagram was used to estimate the future effluent from the demineralizer regeneration rinse effluent and the current outfall effluent. The analytical data from those samples were then used, in conjunction with estimated flow to mathematically estimate the future effluent.

The final effluent was derived using the factors represented below.

- Average regenerations per week
- Make up water to the plant
- Power Plant run time
- Conductivity and concentrations of all the incoming streams



Increasing the inlet flow will actually increase the number of blowdowns by the cooling tower. We expect the average flow to increase from 193 gpm to 237 gpm.

Included in this packet is:

- EPA Form 1
- EPA Form 2C
- ADEM Form 187
- A water balance diagram
- · Certified Anti Degradation Study
- Check for \$4680

Please call me about any questions or comments you may have or email me at gregg.vines@exeloncorp.com.

Sincerely,

Gregg Vines 817-319-1757

Sr. Environmental Specialist

Exelon Power

CONTINUED FROM THE FRONT			
VII. SIC CODES (4-digit, in order of priority) A. FIRST		B. SECOND	
A. FIRST	Spec (spec		
7 4911	\frac{7}{1}		
C. THIRD	15 16 - 19	D. FOURTH	
c (specify)	S I I (spec		
7	[7]		
VIII, OPERATOR INFORMATION	15 16 - 19		
VIII. OF ERATOR INPORTING TION	A. NAME		B. Is the name listed in Item
8 CER GENERATION	, , , , , , , , , , , , , , , , , , , 		VIII-A also the owner?
15 16			☑ YES □ NO
C. STATUS OF OPERATOR (Enter the app	reasered better into the angue box if "Other	┶┈┈═╼╌┌╼┸	HONE (area code & no)
F = FEDERAL	(specify)	<i>specify</i> 0.1	THE TENER COME & NO)
S - STATE M = PUBLIC (other than federa	l or state) P P		(256) 215-7122
P = PRIVATE O = OTHER (specify)	56	15 6	18 IB 21 22 - 26
E STREET OR P.O. BO			
		7	
152 BRICK PLANT ROAD			
25		5	
F. CITY OR TOWN		S. STATE H. ZIP CODE IX. INDIA	
B ALEXANDER CITY			ility located on Indian lands?
(- (☑ NO
15 16	40 41	42 47 . 51	
X. EXISTING ENVIRONMENTAL PERMITS	D DCD // E		
A. NPDES (Discharges to Surface Water)	D. PSD (Air Emissions from Proposed	Nources	
9 N AL0073784 9	P		
15 16 17 18 30 15		30	
B. UIC (Underground Injection of Fluids)		E. OTHER (specify)	
NA NA	Hit none	(specify)	
	16 17 18	30	
C. RCRA (Hazardous Wastes)	[16] 17 [18	E. OTHER (specify)	
		(specify)	
9 R ALR000044164	NONE		
15 16 17 18 30 15	16 17 18	30	
XI. MAP			
Attach to this application a topographic map of the area exter			
location of each of its existing and proposed intake and dischatinjects fluids underground. Include all springs, rivers, and other	rge structures, each of its nazardous was: surface water bodies in the man area. See	te treatment, storage, or disposal fac e instructions for precise requirements	illities, and each well where it
XII. NATURE OF BUSINESS (provide a brief description)	EDDELING DAGILLEY DRONOTING	PAONOTA ADOMENT DV PROVIDE	TNO ZOO MECA MARRO
NATURAL GAS FIRED STEAM ELECTRIC POWER GEN OF ELECTRICITY TO THE GENERAL PUBLIC.	ERAIING FACILITY PROMOTING	ECONOTE GROWTH BY PROVIL	ING 700 MEGA-WAITS
			ı
			!
{ ·			
XIII. CERTIFICATION (see instructions)			
I certify under penalty of law that I have personally examined a	nd am familiar with the information submi	itted in this application and all attachs	ments and that hased on my
inquiry of those persons immediately responsible for obtaining am aware that there are significant penalties for submitting false	the information contained in the application	on, I believe that the information is tri	
A. NAME & OFFICIAL TITLE (type or print)	B SIGNATURE		C. DATE SIGNED
DAVID GORDON, PLANT MANAGER		-	O. DATE DIGITED
		1201	1/11/12
	Jan . 1	Jan	11114/13
COMMENTS FOR OFFICIAL USE ONLY			
C	· - 		
15 16		55	
EPA Form 3510-1 (8-90)			

EPA I.D. NUMBER (copy from Item 1 of Form 1)

110038370250

Form Approved. OMB No. 2040-0086. Approval expires 3-31-98.

Please print or type in the unshaded areas only.

2C SEPA

U.S. ENVIRONMENTAL PROTECTION AGENCY APPLICATION FOR PERMIT TO DISCHARGE WASTEWATER EXISTING MANUFACTURING, COMMERCIAL, MINING AND SILVICULTURE OPERATIONS Consolidated Permits Program

I. OUTFAL	LOCATION										
			longitude of its	location to	the nearest 1	5 seconds an	d the name of	the receiving wat	ter		
	LL NUMBER		B. LATITUDE			C. LONGITUE	· · —		D. RECEIVING W	ATER (name)	
(list)	1. DEG.	2 MIN	3. SEC.	1. DEG	2 MIN	3, SEC		D. RECEIVING VI	TIER (name)	
DSNOO1		32.00 59.00 58.00 85.00 54.00 13.00 OAKTASASI CREEK									
											
·——		 				 		 			
<u></u> _						<u> </u>					
								1			
II. FLOWS	, SOURCES	OF POLLUTI	ON, AND TRE	ATMENT T	ECHNOLOGI	ES					
labeled treatm	d to corresponent units, and	nd to the more outfalls. If a	e detailed desc	criptions in It cannot be	tem B. Consti determined (e	ruct a water b	alance on the	line drawing by s	iting wastewater to the howing average flow ictorial description of	s between intakes	s, operations,
						wastewater	to the effluent	t, including proces	ss wastewater, sanita	ary wastewater, cr	ooling water,
	orm water ru								the wastewater, Co		
1. OUT-		2. OPER	ATION(S) CO	NTRIBUTIN	G FLOW				3. TREATMENT		
FALL NO. (Isst)	a.	OPERATION	\ (!ist)	b.	AVERAGE F			a. DESCRII	PTION		DES FROM E 2C-1
DSN001	COOLING TOW	ER BLOWDOWN		340,000	gpđ			ON, DECHLORINATI		2-F	2 - E
	including r	egeneration	waste water	┪						1 - F	4-A
}	from the de	mineralizer	system and						 -		
1	low volume	waste		 			 			_	
 	 						 				
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`				 			 				$\overline{}$
OFFICIAL	USE ONLY (effluent guidel	ines sub-catego	nes)		-	L				

<u> </u>	YES (complete the follow			NO (go to Se			1 = 0:		
			a DAYS PER	QUENCY			4. FLOW B. TOTAL	VOLUME	Τ
1. OUTFALL	2. OF CONTR	PERATION(s) IBUTING FLOW	WEEK (specify	b. MONTHS PER YEAR	a FLOW RA	TE (in mgd)	(specify w	th units) 2 MAXIMUM	C. DURATIO
NUMBER (list)		(hst)	average)	(specify average)	AVERAGE	DAILY	AVERAGE	DAILY	(in days)
SN001	COOLING TOWER BLO) WDOWN	7	12].1105 mgd	.209 mgd	NA	NA 	NA
. PRODUCTIO	uent guideline limitation		A under Section 304 of [he Clean Water		ur facility?			_
3. Are the limits	ations in the applicable		pressed in terms of proc	uction (or other		ration)?			
	ered "yes" to Item III-B,	list the quantity whi	ch represents an actua			production, ex	pressed in the t	erms and unit	s used in th
applicable e	ffluent guideline, and in		utfalls. DAILY PRODUCTION						
a. QUANTITY	PER DAY b. UNITS	OF MEASURE			, MATERIAL, ET	rc.		ECTED OUTF st outfall number	
treatment ed	w required by any Fed	any other environm	authority to meet any ental programs which n enforcement complianc	nay affect the di	scharges descrit	oed in this app	lication? This in	cludes, but is i	f wastewate
1 IDENTIFICA	YES (complete the following th		OUTFALLS	NO (go to lie	m IV-B)			INAL COMPL	ANCE DATI
	EMENT, ETC.			3. BRIEF	DESCRIPTION	OF PROJECT	' <u> </u>		
		a. NO. b. SOU	RCE OF DISCHARGE				a R	EQUIRED 6	PROJECTED
B. OPTIONAL: discharges) construction	you now have underwa	ional sheets descrit y or which you plan.	oing any additional wat Indicate whether each	program is now	ntrol programs (r underway or pla	or other environment, and income	ronmental proje dicate your actua	cts which ma al or planned :	y affect yo schedules f

EPA I.D. NUMBER (copy from Item 1 of Form 1)

CONTINUED FROM PAGE 2

110038370250

Use the space below to list any of	nd 4-C are included on separate sheets	numbered V-1 through V-9.	e space provided.
	the pollutants listed in Table 2c-3 of the	e instructions, which you know or have reason to bu believe it to be present and report any analytic	believe is discharged or may be discha
1. POLLUTANT	2. SOURCE	1. POLLUTANT	2. SOURCE
OTENTIAL DISCHARGES NOT O			
		which you currently use or manufacture as an inte NO (go to Item VI-B)	ermediate or final product or byproduct?
YES (list all such pollute	mis below)	NO (go to Hem VI-B)	
E BELIEVED TO BE PRESE	INT		

