



Alabama Department of Environmental Management
adem.alabama.gov

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MARCH 23, 2020 (334) 271-7700 ■ FAX (334) 271-7950

MR CARL GUNTER
MILL MANAGER
INTERNATIONAL PAPER PRATTVILLE
100 JENSEN ROAD
PRATTVILLE AL 36067

RE: DRAFT PERMIT
NPDES PERMIT NUMBER AL0003115

Dear Mr. Gunter:

Transmitted herein is a draft of the referenced permit.

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 period from EPA.

Our records indicate that you are currently utilizing the Department's web-based electronic environmental (E2) reporting system for submittal of discharge monitoring reports (DMRs). Your E2 DMRs will automatically update on the effective date of this permit, if issued.

The Alabama Department of Environmental Management encourages your voluntary consideration of 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.

If you have questions regarding this permit or monitoring requirements, please contact Alex Chavers by e-mail at adchavers@adem.alabama.gov or by phone at (334) 271-7851.

Sincerely,

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





NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM PERMIT

PERMITTEE: INTERNATIONAL PAPER

FACILITY LOCATION: 100 JENSEN ROAD
PRATTVILLE, AL 36067

PERMIT NUMBER: AL0003115

RECEIVING WATERS: DSN001, DSN002: ALABAMA RIVER
DSN003: AUTAUGA CREEK

In accordance with and subject to the provisions of the Federal Water Pollution Control Act, as amended, 33 U.S.C. §§1251-1388 (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-17, 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:

EFFECTIVE DATE:

EXPIRATION DATE:

Draft

**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: Process wastewaters, landfill leachate, wet decking process water, and storm water runoff from the construction and production area, the landfill, wood yard, and the clay borrow pit 3/

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

<u>EFFLUENT CHARACTERISTIC</u>	<u>DISCHARGE LIMITATIONS</u>			<u>MONITORING REQUIREMENTS 1/</u>				
	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Daily Minimum</u>	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Measurement Frequency 2/</u>	<u>Sample Type</u>	<u>Seasonal</u>
BOD, 5-Day (20 Deg. C) 4/	0 lbs/day	0 lbs/day	-	-	-	3X Weekly test	Composite	May - October
BOD, 5-Day (20 Deg. C)	17354 lbs/day	34708 lbs/day	-	-	-	3X Weekly test	Composite	-
pH	-	-	6.0 S.U.	-	9.0 S.U.	3X Weekly test	Grab	-
Solids, Total Suspended	37188 lbs/day	74376 lbs/day	-	-	-	3X Weekly test	Composite	-
Nitrogen, Ammonia Total (As N)	-	-	-	-	REPORT mg/l	Monthly	Composite	-
Nitrogen, Kjeldahl Total (As N)	-	-	-	-	REPORT mg/l	Monthly	Composite	April - October
Nitrite Plus Nitrate Total I Det. (As N)	-	-	-	-	REPORT mg/l	Monthly	Composite	April - October
Phosphorus, Total (As P)	-	-	-	-	REPORT mg/l	Monthly	Composite	April - October

THE DISCHARGE SHALL HAVE NO SHEEN, AND THERE SHALL BE NO DISCHARGE OF VISIBLE OIL, FLOATING SOLIDS OR VISIBLE FOAM IN OTHER THAN TRACE AMOUNTS.

- 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/ To determine compliance with this parameter, a Net BOD₅ value should be reported. The Net BOD₅ value is determined by subtracting the allowable BOD₅ from the BOD₅ discharged. The allowable BOD₅ is the more stringent of the limit listed above and the BOD₅ limit calculated using the equation in Part IV.F. A value less than or equal to zero indicates compliance.