Do you have any knowledge or reason to believe that any biol relation to your discharge within the last 3 years? YES (identify the test(s) and describe their purpose Part 1.A of NPDES Permit number ALOUTETS toxicity is performed on Cernodaphnia as performed on Cernodaphnia as VIII CONTRACT ANALYSIS INFORMATION Were any of the analyses reported in Item V performed by a company of the analyses reported in Item V perfor	es below) 34 reguires toxícit	NO (go to Section P	uı,
VIH CONTRACT ANALYSIS INFORMATION Were any of the analyses reported in Item V performed by a c	34 reguires toxicit		
VIII CONTRACT ANALYSIS INFORMATION Were any of the analyses reported in Item V performed by a c		y testing to be conducted	d twice a year. (hronic
Were any of the analyses reported in Item V performed by a c			
Were any of the analyses reported in Item V performed by a c			
■ I YES that the name, address, and telephone number	·		
cach such laboratory or firm below} A NAME	B. ADDRESS	C. TELEPHONE	D. POLLUTANTS ANALYZEC
TT1, INC. 3516 GREENSI 9.6. DRAWER		(area code & na.) 205-34-0616	CH AND GREATE, TOP METATAL MORY, STEATURE, MERCURY, ASTANDAS, GRESTONAL TREOPERF, TYAN STEATURE, ASMONIA AS A, KITTRITE STEBALE AS B, TOTAL SOLFTE, TOTAL RECOVERABLE PRESCRIPTO, POLS, COE, ORGANIC CARBON SUFACIANTS

I certify under penalty of law that this document and all attachments were prepared under my di	irection or supervision in accordance with a system designed to assure the
qualified personnel properly gather and evaluate the information submitted. Based on my inc	quiry of the person or persons who manage the system or those person
directly responsible for gathering the Information, the information submitted is, to the best of my	r knowledge and bolief, truo, accurate, and complete. I am aware that their
are significant penalties for submitting false information, including the possibility of fine and impr	isonment for knowing violations.
A. NAME & OFFICIAL TITLE (type or print)	B. PHONE NO. (area code & no)
1	

DAVID GORDON, PLANI MANAGER	(/5t) 215 1.22
C. SIGNATURE D-RJ	D. DATE SIGNED ////4//3

PLEASE PRINT OR TYPE IN THE UNSHADED AREAS ONLY. You may report some or all of this information on separate sheets (use the same format) instead of completing these pages.

EPA I.D. NUMBER (copy from Item 1 of Form 1)

SEE INSTRUCTI	ONS.	_	_				11100363	70230						
V. INTAKE AND	EFFLUE	NT CHARAC	TERISTICS (contin	nued from page	3 of Form 2-C)								UTFALL NO.	
PART A -You m	nust provi	de the results	of at least one ana	llysis for every p	pollutant in this table	e. Complete on	e table for each ou	tfall. See instr	uctions for add	ditional details.				
					2, EFFLUI	 FNT				3. UN (specify if			INTAKE	
		a, MAXIMU	M DAILY VALUE		M 30 DAY VALUE		G TERM AVRG. V (if available)	ALUE				a. LONG TE AVERAGE V	RM	L NO 05
1. POLLUTA	ANT	(1) CONCENTRAT	TION (2) MASS	(1) CONCENTRAT	ION (2) MASS	(1) CONCE	NTRATION	(2) MASS	d. NO. OF ANALYSES	a. CONCEN- TRATION	b. MASS	(1) CONCENTRATION	(2) MASS	b, NO. OF ANALYSES
a. Biochemical (Demand (BOD)	Oxygen	2.9	5.37						1	mg/L	lbs/d			
b. Chemical Oxy Demand (COD)	/gen	ND	ND						1	mg/L	lbs			
c. Total Organic (TOC)	Carbon	20.7	38.32				_		1	mg/L	lbs			
d. Total Suspend Solids (TSS)	ded	9.77	18.09					_	1	mg/L	lbs			
e, Ammonia (as	N)	0.78	1.44						1	mg/L	lbs			
f. Flow		VALUE 0.:	34 MGD	VALUE 0.2	21 MGD	VALUE	- -					VALUE		
g. Temperature (winter)		VALUE 2	4.16	VALUE		VALUE				°C		VALUE		
h. Temperature (summer)		VALUE	32.2	VALUE		VALUE				•c		VALUE		
i. pH		MINIMUM 6 , 7	MAXIMUM	MINIMUM	MAXIMUM					STANDAR	D UNITS	:		
dire	ctly, or in	directly but e	xpressly, in an effi	uent limitations		st provide the	results of at least	one analysis	for that pollut	ant. For other p	oliutants for	olumn 2a for any politi which you mark coli		
	2. N	IARK "X"				. EFFLUENT				4.1	UNITS	5. IN	TAKE (opnone	al)
1, POLLUTANT AND	a.	Ъ.	a. MAXIMUM D	AILY VALUE	b. MAXIMUM 30 (if or aile		c. LONG TERM (if avai		}			a. LONG TERM VALU		
CAS NO. (if available)	BELIEVE PRESEN	D BELIEVED	(1) CONCENTRATION		(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION		d, NO, O ANALYSE			(1)	1	b. NO. OF ANALYSES
a. Bromide (24959-67-9)		X						,,,						,
b. Chlorine, Total Residual	X		0.18	0.333					1	mg/L	lbs/	d		
c. Color		TX												
d. Fecal Coliform		X												
e. Fluoride (16984-48-8)	X		5.24	9.69					1	mg/L	lbs/	d		
f. Nitrate-Nitrite (as N)	X		2.15	3.99					1	mg/L	lbs/	d		

ITEM V-B CONTINUED FROM FRONT

ITEM V-B CONT	2. MAI					EFFLUENT				4. UNI	re	5 (NT	AKE (optiona	<i>i</i>)
1. POLLUTANT					b. MAXIMUM 30		c. LONG TERM A	/RG. VALUE		4, 0(1)	-	a. LONG TE		
AND CAS NO.	a. BELIEVED	b,	a. MAXIMUM DA	AILY VALUE	(1f availa		(if availul		d. NO. OF	- CONCEN		AVERAGE V		b. NO. OF
(ıf available)	PRESENT	BELIEVED ABSENT	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	ANALYSES	a. CONCEN- TRATION	b. MASS	(1) CONCENTRATION	(2) MASS	ANALYSES
g. Nitrogen, Total Organic (<i>as</i> <i>N</i>)	X	,	2.28	4.22	1	(2) 111100	CONCENTIANON	(2) ##/400	1	mg/L	lbs/d	CONCENTION	(2) 1111 (5)	
h. Oil and Grease	X		1.1	2.04					1	mg/L	lbs/d			
i. Phosphorus (as P), Total (7723-14-0)	X		2.15	3.99				-	1	mg/L	lbs/d			
j. Radioactivity														
(1) Alpha, Total		X												
(2) Beta, Total		X											_	_
(3) Radium, Total		X												
(4) Radium 226, Total		X	- -											
k. Sulfate (as SO ₄) (14808-79-8)	X		222.06	411.10					1	mg/L	lbs/d			
I. Sulfide (as S)		X												
m. Sulfite (as SO ₃) (14265-45-3)	X		3	5.554					1	mg/L	lbs/d			
n. Surfactants	_	\times				-		_						
o. Aluminum, Total (7429-90-5)	X		0.18	0.34				_	1	mg/L	lbs/d			:
p. Barium, Total (7440-39-3)	X		0.10	0.19					1	mg/L	lbs/d			
q. Boron, Total (7440-42-8)	X		3.72	6.88					1	mg/L	lbs/d		-	
r. Cobalt, Total (7440-48-4)		X								 				
s. Iron, Total (7439-89-6)	X		0.29	0.53					1	mg/L	lbs/d		-	
t. Magnesium, Total (7439-95-4)	X		9.60	17.76					1	mg/L	lbs/d			
u. Molybdenum. Total (7439-98-7)	X		0.01	0.01					1	mg/L	lbs/d			
v. Manganese, Total (7439-96-5)	×		0.16	0.30					1	mg/L	lbs/d			
w. Tin, Total (7440-31-5)		X												
x. Titanium, Total (7 440 -32-6)		X												

EPA I.D. NUMBER (copy from Item I of Form I)	OUTFALL NUMBER	
110038370250	DSN001	

CONTINUED FROM PAGE 3 OF FORM 2-C

PART C - If you are a primary industry and this outfall contains process wastewater, refer to Table 2c-2 in the instructions to determine which of the GC/MS fractions you must test for. Mark "X" in column 2-a for all such GC/MS fractions that apply to your industry and for ALL toxic metals, cyanides, and total phenols. If you are not required to mark column 2-a (secondary industries, nonprocess wastewater outfalls, and nonrequired GC/MS fractions), mark "X" in column 2-b for each pollutant you know or have reason to believe is present. Mark "X" in column 2-b for each pollutant you waste column 2b for any pollutant, you must provide the results of at least one analysis for that pollutant if you mark column 2b for acrolein, acrylonitrile, 2,4 dinitrophenol, or 2-methyl-4, 6 dinitrophenol, you must provide the results of at least one analysis for each of these pollutants which you know or have reason to believe that you discharge in concentrations of 100 ppb or greater. Otherwise, for pollutants for which you mark column 2b, you must either submit at least one analysis or briefly describe the reasons the pollutant is expected to be discharged. Note that there are 7 pages to this part; please review each carefully. Complete one table (all 7 pages) for each outfall. See instructions for additional details and requirements.

		id requirement. MARK "X"				2 =	FFLUENT				4. UN	TE	5 INITA	KE (option	<u></u>
1. POLLUTANT AND CAS NUMBER	a.	b.	C.	a. MAXIMUM DAI	_	b, MAXIMUM 30 I (if availai	DAY VALUE	c, LONG TERM VALUE (if ava		4 NO OE	a. CONCEN-		a. LONG TO AVERAGE V	ERM	b. NO. OF
(if available)	REQUIRED	BELIEVED PRESENT	ABSENT	(1) CONCENTRATION	(2) MASS_	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	ANALYSES		b. MASS	(1) CONCENTRATION	(2) MASS	1
METALS, CYANIDI	, AND TOT	AL PHENO	LS												
1M. Antimony, Total (7440-36-0)	X	\times _		0.013	0.02					1	mg/L	lbs/d			
2M. Arsenic, Total (7440-38-2)	X	X		0.00	0.01			_		1	mg/L	lbs/d			
3M. Beryllium, Total (7440-41-7)	X		X	<0.001	_					1	mg/L				
4M. Cadmium, Total (7440-43-9)	X	_	X	<0.001						1	mg/L				
5M. Chromium, Total (7440-47-3)	X		X	<0.050	_		<u> </u>			1	mg/L				
6M. Copper, Total (7440-50-8)	X		X	<0.050				_		1	mg/L			_	
7M, Lead, Total (7439-92-1)	X		X	<0.005				_		1	mg/L				
8M. Mercury, Total (7439-97-6)	X		X	<0.001						1	mg/L			_	
9M. Nickel, Total (7440-02-0)	X		X	<0.050				_		1	mg/L				
10M. Selenium, Total (7782-49-2)	X		X	<0.005						1	mg/L				
11M. Silver, Total (7440-22-4)	X		X	<0.001				_		1	mg/L		_		
12M. Thallium, Total (7440-28-0)	X		X	<0.001						1	mg/L				
13M. Zinc, Total (7440-66-6)	X	X		0.00	0.001				_	1	mg/L	lbs/d			
14M. Cyanide, Total (57-12-5)	X		X	<0.010	-					1	mg/L				
15M. Phenois, Total	X		X	<0.10	-					1	mg/L				
DIOXIN						-							-		
2,3,7,8-Tetra- chlorodibenzo-P- Dioxin (1764-01-6)			$\overline{\mathbf{X}}$	DESCRIBE RESU	LTS										

CONTINUED FROM THE FRONT

	2	2. MARK "X"	,	L		_ 3. E	FFLUENT				4. UNI	ITS	5. INTA	KE (optiona	1)
1. POLLUTANT AND				a. MAXIMUM DAI	LV VALUE	b. MAXIMUM 30 E		c. LONG TERM VALUE (if ma					a. LONG TI AVERAGE V		
CAS NUMBER (ıf available)	TESTING REQUIRED	b. BELIEVED PRESENT	BELIEVED ABSENT	(1) CONCENTRATION		(1) CONCENTRATION	(2) MASS	(1)	· •	d. NO. OF ANALYSES	a. CONCEN- TRATION	b. MASS	(1)		b. NO. OF ANALYSES
GC/MS FRACTION	– VOLATIL	E COMPO	JNDS	<u></u>											
1V. Accrolein (107-02-8)	X		X	<0.100						1	mg/L				
2V, Acrylonitrile (107-13-1)	X		X	<0.100						1	mg/L				
3V. Benzene (71-43-2)	X		X	<0.005		-				1	mg/L				
4V. Bis (Chloro- methyl) Ether (542-88-1)	X		X	<0.100						1	mg/L	_			
5V. Bromoform (75-25-2)	X		X	<0.005			-			1	mg/L				
6V. Carbon Tetrachloride (56-23-5)	X		X	<0.005						1	mg/L				
7V. Chlorobenzene (108-90-7)	X		X	<0.005						1	mg/L				
8V. Chlorodi- bromomethane (124-48-1)	X		X	<0.005						1	mg/L				
9V. Chloroethane (75-00-3)	X		X	<0.010						1	mg/L				
10V. 2-Chloro- ethylvinyl Ether (110-75-8)	X		X	<0.010						1	mg/L				
11V. Chloroform (67-66-3)	X	X		0.00	0.00				_	1	mg/L	lbs/d			
12V. Dichloro- bromomethane (75-27-4)	X		X	<0.005						1	mg/L				
13V. Dichloro- difluoromethane (75-71-8)	X		X	<0.010						1	mg/L				
14V. 1,1-Dichloro- ethane (75-34-3)	$_{X}$		X	<0.005						1	mg/L				
15V. 1,2-Dichloro- ethane (107-06-2)	X		X	<0.005						1	mg/L				
16V. 1,1-Dichloro- ethylene (75-35-4)	\times		X	<0.005						1	mg/L				
17V. 1,2-Dichloro- propane (78-87-5)	X		X	<0.005						1	mg/L				
18V. 1,3-Dichloro- propylene (542-75-6)	X		X	<0.005						1	mg/L				
19V. Ethylbenzene (100-41-4)	X		X	<0.005						1	mg/L				
20V. Methyl Bromide (74-83-9)	X		X	<0.010						1	mg/L				
21V. Methyl Chloride (74-87-3)	X		X	<0.005						1	mg/L				

CONTINUED FROM PAGE V-4

CONTINUED PROF		MARK "X	,				FFLUENT				4. UNI	ITS		KE (optiona	Ŋ
1, POLLUTANT AND	a.	b.	C.	a, MAXIMUM DAI	ILY VALUE	b. MAXIMUM 30 I		c. LONG TERM VALUE (if ava					a, LONG TE AVERAGE V	ALUE	
CAS NUMBER (if available)	TESTING	BELIEVED PRESENT	BELIEVED ABSENT	(1) CONCENTRATION		(1) CONCENTRATION		(1) CONCENTRATION	(2) MASS	d. NO. OF ANALYSES	a. CONCEN- TRATION	b. MASS	(1) CONCENTRATION	(2) MASS	b. NO. OF ANALYSES
GC/MS FRACTION	- VOLATIL	E COMPO			<u> </u>		(=)	<u></u>	(4)						
22V. Methylene Chloride (75-09-2)	X		X	<0.005						1	mg/L				
23V. 1,1,2,2- Tetrachloroethane (79-34-5)	X		X	<0.005						1	mg/L				
24V. Tetrachloro- ethylene (127-18-4)	X		X	<0.005						1	mg/L_				
25V. Toluene (108-88-3)	X		\perp X	<0.005						1	mg/L				
26V. 1,2-Trans- Dichloroethylene (156-60-5)	X		X	<0.005						1	mg/L				
27V. 1,1,1-Trichloro- ethane (71-55-6)	X		X	<0.005						1	mg/L				
28V. 1,1,2-Trichloro- ethane (79-00-5)	X		X	<0.005						1	mg/L				
29V Trichloro- ethylene (79-01-6)	X		X	<0.005						1	mg/L				
30V. Trichloro- fluoromethane (75-69-4)	X		X	<0.010						1	mg/L				
31V. Vinyl Chloride (75-01-4)	X		X	<0.002						1	mg/L				
GC/MS FRACTION	- ACID CO	MPOUNDS	<u> </u>												
1A. 2-Chlorophenol (95-57-8)	X		X	<0.010						1	mg/L				_
2A, 2,4-Dichloro- phenol (120-83-2)	$_{X}$		X	<0.010						1	mg/L				
3A. 2,4-Dimethyl- phenol (105-67-9)	X		X	<0.010						1	mg/L				
4A. 4,6-Dinitro-O- Cresol (534-52-1)	X		X	<0.052						1	mg/L				
5A, 2,4-Dinitro- phenol (51-28-5)	X	<u></u>	X	<0.052						1	mg/L				
6A, 2-Nitrophenol (88-75-5)	X		X	<0.010						1	mg/L				
7A. 4-Nitrophenol (100-02-7)	X		X	<0.052						1	mg/L				
8A. P-Chloro-M- Cresol (59-50-7)	X		X	<0.010						1	mg/L				
9A. Pentachloro- phenol (87-86-5)	X		X	<0.026						1	mg/L				
10A. Phenol (108-95-2)	X		X	<0.010						1	mg/L				
11A. 2,4,6-Trichloro- phenol (88-05-2)	X		X	<0.010						1	mg/L				
EDA Form 2510 20							DACI								LDEVERSE