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 (continued): Process wastewaters, landfill leachate, wet decking process water, and storm water runoff from the construction and production area, the landfill, wood yard, and the clay borrow pit 3/

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

<u>EFFLUENT CHARACTERISTIC</u>	<u>DISCHARGE LIMITATIONS</u>			<u>MONITORING REQUIREMENTS 1/</u>				
	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Daily Minimum</u>	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Measurement Frequency 2/</u>	<u>Sample Type</u>	<u>Seasonal</u>
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Daily	Totalizer	-
Certification – River Monitoring	-	-	-	-	0 Yes=0; No=1	Monthly	Not Applicable	June – October

THE DISCHARGE SHALL HAVE NO SHEEN, AND THERE SHALL BE NO DISCHARGE OF VISIBLE OIL, FLOATING SOLIDS OR VISIBLE FOAM IN OTHER THAN TRACE AMOUNTS.

- 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.

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: Process wastewaters, landfill leachate, wet decking process water, and storm water runoff from the construction and production area, the landfill, wood yard, and the clay borrow pit 3/

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

<u>EFFLUENT CHARACTERISTIC</u>	<u>DISCHARGE LIMITATIONS</u>			<u>MONITORING REQUIREMENTS 1/</u>				
	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Daily Minimum</u>	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Measurement Frequency 2/</u>	<u>Sample Type</u>	<u>Seasonal</u>
Pentachlorophenol 4/	-	3.3 lbs/day	-	-	-	Quarterly	Grab	-
Trichlorophenol 4/	-	3.1 lbs/day	-	-	-	Quarterly	Grab	-

THE DISCHARGE SHALL HAVE NO SHEEN, AND THERE SHALL BE NO DISCHARGE OF VISIBLE OIL, FLOATING SOLIDS OR VISIBLE FOAM IN OTHER THAN TRACE AMOUNTS.

- 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/ In lieu of monitoring for these parameters, the permittee may certify non-use of chlorophenolic containing compounds according to the requirements at 40 CFR 430.105 and 40 CFR 430.124 by entering *9 on the discharge monitoring report.

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:

DSN001T: Process wastewaters, landfill leachate, wet decking process water, and storm water runoff from the construction and production area, the landfill, wood yard, and the clay borrow pit 3/

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

<u>EFFLUENT CHARACTERISTIC</u>	<u>DISCHARGE LIMITATIONS</u>			<u>MONITORING REQUIREMENTS 1/</u>				
	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Daily Minimum</u>	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Measurement Frequency 2/</u>	<u>Sample Type</u>	<u>Seasonal</u>
Toxicity, Ceriodaphnia Chronic 4/	-	0 pass(0)/fail(1)	-	-	-	Annually	Composite	-
Toxicity, Pimephales Chronic 4/	-	0 pass(0)/fail(1)	-	-	-	Annually	Composite	-

THE DISCHARGE SHALL HAVE NO SHEEN, AND THERE SHALL BE NO DISCHARGE OF VISIBLE OIL, FLOATING SOLIDS OR VISIBLE FOAM IN OTHER THAN TRACE AMOUNTS.

- 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.D for Effluent Toxicity and Biomonitoring 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:

DSN0021: Noncontact turbine condenser cooling water

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

<u>EFFLUENT CHARACTERISTIC</u>	<u>DISCHARGE LIMITATIONS</u>			<u>MONITORING REQUIREMENTS 1/</u>				
	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Daily Minimum</u>	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Measurement Frequency 2/</u>	<u>Sample Type</u>	<u>Seasonal</u>
Temperature, Water Deg. Fahrenheit	-	-	-	-	111 F	Monthly	Grab	-
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Monthly	Instantaneous	-

THE DISCHARGE SHALL HAVE NO SHEEN, AND THERE SHALL BE NO DISCHARGE OF VISIBLE OIL, FLOATING SOLIDS OR VISIBLE FOAM IN OTHER THAN TRACE AMOUNTS.

- 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.

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: Non-contact fire pump pressure relief water, mill supply pump seal water, fire suppression water system water, and storm water runoff from the bark pile, oversized wood, skeet shooting range, and process water treatment areas. 3/

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

<u>EFFLUENT CHARACTERISTIC</u>	<u>DISCHARGE LIMITATIONS</u>			<u>MONITORING REQUIREMENTS 1/</u>				
	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Daily Minimum</u>	<u>Monthly Average</u>	<u>Daily Maximum</u>	<u>Measurement Frequency 2/</u>	<u>Sample Type</u>	<u>Seasonal</u>
BOD, 5-Day (20 Deg. C)	-	-	-	REPORT mg/l	-	Quarterly	Grab	-
Solids, Total Suspended	-	-	-	REPORT mg/l	-	Quarterly	Grab	-
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	-	-	-	-	Quarterly	Instantaneous	-

THE DISCHARGE SHALL HAVE NO SHEEN, AND THERE SHALL BE NO DISCHARGE OF VISIBLE OIL, FLOATING SOLIDS OR VISIBLE FOAM IN OTHER THAN TRACE AMOUNTS.

- 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.

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;
- e. 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 DMR's).

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 for the month of the semiannual period, i.e. (June and December DMR's).

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 (MONTH, YEAR)**. 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 [Month, Year]**. 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. Except as allowed by Provision I.C.1.c.(1) or (2), the permittee shall submit all Discharge Monitoring Reports (DMRs) required by Provision I.C.1.b by utilizing the Department's web-based Electronic Environmental (E2) Reporting System.

(1) If the permittee is unable to complete the electronic submittal of DMR data due to technical problems originating with the Department's E2 Reporting system (this could include entry/submittal issues with an entire set of DMRs or individual parameters), the permittee is not relieved of their obligation to submit DMR data to the Department by the date specified in Provision I.C.1.b, unless otherwise directed by the Department.

If the E2 Reporting System is down on the 28th day of the month in which the DMR is due or is down for an extended period of time, as determined by the Department, when a DMR is required to be submitted, the permittee 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 5 calendar days of the E2 Reporting 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 the dated e-mail, or hand-delivery stamped date), if applicable.

- (2) The permittee may submit a request to the Department for a temporary electronic reporting waiver for DMR submittals. The waiver request should include the permit number; permittee name; facility/site name; facility address; name, address, and contact information for the responsible official or duly authorized representative; a detailed statement regarding the basis for requesting such a waiver; and the duration for which the waiver is requested. Approved electronic reporting waivers are not transferrable.

Permittees with an approved electronic reporting waiver for DMRs may submit hard copy DMRs for the period that the approved electronic reporting waiver request is effective. The permittee shall submit the Department-approved DMR forms to the address listed in Provision I.C.1.e.

- (3) If a permittee is allowed to submit a hard copy DMR, 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.
- (4) 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 and the increased frequency shall be indicated on the DMR.
- (5) 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.

- d. All reports and forms required to be submitted by this permit, the AWPCA and the Department's Rules, 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. Discharge Monitoring Reports required by this permit, the AWPCA, and the Department's Rules that are being submitted in hard copy 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 36110-2400**

- f. 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

Certified and Registered Mail shall be addressed to:

Alabama Department of Environmental Management
Water Division
1400 Coliseum Boulevard
Montgomery, Alabama 36110-2400

- g. If this permit is a re-issuance, 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;
- (3) 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
- (6) 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 Noncompliance Notification Form (ADEM Form 421) available on the Department's website (<http://adem.alabama.gov/DeptForms/Form421.pdf>) and 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
- (3) 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.

6. 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

1. 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

- a. 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;
- c. 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 designee; and
 - (2) 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.

E. 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

- a. 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.

3. 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 301(c), 301(g), 301(h), 301(k), or 316(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;
- (13) 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;
- d. A change in any condition that requires either a temporary or permanent reduction or elimination of the permitted discharge;
- e. 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.

2. 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.