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	_	2. MARK "X"	•			3. E	FFLUENT				4. UN	ITS	5. INT A	KE (optiona	1)
1. POLLUTANT AND				a. MAXIMUM DA		b. MAXIMUM 30 E	DAY VALUE	c. LONG TERM VALUE (if ava	AVRG.				a. LONG T	ERM .	
CAS NUMBER	a. TESTING REQUIRED	b. BELIEVED PRESENT	c. BELIEVED ABSENT	(1) CONCENTRATION		(if availab	_ _	(1) CONCENTRATION	(2) MASS	d. NO. OF ANALYSES	a. CONCEN- TRATION	b. MASS	(1) CONCENTRATION		b, NO. OF ANALYSES
GC/MS FRACTION	- BASE/NE	UTRAL CO	MPOUND	s	-										
1B. Acenaphthene (83-32-9)	X		X	<0.010						1	mg/L			_	
2B. Acenaphtylene (208-96-8)	X		X	<0.010						1	mg/L				
3B, Anthracene (120-12-7)	$X_{\underline{}}$		X	<0.010						1	mg/L				
4B. Benzidine (92-87-5)	X		X	<0.052						1	mg/L				
5B. Benzo (a) Anthracene (56-55-3)	\times		X	<0.010		_				1	mg/L		!		
6B. Benzo (a) Pyrene (50-32-8)	X		X	<0.010			-			1	mg/L				
7B. 3,4-Benzo- fluoranthene (205-99-2)	×		X	<0.010						1	mg/L				
8B. Benzo (ghi) Perylene (191-24-2)	X		X	<0.010						1	mg/L				
9B. Benzo (k) Fluoranthene (207-08-9)	X		X	<0.010						1	mg/L				
10B. Bis (2-Chloro- ethoxy) Methane (111-91-1)	X		X	<0.010						1	mg/L				
11B. Bis (2-Chloro- ethyl) Ether (111-44-4)	X		X	<0.010						1	mg/L				
12B. Bis (2- Chloroisopropyl) Ether (102-80-1)	X		X	<0.010			_			1	mg/L				
13B. Bis (2-Ethyl- hexyl) Phthalate (117-81-7)	X		X	<0.010						1	mg/L				
14B, 4-Bromophenyl Phenyl Ether (101-55-3)	X		X	<0.010						1	mg/L				
15B. Butyl Benzyl Phthalate (85-68-7)	X		X	<0.010						1	mg/L				
16B, 2-Chloro- naphthalene (91-58-7)	\times		X	<0.010						1	mg/L				
17B. 4-Chloro- phenyl Phenyl Ether (7005-72-3)	X		X	<0.010						1	mg/L				
18B. Chrysene (218-01-9)	X		X	<0.010						1	mg/L				
19B. Dibenzo (a.h) Anthracene (53-70-3)	X		X	<0.010						1	mg/L				
20B. 1,2-Dichlero- benzene (95-50-1)	X		X	<0.005						1	mg/L				
21B. 1,3-Di-chloro- benzene (541-73-1)	X		X	<0.005						1	mg/L				

CONTINUED FROM PAGE V-6

		MARK "X"	,				FFLUENT				4. UN	ITS		KE (optiona	u()
1. POLLUTANT AND		b	C.	a. MAXIMUM DA	LY VALUE	b. MAXIMUM 30 [DAY VALUE	c. LONG TERM VALUE (if ava					a. LONG TI AVERAGE V	ERM ALUE	
CAS NUMBER (if available)	TESTING REQUIRED	BELIEVED	BELIEVED ABSENT	(1) CONCENTRATION		(1)	(2) MASS	(1) CONCENTRATION		d. NO. OF ANALYSES	a. CONCEN- TRATION	b. MASS	(1) CONCENTRATION	(2) MASS	b. NO. OF ANALYSES
GC/MS FRACTION	I – BASE/N	EUTRAL CO	DMPOUND		(=) ////	<u></u>	(2)	<u></u>	(2) 1011 100					<u> </u>	
22B. 1,4-Dichloro- benzene (106-46-7)	X		X	<0.005						1	mg/L			_	
23B. 3,3-Dichloro- benzidine (91-94-1)	X		X	<0.021						1	mg/L	_			
248, Diethyl Phthalate (84-66-2)	X		X	<0.010					_	1	mg/L	_	_		
25B. Dimethyl Phthalate (131 -11-3)	X		X	<0.010						1	mg/L				
26B. Di-N-Butyl Phthalate (84-74-2)	X		X	<0.010						1	mg/L				
27B, 2,4-Dinitro- toluene (121-14-2)	X		X	<0.010						1	mg/L				
28B. 2,6-Dinitro- toluene (606-20-2)	\overline{X}		X	<0.010					_	1	mg/L				
29B. Di-N-Octyl Phthalate (117-84-0)	X		X	<0.010						1	mg/L	_			
30B. 1,2-Diphenyl- hydrazine (as Azo- benzene) (122-66-7)	X		X	<0.052						1	mg/L				
31B. Fluoranthene (206-44-0)	\times		X	<0.010						1	mg/L				
32B, Fluorene (86-73-7)	X		X	<0.010						1	mg/L				
33B. Hexachloro- benzene (118-74-1)	$X_{}$		X	<0.010						1	mg/L				
34B. Hexachloro- butadiene (87-68-3)	_X		X	<0.010						1	mg/L				
35B, Hexachloro- cyclopentadiene (77-47-4)	\times		X	<0.010						1	mg/L				
36B Hexachloro- ethane (67-72-1)	\times		X	<0.010					_	1	mg/L				
37B. Indena (1,2,3-cd) Pyrene (193-39-5)	X		X	<0.010						1	mg/L		_		
38B. Isophorone (78-59-1)	X		X	<0.010						1	mg/L		<u></u>		
39B. Naphthalene (91-20-3)	X		X	<0.010						1	mg/L				
40B. Nitrobenzene (98-95-3)	X		X	<0.010						1	mg/L				
41B. N-Nitro- sodimethylamine (62-75-9)	X		X	<0.010						1	mg/L				
42B. N-Nitrosodi- N-Propylamine (621-64-7)	X		X	<0.010						1	mg/L				

CONTINUED FROM THE FRONT

	2	. MARK "X"					FFLUENT				4. UN	ITS		KE (optiona	/)
1. POLLUTANT AND	a.	b.	C.	a. MAXIMUM DAI	LY VALUE	b. MAXIMUM 30 I	ble)	VALUE (if and	ulable)_				a. LONG TI AVERAGE V	RM ALUE	
CAS NUMBER (ıf avaılable)	TESTING REQUIRED	BELIEVED PRESENT	BELIEVED ABSENT	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS		a. CONCEN- TRATION	b. MASS	(1) CONCENTRATION	(2) MASS_	b. NO. OF ANALYSES
GC/MS FRACTION	- BASE/NE	UTRAL CO	MPOUND	S (continued)		<u> </u>									
43B. N-Nitro- sodiphenylamine (86-30-6)	X		X	<0.010	_	_				1	mg/L				
44B. Phenanthrene (85-01-8)	X		X	<0.010						1	mg/L				
45B. Pyrene (129-00-0)	X		X	<0.010						1	mg/l				
46B. 1,2,4-Tri- chlorobenzene (120-82-1)	X	_	X	<0.010						1	MG/1				
GC/MS FRACTION	~ PESTIC	DES													
1P. Aldrin (309-00-2)			X												
2P. α-BHC (319-84-6)			X												
3P. β-BHC (319-85-7)			X												
4P. γ-BHC (58-89-9)			X												
5P. &-BHC (319-86-8)			X												
6P. Chlordane (57-74-9)			X												
7P. 4,4'-DDT (50-29-3)			X												
8P. 4,4'-DDE (72-55-9)			X	_											
9P. 4,4'-DDD (72-54-8)			X												
10P. Dieldrin (60-57-1)			X								_				
11P. α-Enosulfan (115-29-7)			X												
12Р. β-Endosulfan (115-29-7)	_		X												
13P, Endosulfan Sulfate (1031-07-8)			X												
14P. Endrin (72-20-8)			X												
15P. Endrin Aldehyde (7421-93-4)			X												
16P. Heptachlor (76-44-8)			X												

EPA I.D. NUMBER (copy from Item 1 of Form 1)

OUTFALL NUMBER

CONTINUED FROM PAGE V-8

110038370250

DSN001

DOM: INCOLO : TO				1	_		CCI LICAT				4 (18)	ITC.	C INIT	VE /	
		2. MARK "X					FFLUENT				4. UN	118		KE (optiona	<i>i</i>)
1. POLLUTANT AND CAS NUMBER	a.	b.	c.	a. MAXIMUM DA	ILY VALUE	b. MAXIMUM 30 [(if availal		c. LONG TERM VALUE (if ava		d. NO. OF	a. CONCEN-		a. LONG T AVERAGE V		ь. NO. OF
(if available)	REQUIRED	BELIEVED PRESENT	BELIEVED ABSENT	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	ANALYSES		b. MASS	(1) CONCENTRATION	(2) MASS	ANALYSES
GC/MS FRACTION	I – PESTICI	DES (contin	ned)												
17P. Heptachlor Epoxide (1024-57-3)			X												
18P. PCB-1242 (53469-21-9)			X												
19P. PCB-1254 (11097-69-1)			X												
20P. PCB-1221 (11104-28-2)			X												
21P. PCB-1232 (11141-16-5)			X						_						
22P. PCB-1248 (12672-29-6)			X												
23P. PCB-1260 (11096-82-5)			X												
24P. PCB-1016 (12674-11-2)			X												
25P. Toxaphene (8001-35-2)			X												

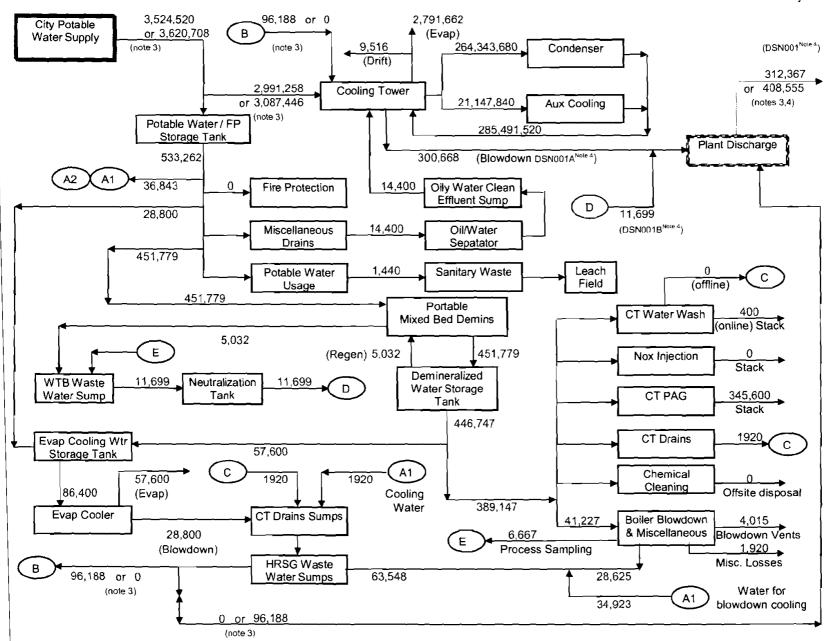
EPA Form 3510-2C (8-90)

CONSTELLATION ENERGY Hillabee Energy Center

12 Hrs Peak / 4 Hrs Off-Peak / 8 Hrs off - 10 Cycles (Peak=100% Load With EC,PAG,DF Off-Peak=100% Load With EC Only)

Calc. No.: M-WB-MC1 Rev. B Page No. A8

Project No.: 12251-200



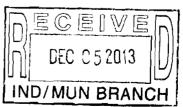
- 1) Flows are in gallons per day unless otherwise indicated.
- 2) Stormwater detention pond not required.
- 3) The first water usage value shown is based on recovering HRSG wastewater sump pumpage for use as tower makeup.
- 4) Permit designation.

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT APPLICATION SUPPLEMENTARY INFORMATION

ALABAMA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT WATER DIVISION – INDUSTRIAL / MINING PERMIT SECTION POST OFFICE BOX 301463 MONTGOMERY, ALABAMA 36130-1463

INSTRUCTIONS: APPLICATIONS SHOULD BE TYPED OR PRINTED IN INK AND SUBMITTED TO THE DEPARTMENT IN DUPLICATE. IF INSUFFICIENT SPACE IS AVAILABLE TO ADDRESS ANY ITEM, PLEASE CONTINUE ON AN ATTACHED SHEET OF PAPER. PLEASE MARK N/A IN THE APPROPRIATE BOX WHEN AN ITEM IS NON-APPLICABLE TO THE APPLICANT.

	NON-APPLICABLE TO THE APPLICANT.								
=	PURPOSE OF THIS APPLICATION								
<u> </u>	_ INITIAL PERMIT APPLICATION FOR NEW FACILITY INITIAL PERMIT APPLICATION FOR EXISTING FACILITY								
· 🗸	MODIFICATION OF EXISTING PERMIT REISSUANCE OF EXISTING PERMIT								
<u>-</u>	REVOCATION & REISSUANCE OF EXISTING PERMIT								
1.	Facility Name: CER GENERATION, LLC								
	a. Operator Name: CER GENERATION, LLC								
	b. Is the operator identified in 1.a., the owner of the facility? Yes Vo. No. If no, provide the name and address of the operator and submit information indicating the operator's scope of responsibility for the facility.								
2.	NPDES Permit Number AL 0 0 7 3 7 8 4								
3.	SID Permit Number (if applicable): IU								
4.	NPDES General Permit Number (if applicable) ALG 2 5 0 0 8 0								
5.	Facility Physical Location: (Attach a map with location marked; street, route no. or other specific identifier)								
	Street: 152 BRICK PLANT ROAD								
	City: ALEXANDER CITY County: TALLAPOOSA State: AL Zip: 35010								
	Facility (Front Gate) Latitude: 33-0-14 N Longitude: 85-54-17 W								
6.	Facility Mailing Address (Street or Post Office Box): 152 BRICK PLANT ROAD								
	City: ALEXANDER CITY State: AL Zip: 35010								
	DECEIVED!								



7.	Responsible Official (as described on page 13 of this	application):				
	Name and Title: Gerome Randle, Vice President SouthWes	t Regions			· · · · · · · · · · · · · · · · · · ·	
	Address: 325 N Saint Paul Street, Suite 2650					
	City: Dallas	State: _	тх	Zip:	75201	
	Phone Number: 972-813-6164					
	EMAIL Address: Gerome.Randle3@exeloncorp.com				<u> </u>	
8.	Designated Facility Contact:					
	Name and Title: David Gordon, Plant Manager					
	256 245 7400					
	EMAIL Address: David.Gordon@constellation.com		- 			
9.	Designated Discharge Monitoring Report Contact:					
	Name and Title: David Gordon, Plant Manager		_ 			
	Phone Number: 256-215-7122					
	EMAIL Address: David.Gordon@constellation.com					
10.	Type of Business Entity:					
	Corporation General Partnership	Limited Partn	ership			
	Sole Proprietorship Other (Please Spec	ify)				
11.	Complete this section if the Applicant's business ent	ity is a Corpora	ation			
	a) Location of Incorporation:					
	Address: 1005 BRANDON SHORES ROAD					
	City BALTIMORE County: NA		State MD_		Zip: 21226	
	b) Parent Corporation of Applicant:					
	Name: CER Generation, LLC					
	Address: 100 CONSTELLATION WAY					
		e: MD		Zip:	21202	

Address:		
City:	State:	Zip:
d) Corporate Officers:		
Name: NA		
City:	State:	Zip:
Name:		
City:	State:	Zip:
,	rporation for purposes of service:	
Name: David Gordon	·	
Name: David Gordon Address: 152 Brick Plant Road		
Name: David Gordon Address: 152 Brick Plant Road City: Alexander City If the Applicant's business entity	State: ^{AL} vis a Partnership, please list the general	Zip: 35010 partners.
Name: David Gordon Address: 152 Brick Plant Road City: Alexander City If the Applicant's business entity Name: NA	State: AL	Zip: 35010 partners.
Name: David Gordon Address: 152 Brick Plant Road City: Alexander City If the Applicant's business entity Name: NA Address:	State: AL vis a Partnership, please list the general	Zip: 35010 partners.
Name: David Gordon Address: 152 Brick Plant Road City: Alexander City If the Applicant's business entity Name: NA Address: City:	State: AL vis a Partnership, please list the general State: State:	Zip: 35010 partners. Zip: 2ip:
Name: David Gordon Address: 152 Brick Plant Road City: Alexander City If the Applicant's business entity Name: NA Address: City: Name: NA	State: AL vis a Partnership, please list the general	Zip: 35010 partners. Zip:

Name: NA			_
Address:		·	
City:	State:	Zip:	
Permit numbers for Applicant's prev Environmental Permits presently hel State of Alabama:		and identification of any other State of orporation, or subsidiary corporations v	
<u>Permit Name</u>	Permit Number	Held By	
NPDES NON-MAJOR	AL0073784	CER GENERATION, LLC	
NPDES NON-MAJOR	ALG250080	CER GENERATION, LLC	
NPDES CONSTRUCTION STORMWATER	ALR160524	CER GENERATION, LLC	
concerning water pollution, if any, ag State of Alabama within the past five	gainst the Applicant, its parent or years (attach additional sheets	corporation or subsidiary corporations v	
concerning water pollution, if any, ag State of Alabama within the past five Facility Name	gainst the Applicant, its parent or years (attach additional sheets	corporation or subsidiary corporations with if necessary): e of Action Date of Action	vithin t
concerning water pollution, if any, ag State of Alabama within the past five Facility Name	gainst the Applicant, its parent of years (attach additional sheets) Permit Number Type	corporation or subsidiary corporations with if necessary): e of Action Date of Action	vithin tl
State of Alabama within the past five Facility Name NA	gainst the Applicant, its parent of years (attach additional sheets) Permit Number Type	corporation or subsidiary corporations with necessary): e of Action Date of Action Date of Action	vithin th
concerning water pollution, if any, ag State of Alabama within the past five Facility Name NA ECTION B – BUSINESS ACTIVITY	gainst the Applicant, its parent of years (attach additional sheets) Permit Number Type Al Classification (SIC) Codes for	corporation or subsidiary corporations vin necessary): e of Action Date of Action	vithin th
concerning water pollution, if any, ag State of Alabama within the past five Facility Name NA ECTION B – BUSINESS ACTIVITY Indicate applicable Standard Industria	gainst the Applicant, its parent of years (attach additional sheets) Permit Number Type Al Classification (SIC) Codes for	corporation or subsidiary corporations vin necessary): e of Action Date of Action	vithin th
concerning water pollution, if any, ag State of Alabama within the past five Facility Name NA ECTION B – BUSINESS ACTIVITY Indicate applicable Standard Industria (If more than one applies, list in contents)	gainst the Applicant, its parent of years (attach additional sheets) Permit Number Type Al Classification (SIC) Codes for	corporation or subsidiary corporations vin necessary): e of Action Date of Action	vithin th
Concerning water pollution, if any, ac State of Alabama within the past five Facility Name NA ECTION B – BUSINESS ACTIVITY Indicate applicable Standard Industria (If more than one applies, list in case).	gainst the Applicant, its parent of years (attach additional sheets) Permit Number Type Al Classification (SIC) Codes for	corporation or subsidiary corporations vin necessary): e of Action Date of Action	vithin th
State of Alabama within the past five Facility Name NA SECTION B – BUSINESS ACTIVITY Indicate applicable Standard Industria (If more than one applies, list in case) a. 4911 b	gainst the Applicant, its parent of years (attach additional sheets) Permit Number Type Al Classification (SIC) Codes for	corporation or subsidiary corporations vin necessary): e of Action Date of Action	vithin th