3. 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 Code of Alabama 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 carbonaceous 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". Code of Alabama 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.
22. 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.
31. 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).
32. 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. Solvent – means any virgin, used or spent organic solvent(s) identified in the F-Listed wastes (F001 through F005) specified in 40 CFR 261.31 that is used for the purpose of solubilizing other materials.
39. TKN – means the pollutant parameter Total Kjeldahl Nitrogen.
40. TON – means the pollutant parameter Total Organic Nitrogen.
41. TRC – means Total Residual Chlorine.
42. TSS – means the pollutant parameter Total Suspended Solids.
43. 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 flow.
44. 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, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation.

45. 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." Code of Alabama 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.
46. Week - means the period beginning at twelve midnight Saturday and ending at twelve midnight the following Saturday.
47. 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 calendar 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 calendar 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

1. 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;
- i. Develop a solvent management plan, if solvents are used on site. The solvent management plan shall include as a minimum lists of the solvents on site; the disposal method of solvents used instead of dumping, such as reclamation, contract hauling; and the procedures for assuring that solvents 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;

- i. 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
 - a. 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.

2. 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. COOLING WATER INTAKE STRUCTURE (CWIS) REQUIREMENTS

1. The cooling water intake structure used by the permittee has been evaluated using available information. At this time, the Department has determined, using BPJ, that the cooling water intake structure does represent the best technology available (BTA) to minimize adverse environmental impact(s) in accordance with Section 316(b) of the federal Clean Water Act (33 U.S.C. section 1326).
2. The permittee is required to operate and maintain the CWIS in a manner that minimizes impingement and entrainment levels. Documentation detailing the steps that have and are being taken to minimize the impingement and entrainment levels shall be maintained on site and made available upon request.
3. Nothing in this Permit authorizes take for the purposes of a facility compliance with the Endangered Species Act.
4. The permittee shall submit the information for the CWIS as required by 40 CFR 122.21 (r) at least 180 days prior to expiration of the permit unless a request has been approved by the Department in writing. The facility must submit the request for reduced cooling water intake structure and waterbody application information to the Department at least two years and six months prior to the expiration of the permit. The permittee's request must identify each element that it determines has not been substantially changed since the previous permit application and the basis for the determination.
5. The Permittee must keep records of all submissions that are part of the permit application pertaining to the CWIS until the subsequent permit is issued to the Permittee.
6. The Permittee's permit application must contain readily available information, at the time of permit application development, in identifying all Federally-listed threatened and endangered species and/or designated critical habitat that are or may be present in the action area.
7. The Permittee must conduct weekly visual inspections or employ remote monitoring devices during the period the cooling water intake structure is in operation. This condition is only applicable if control technologies are being employed to comply with BTA for impingement mortality.
8. The Permittee is required to submit an Annual Certification to the Department no later than January 28th of each year. The Annual Certification shall detail if any changes have been made to impact the operation of the CWIS structure.

D. 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
 - (1) The effluent shall be tested with appropriate replicates of 5% effluent, a control and a minimum of four serial dilutions of 1%, 3%, 53%, and 100% effluent.
 - (2) Noncompliance with the toxicity limit will be demonstrated if the IC₂₅ (Inhibition Concentration) for reproduction or growth is less than the IWC. The average reproduction for Ceriodaphnia shall be calculated by dividing the total number of live Ceriodaphnia

young in each concentration by the total number of organisms used to initiate that concentration; the average growth for the fathead minnows shall be calculated by dividing the total weight of the surviving minnow larvae in each replicated by the total number of organisms used to initiate that replicate.

b. General Test Requirements

- (1) 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).
- (2) 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.
- (2) 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 time suspend or reinstate these requirements or may decrease or increase the frequency of submittals.

a. Introduction

- (1) Facility name, location, and county
- (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 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
 - (d) 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 laboratory
- (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

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

E. RECEIVING STREAM WATER QUALITY MONITORING REQUIREMENTS

The discharge authorized by this permit shall not cause a violation of the applicable dissolved oxygen standard downstream of the discharge. The permittee shall take steps necessary to ensure that its effluent does not result in dissolved oxygen values at the five-foot depth being depressed below the water quality standard as measure by the permittee, ADEM, EPA, or its successor.