ADEM Form 187 01/10 m3 Page 4 of 14

2. If your facility conducts or will be conducting any of the processes listed below (regardless of whether they generate wastewater, waste sludge, or hazardous waste), place a check beside the category of business activity (check all that apply):

Industrial Categories

ſ	1	Aluminum Forming	Γ	1	Metal Molding and Casting
i	í	Asbestos Manufacturing	i	i	Metal Products
i	i	Battery Manufacturing	i	î	Nonferrous Metals Forming
i	i	Can Making	i	í	Nonferrous Metals Manufacturing
i	í	Canned and Preserved Fruit and Vegetables	i	í	Oil and Gas Extraction
i	í	Canned and Preserved Seafood	i	i	Organic Chemicals Manufacturing
i	í	Cement Manufacturing	i	í	Paint and Ink Formulating
ŗ	í	Centralized Waste Treatment	i	í	Paving and Roofing Manufacturing
i	i	Carbon Black	i	i	Pesticides Manufacturing
ì	i	Coal Mining	i	í	Petroleum Refining
ľ	i	Coil Coating	ŗ	í	Phosphate Manufacturing
ľ	í	Copper Forming	i	i	Photographic
i	í	Electric and Electronic Components Manufacturing	i	i	Pharmaceutical
ì	i	Electroplating	í	i	Plastic & Synthetic Materials
ŗ	í	Explosives Manufacturing	ŗ	í	Plastics Processing Manufacturing
i	i	Feedlots	1	i	Porcelain Enamel
ļ	i	Ferroalloy Manufacturing	ŗ	1	Pulp, Paper, and Fiberboard Manufacturing
ŗ	1	Fertilizer Manufacturing	ľ	1	Rubber
I I	i	Foundries (Metal Molding and Casting)	ļ	í	Soap and Detergent Manufacturing
ľ	1	Glass Manufacturing	l [/	i	Steam and Electric
ľ	1	Grain Mills	1	1	Sugar Processing
L	1	Gum and Wood Chemicals Manufacturing	I I	i	Textile Mills
L T) 1	Inorganic Chemicals	ľ]	Timber Products
L	ļ	Iron and Steel	Į.	J 1	Transportation Equipment Cleaning
Ĺ	J 1	Leather Tanning and Finishing	I I	J T	Waste Combustion
Ĺ	J 1		L L	J I	
Ĺ	J 1	Metal Finishing Meat Products	ι	1	Other (specify)
L	J	Mear Froducts			

A facility with processes inclusive in these business areas may be covered by Environmental Protection (EPA) categorical standards. These facilities are termed "categorical users" and should skip to question 2 of Section C.

i.	Give a brief description of all operations at this facility including primary products or services (attach additional sheets if necessary):
	NATURAL GAS FIRED STEAM ELECTRIC POWER GENERATION FACILITY PROMOTING ECONOMIC GROWTH BY PROVIDING 700
	MEGA-WATTS OF ELECTRICITY TO THE GENERAL PUBLIC. THE PLANT CONSISTS OF TWO GAS TURBINE GENERATING UNITS AND
	ONE STEAM TURBINE GENERATING UNIT.

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SECTION C - WASTEWATER DISCHARGE INFORMATION

discharge.]

Facilities that checked activities in question 2 of Section B and are considered Categorical Industrial Users should skip to question 2 of this section.

	Process Description	(gal	2 Months s/day) nth Avg. Flow	Highest Flow \ (gals/ Monthly A	day)	Discharge Type (batch, continuous, intermittent)
NA						
atch	n discharge occurs or w	ill occur, indica	ate: [New faciliti	es may estimate	.]	
a.	Number of batch disch	narges: NA	r	oer day		
b.	Average discharge pe	r batch: NA		– (GPD)		
C.	Time of batch discharç	ges <u>NA</u> (days (of week)	at(hours	of day)	
d.	Flow rate: NA		gallons/	/minute		
e.	Percent of total discha	rge: NA				
	Non-Process Disch non-contact cooli		(gals	2 Months s/day) nth Avg. Flow	(gal	/ Year of Last 5 s/day) Avg. Flow
	NA					
	nplete this Section on ated wastewater to a v	water of the S	tate. If Catego	rical wastewater	is discharged ex	clusively via an indire
schai	rge to a public or private to part 2.c .	ely-owned trea	tment works, ch	neck "Yes" in the	appropriate spa	ce below and proceed

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For Categorical Users: Provide the wastewater discharge flows or production (whichever is applicable by the effluent guidelines) for each of your processes or proposed processes. Using the process flow schematic (Figure 1, pg 14), enter the description that corresponds to each process. [New facilities should provide estimates for each

Regulated Process	Applicable Category	Applicable Subpart	Type of Discharge Flow (batch, continuous, intermittent
COOLING TOWER (CT	STEAM AND ELECTRIC		INTERMITTENT
BLOWDOW			
Process Description	Last 12 Months (gals/day) n Highest Month Average*	Highest Flow Year of L (gals/day) Monthly Average*	(batch, continuous,
CT BLOWDOWN	209,000 GPD (this does not	209,000 GPD (this does no	nt INTERMITTENT
	include the regen waste	include the regen waste	
	water)	water)	
•	charges	_at	<u>, </u>
d Flow rate	(days of week)	(hours of day))
cent of total discharge:			
Non categorical Process Description	Last 12 Months (gals/day) Highest Month Avg. Flow	Highest Flow Year of L (gals/day) Monthly Avg. Flow	(batch, continuous
Non categorical	Last 12 Months (gals/day)	(gals/day)	(batch, continuou
Non categorical Process Description NA	Last 12 Months (gals/day)	(gals/day) Monthly Avg. Flow	(batch, continuou
Non categorical Process Description NA Datch discharge occur	Last 12 Months (gals/day) Highest Month Avg. Flow	(gals/day) Monthly Avg. Flow	(batch, continuous
Non categorical Process Description NA Datch discharge occur a. Number of batch of	Last 12 Months (gals/day) Highest Month Avg. Flow	(gals/day) Monthly Avg. Flow cilities may estimate.] per day	(batch, continuous
Non categorical Process Description NA Datch discharge occur a. Number of batch of	Last 12 Months (gals/day) Highest Month Avg. Flow s or will occur, indicate: [New fa	(gals/day) Monthly Avg. Flow cilities may estimate.] per day (GPD)	(batch, continuous intermittent)

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	Non-Process Discharges (e.g. non-contact cooling water)	Last 12 Months (gals/day) Highest Month Avg. Flow	Highest Flow Year of Last 5 (gals/day) Monthly Avg. Flow
	NA		
	All Applicants must complete Questions	s 3 – 5.	
3.	Do you have, or plan to have, automatic sthis facility?	sampling equipment or continuo	us wastewater flow metering equipment at
	Flow Metering Sampling Equipment	Yes	
	If so, please indicate the present or future equipment below:	location of this equipment on th	e sewer schematic and describe the
4.	Are any process changes or expansions characteristics? Yes	No (If no, s	
5.	List the trade name and chemical compos	sition of all biocides and corrosic	n inhibitors used:
	Trade Name		Chemical Composition
	BLEACH	SODIUM HYPOC	HLORITE
	NALCO 3DT185	PHOSPHORIC A	CID
	For each biocide and/or corrosion inhibitor u	used, please include the following	information:
		an tolerance limit data for organis	ms representative of the biota of the
	(2) quantities to b	pe used,	y reach,
	(4) proposed disc	ruse, charge concentrations, and ion number, if applicable	

SECTION D – WATER SUPPLY Water Sources (check as many as are applicable): [
IF MORE THAN ONE WELL OR SURFACE INTAKE, PROVIDE DATA FOR EACH ON AN ATTACHMENT
City: 5.8 *MGD Well: *MGD Well Depth: Ft. Latitude: Longitude:
Surface Intake Volume:*MGD Intake Elevation in Relation to BottomFt.
Intake Elevation: Ft. Latitude: Longitude:
Name of Surface Water Source:
* MGD – Million Gallons per Day
Cooling Water Intake Structure Information
Complete questions 1 and 2 if your water supply is provided by an outside source and not by an onsite water intake structure? (e.g., another industry, municipality, etc)
 Does the provider of your source water operate a surface water intake? Yes [✓] No [¨] (If yes, continue, if no, go to Section E.)
a) Name of Provider ADAMS WATER TREATMENT PLANT b)Location of Provider ALEXANDER CITY
c) Latitude: Longitude:
2. Is the provider a public water system (defined as a system which provides water to the public for human consumption or which provides only <u>treated</u> water, not raw water)? Yes [[7] No [1] (If yes, go to Section E, if no, continue.)
Only to be completed if you have a cooling water intake structure or the provider of your water supply uses an intake structure and does not treat the raw water.
3. Is any water withdrawn from the source water used for cooling? Yes [] No []
Using the average monthly measurements over any 12-month period, approximately what percentage of water withdrawn is used exclusively for cooling purposes? %
5. Does the cooling water consist of treated effluent that would otherwise be discharged? Yes [] No [] (If yes, go to Section E, if no, complete questions 6 – 17.)
6. Is the cooling water used in a once-through or closed cycle cooling system? Yes [] No []
7. When was the intake installed? (Please provide dates for all major construction/installation of intake components including screens)
What is the maximum intake volume? (maximum pumping capacity in gallons per day)
 What is the average intake volume? (average intake pump rate in gallons per day average in any 30-day period)

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10. How is the intake operated? (e.g., continuously, intermittently, batch)			
11. What is the mesh size of the screen on your intake?			
12. What is the intake screen flow-through area?			
13. What is the through screen design intake flow velocity?ft/sec			
14. What is the mechanism for cleaning the screen? (e.g., does it rotate for cleaning)			
15. Do you have any additional fish detraction technology on your intake? Yes [
16. Have there been any studies to determine the impact of the intake on aquatic organisms? Yes [~] No [] (If yes please provide.)			
17. Attach a site map showing the location of the water intake in relation to the facility, shoreline, water depth, etc.			
SECTION E - WASTE STORAGE AND DISPOSAL INFORMATION			
Provide a description of the location of all sites involved in the storage of solids or liquids that could be accidentally discharged to a water of the state, either directly or indirectly via such avenues as storm water drainage, municipal wastewater systems, etc., which are located at the facility for which the NPDES application is being made. Where possible, the location should be noted on a map and included with this application:			

Provide a description of the location of the ultimate disposal sites of solid or liquid waste by-products (such as sludges) from any wastewater treatment system located at the facility.

POWER BLOCK

Description of Waste

DEMINERALIZER REGENERANT WASTEWATER

PAINT WASTE

Description of Storage Location

OIL AND HAZARDOUS WASTE STORAGE BUILDING

Description of Waste	Quantity (lbs/day)	Disposal Method*
PAINT WASTE	0.25	RECYCLED AT OFF-SITE FACILITY
USED OIL	80	RECYCKED OF AT OFF-SITE FACILITY

^{*}Indicate which wastes identified above are disposed of at an off-site treatment facility and which are disposed of on-site. If any wastes are sent to an off-site centralized waste treatment facility, identify the waste and the facility.

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e/	s [ˈˈˈˈ] No [♥] If yes, then complete items A through M below:	YES	NO
٩.	Does the project require new construction?		
В.	Will the project be a source of new air emissions?		, present on
C.	Does the project involve dredging and/or filling?	£ *** 1	
	Has the Corps of Engineers (COE) permit been received?		<u> </u>
	Corps Project Number		
D.	Does the project involve wetlands and/or submersed grassbeds?		* · · · · · · · · · · · · · · · · · · ·
E.	Are oyster reefs located near the project site? (Include a map showing project and discharge location with respect to oyster reefs)	union control	,
F.	Does the project involve the siting, construction and operation of an energy facility as defined in ADEM Admin. Code R. 335-8-102(bb)?	\$	
G.	Does the project involve shoreline erosion mitigation?	1	St. St.
Н.	Does the project involve construction on beaches and dunes?	<u> </u>	g
l.	Will the project interfere with public access to coastal waters?	1	- · · · · ·
J.	Does the project lie within the 100-year floodplain?		F* *****
K.	Does the project involve the registration, sale, use, or application of pesticides?	San community	- 1
L,	Does the project propose to construct a new well or alter an existing well to pump more than 50 GPD?	100 mg k	\$ some
М.	Has the applicable permit been obtained?	31000	d .

SI

In responsibility to demonstrate the social and economic importance of the proposed activity. If further information is required to make this demonstration, attach additional sheets to the application.

1.	Is this a new or increased discharge that began after April 3, 1991?	Yes [🗸]	No [ı
	If yes, complete question 2 below. If no, go to Section H.			

2. Has an Anti-Degradation Analysis been previously conducted and submitted to the Department for the new or increased discharge referenced in question 1? Yes [] No [7]

If yes, do not complete this section.

ADEM Form 187 01/10 m3 Page 11 of 14 If no, and the discharge is to a Tier II waterbody as defined in ADEM Admin. Code r. 335-6-10-.12(4), complete questions A through F below and ADEM forms 311 and 313 (attached). Form 313 must be provided for each alternative considered technically viable.

Information required for new or increased discharges to high quality waters:

A. What environmental or public health problem will the discharger be correcting?

B. How much will the discharger be increasing employment (at its existing facility or as the result of locating a new facility)?

None

C. How much reduction in employment will the discharger be avoiding?

None

D. How much additional state or local taxes will the discharger be paying?

None

E. What public service to the community will the discharger be providing?

None

F. What economic or social benefit will the discharger be providing to the community?

None

SECTION H - EPA Application Forms

All Applicants must submit EPA permit application forms. More than one application form may be required from a facility depending on the number and types of discharges or outfalls found there. The EPA application forms are found on the Department's website at http://www.adem.state.al.us/. The EPA application forms must be submitted in duplicate as follows:

- 1. All applicants must submit Form 1.
- 2. Applicants for existing industrial facilities (including manufacturing facilities, commercial facilities, mining activities, and silvicultural activities) which discharge process wastewater must submit Form 2C.
- 3. Applicants for new industrial facilities which propose to discharge process wastewater must submit Form 2D.
- 4. Applicants for new and existing industrial facilities which discharge only non-process wastewater (i.e., non-contact cooling water and/or sanitary wastewater) must submit Form 2E.
- 5. Applicants for new and existing facilities whose discharge is composed entirely of storm water associated with industrial activity must submit Form 2F, unless exempted by § 122.26(c)(1)(ii). If the discharge is composed of storm water and non-storm water, the applicant must also submit Forms 2C, 2D, and/or 2E, as appropriate (in addition to Form 2F).

SECTION I - ENGINEERING REPORT/BMP PLAN REQUIREMENTS

See ADEM 335-6-6-.08(i) & (j)

SECTION J- RECEIVING WATERS

Receiving Water(s)	303(d) Segment? (Y / N)	Included in TMDL?* (Y / N)
OAKTASASI CREEK	N	N

- *If a TMDL Compliance Schedule is requested, the following should be attached as supporting documentation:
- (1) Justification for the requested Compliance Schedule (e.g. time for design and installation of control equipment, etc.);
- (2) Monitoring results for the pollutant(s) of concern which have not previously been submitted to the Department (sample collection dates, analytical results (mass and concentration), methods utilized, MDL/ML, etc. should be submitted as available);
- (3) Requested interim limitations, if applicable:
- (4) Date of final compliance with the TMDL limitations; and,
- (5) Any other additional information available to support requested compliance schedule.

SECTION K - APPLICATION CERTIFICATION

THE INFORMATION CONTAINED IN THIS FORM MUST BE CERTIFIED BY A RESPONSIBLE OFFICIAL AS DEFINED IN ADEM ADMINISTRATIVE RULE 335-6-6-.09 "SIGNATORIES TO PERMIT APPLICATIONS AND REPORTS" (SEE BELOW).

"I CERTIFY UNDER PENALTY OF LAW THAT THIS DOCUMENT AND ALL ATTACHMENTS WERE PREPARED UNDER MY DIRECTION OR SUPERVISION IN ACCORDANCE WITH A SYSTEM DESIGNED TO ASSURE THAT QUALIFIED PERSONNEL PROPERLY GATHER AND EVALUATE THE INFORMATION SUBMITTED. BASED ON MY INQUIRY OF THE PERSON OR PERSONS WHO MANAGE THE SYSTEM, OR THOSE PERSONS DIRECTLY RESPONSIBLE FOR GATHERING THE INFORMATION, THE INFORMATION SUBMITTED IS, TO THE BEST OF MY KNOWLEDGE AND BELIEF, TRUE, ACCURATE, AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE INFORMATION INCLUDING THE POSSIBILITY OF FINE AND IMPRISONMENT FOR KNOWING VIOLATIONS."

"I FURTHER CERTIFY UNDER PENALTY OF LAW THAT ALL ANALYSES REPORTED AS LESS THAN DETECTABLE IN THIS APPLICATION OR ATTACHMENTS THERETO WERE PERFORMED USING THE EPA APPROVED TEST METHOD HAVING THE LOWEST DETECTION LIMIT FOR THE SUBSTANCE TESTED."

SIGNATURE OF CRESPONSIBLE OFFICIAL:	Dail R. Storde	DATE SIGNED: 1//14/13
(TYPE OR PRINT) NAME OF RESPONSIBLE OFFICIAL:	DAVID GORDON	
TITLE OF RESPONSIBLE OFFICIAL:	PLANT MANAGER	
MAILING ADDRESS: 152 BRICK PLAN	T ROAD	_
CITY, STATE, ZIP: ALEXANDER CITY	, AL 35010	PHONE: ²⁵⁶⁻²¹⁵⁻⁷¹²²

335-6-6-.09 SIGNATORIES TO PERMIT APPLICATIONS AND REPORTS.

- (1) The application for an NPDES permit shall be signed by a responsible official, as indicated below:
- (a) In the case of a corporation, by a principal executive officer of at least the level of vice president, or a manager assigned or delegated in accordance with corporate procedures, with such delegation submitted in writing if required by the Department, who is responsible for manufacturing, production, or operating facilities and is authorized to make management decisions which govern the operation of the regulated facility:
- (b) In the case of a partnership, by a general partner;
- (c) In the case of a sole proprietorship, by the proprietor, or
- (d) In the case of a municipal, state, federal, or other public entity, by either a principal executive officer, or ranking elected official.

Attachment 1 to Supplementary Form ADEM Form 311



Alternatives Analysis

Applicant/Project: CER Generation, LLC

All new or expanded discharges (except discharges eligible for coverage under general permits) covered by the NPDES permitting program are subject to the provisions of ADEM's antidegradation policy. Applicants for such discharges to Tier 2 waters are required to demonstrate "... that the proposed discharge is necessary for important economic or social development." As a part of this demonstration, the applicant must complete an evaluation of the discharge alternatives listed below, including a calculation of the total annualized project costs for each technically feasible alternative (using ADEM Form 312 for public-sector projects and ADEM Form 313 for private-sector projects). Alternatives with total annualized project costs that are less than 110% of the total annualized project costs for the Tier 2 discharge proposal are considered viable alternatives.

Alternative	Viable	Non-Viable	Comment	
1 Land Application		X	Refer to Appendix A	
2 Pretreatment/Discharge to POTW		x	Refer to Appendix A	
3 Relocation of Discharge		X	Refer to Appendix A	
4 Reuse/Recycle	х		Refer to Appendix A	
5 Process/Treatment Alternatives		X	Refer to Appendix A	
6 On-site/Sub-surface Disposal		x	Refer to Appendix A	
(other project-specific alternatives				
considered by the applicant; attach				
additional sheets if necessary)			- GECEIVE	
7			DEC C 5 2013	
8				
9	-		IND/MUN BRAN	ICH

Pursuant to ADEM Administrative Code	
Rule 335-6-304, I certify on behalf of the	
applicant that I have completed an evaluatio	n
of the discharge alternatives identified above	,
and reached the conclusions indicated	

Signature: (Professional Engineer)

Date: 01 - NOV - 2013

(Supporting documentation to be attached, referenced, or otherwise handled as appropriate.)

APPENDIX A

NPDES PERMIT MODIFICATION

ANTIDEGRADATION EVALUATION – ADEM FORM 311

PERMIT NUMBER AL0073784

CER GENERATION, LLC

152 BRICK PLANT ROAD, ALEXANDER CITY, ALABAMA

Permit Modification Summary

CER Generation, LLC (CER) is currently permitted to discharge cooling tower blowdown to Oaktasasi Creek from DSN001. Low volume flows including filter backwash and demineralizer regeneration streams are currently collected and trucked off-site for disposal at the local publicly-owned treatment works (POTW) facility, Sugar Creek Treatment Plant, located approximately 9 miles southwest of the plant. CER is requesting to modify the existing NPDES permit (Permit Number AL0073784) to incorporate these low volume flows into the cooling tower blowdown discharging to DSN001. The current average daily flow from cooling tower blowdown to DSN001 is approximately 312,000 gallons per day (gpd). The addition of the low volume flow (approximately 5,000 gpd) will result in a slightly higher make-up water demand from the city of Alexander City (approximately 23,000 gpd) as the cooling tower blowdown demand will increase in order to account for the low volume flow. In total, incorporation of the demineralizer regeneration stream into the cooling tower blowdown will increase the average daily flow at the discharge up to a high end estimate of approximately 340,000 gpd, a nominal increase of up to 9% above current average flows.

Originally, the plant's make-up water was planned to be purified using a reverse-osmosis system. However, the current demineralizer system was installed instead of the then planned reverse-osmosis system. The demineralizer system purifies city-supplied water for the make-up water steam cycle. Periodically, the demineralizer resin beads are cleaned with low and high pH solutions. This regeneration water is currently neutralized in a closed neutralization basin and then transferred to a truck for off-site disposal. CER is proposing to redirect the neutralized regeneration water to the facility's 3 million gallon cooling water basin where it will be circulated through the cooling tower, and with continuing discharge of the cooling tower blowdown to DSN001.

Oaktasasi Creek is classified as a "Tier 2" tributary having water quality characteristics that exceed the minimum levels of protection for waters of the State of Alabama for activities that include propagation of fish, shellfish, wildlife and recreation. As defined under the Alabama Department of Environmental Management (ADEM) code 335-6-10-.04, existing and new discharges shall not degrade the quality of waters that exceed levels necessary to support propagation of fish, shellfish, wildlife and recreation.

Based on the results from a mass balance analysis that was focused on the common constituents (Phosphorus, Ammonia as Nitrogen and Nitrite-Nitrate as Nitrogen) for which analytical data is available for both the cooling tower blowdown stream and the demineralizer regeneration stream and from a qualitative review for other constituents that are currently monitored at DSN001, the incorporation of the demineralizer regeneration stream will have a negligible impact to the discharge to Oaktasasi Creek. Additionally, CER currently spends approximately \$600,000 per year for testing and disposal fees associated with the demineralizer regeneration stream. By incorporating this stream into the cooling tower blowdown discharge to DSN001, these costs could be reallocated into other capital projects and improvements, thereby improving the local economy by creating more employment opportunities for plant personnel and plant contractors.

CER has had a longstanding company commitment to implementing sustainable practices and to looking for ways to reduce their carbon footprint. An estimated 3,500 to 4,000 gallons of diesel fuel is consumed on an annual basis to transport the demineralizer regeneration streams to the local POTW, Sugar Creek Treatment Plant. By incorporating this stream into the cooling tower blowdown discharge to DSN001, the greenhouse gas emissions (and carbon footprint) would be reduced.

A summary of the discharge alternatives associated with DSN001 is provided below:



Alternative 1 - Land Application

The natural topography in undeveloped site areas is relatively steep and is considered unsuitable for land application. Additionally, the predominant soil type within the plant property consists of clay loam having a low permeability, which is not conducive for a land application alternative. Land application within these areas could result in runoff/sedimentation problems and high turbidity discharges into Oaktasasi Creek. Therefore, land application is not a suitable option.

Alternative 2 - Pretreatment/Discharge to POTW

Currently, low volume flows are transferred into trucks and hauled to the local POTW, Sugar Creek Treatment Plant, for disposal as there is not a POTW connection near the plant. The economic costs to construct a system to pretreat the demineralizer regeneration flows are not viable due to the low volume and intermittent flow of liquid that is produced.

Alternative 3 – Relocation of Discharge

Relocation of this discharge is not a viable option. The shortest distance to Oaktasasi Creek was chosen for economic reasons, and access issues are a problem for discharging into another water body. Additionally, other water bodies within the vicinity of CER are in the same watershed for the Tallapoosa River, so relocation of the discharges would not alter loading to the watershed.

Alternative 4 - Reuse/Recycle

Inclusion of the demineralizer regeneration stream into the cooling tower basin is considered a reuse/recycle practice. The one-time estimated cost to implement the demineralizer regeneration stream redirection will be approximately \$23,414 (as summarized on attached Form 313), which is a fraction (less than 4%) of the annual disposal and testing fees that CER current pays for off-site disposal of this stream.

Alternative 5 - Process/Treatment Alternatives

A Process/Treatment alternative is not a viable option as additional treatment will not to be necessary in order to meet water quality requirements for the combined discharge from DSN001.

Alternative 6 - On-site/Sub-surface Disposal

On-site/sub-surface disposal is not a viable option due to low volume and intermittent flow of produced liquid and the unfavorable geology/topography of the site. The near surface site conditions consist of steep terrain and low permeability clay loam geology which are not conducive for an on-site/sub-surface disposal alternative.



Calculation of Total Annualized Project Costs for Private-Sector Projects

Capital Costs to be Financed (Supplied by applicant)	\$ 23414.00 ₍₁₎
Interest rate for Financing (Expressed as a decimal)	one time payment (i)
Time Period of Financing (Assume 10 years*)	10 years (n)
Annualization Factor = $\frac{i}{(1+i)^{10}-1} + i$	one time payment (2)
Annualized Capital Cost [Calculate: (1) x (2)]	\$ 2341.40 ₍₃₎
Annual Cost of Operation and Maintenance (including but not limited to monitoring, inspection, permitting fees, waste disposal charges, repair, administration and replacement)**	\$ 550.00 ₍₄₎
Total Annual Cost of Pollution Control Project [(3)+(4)]	\$ 2891.40 ₍₅₎

While actual payback schedules may differ across projects and companies, assume equal annual payments over a 10-year period for consistency in comparing projects.

For recurring costs that occur less frequently than once a year, pro rate the cost over the relevant number of years (e.g., for pumps replaced once every three years, include one-third of the cost in each year).