Stream monitoring shall be performed between June through October downstream from the International Paper – Prattville discharge point to a point downstream not to extend beyond Jones Bluff Lock and Dam. Parameters to be monitoring shall be dissolved oxygen at the five-foot depth and water temperature.

1. Frequency

- a. Monitoring is required once per week under normal conditions.
- b. Monitoring is required daily during periods when the river is not flowing and an effluent release is occurring, unless it is determined by ADEM Water Division that either the river conditions or the volume of the discharge do not present a reasonable potential for adverse water quality impacts.
- c. Monitoring is not required during unsafe weather or river conditions.

2. Conditional Requirements

- a. If the D.O. is less than 6.1 mg/L at river mile 250.2 and is decreasing by more than 0.3 mg/L between 253.8 and 250.2, the permittee will continue in-stream monitoring for dissolved oxygen at 2 mile intervals until the dissolved oxygen is no longer decreasing by more than 0.3 mg/L between stations.

3. Locations

Sampling stations will be at Alabama River miles 275.3, 268.7, 260.2, 253.8, and 250.2.

4. Sample Collection and Analysis

Sample collection and analysis shall be performed in accordance with EPA approved sample collection protocol and analysis methods. The times samples are collected should be reported and when practicable, all measurement should be made prior to 12:00 pm.

5. Reporting

River monitoring data shall be submitted electronically to an email address provided by the Department. The permittee is required to verify submittal of the river monitoring data by submitting a value of "0" on the discharge monitoring report for DSN0011 under the parameter "Certification – River Monitoring" for those months in which monitoring is required.

F. ADDITIONAL REQUIREMENTS

For the period from June through October, the rate of discharge of BODs shall be governed by the following formula:

$$BOD_5 \left(\frac{lbs}{day} \right) = 0.0017 * Q_R^{1.4502}, \text{ where } Q_R \text{ is the daily mean river flow in cubic feet per second}$$

Determination of river flows may be based on the discharge schedule at Jones Bluff Lock & Dam. A discharge may occur only when effluent release will not cause the in-stream dissolved oxygen to fall below 5.0 mg/L, in accordance with Part IV.E of this permit. The permittee shall, to the extent practicable, release only when the river is flowing.

ADEM PERMIT RATIONALE

PREPARED DATE: June 26, 2019
PREPARED BY: Alex Chavers
REVISED DATE: February 4, 2019

Permittee Name: International Paper
Facility Name: International Paper Prattville
Permit Number: AL0003115

PERMIT IS REISSUANCE DUE TO EXPIRATION

DISCHARGE SERIAL NUMBERS & DESCRIPTIONS:

DSN001: Process wastewaters, landfill leachate, wet decking process water, and storm water runoff from the construction and production area, the landfill, wood yard, and the clay borrow pit
DSN002: Noncontact turbine condenser cooling water
DSN003: Non-contact fire pump pressure relief water, mill supply pump seal water, fire suppression water system water, and storm water runoff from the bark pile, oversized wood, skeet shooting range, and process water treatment areas

INDUSTRIAL CATEGORY: 40 CFR 430: Pulp, Paper, and Paperboard Point Source Category
Subpart C – Unbleached Kraft Subcategory
Subpart J – Secondary Fiber Non-Deink Subcategory

40 CFR 429: Timber Product Processing Point Source Category
Subpart I – Wet Storage Subcategory

MAJOR: Y

STREAM INFORMATION:

Receiving Stream: DSN001, DSN002 – Alabama River

Classification: Fish & Wildlife
River Basin: Alabama River Basin
7Q10: 4,056 CFS
7Q2: 6,313 CFS
1Q10: 3,042 CFS

Annual Average Flow: 24,156 CFS

303(d) List: NO

Impairment: N/A

TMDL: NO

Receiving Stream: DSN003 – Autauga Creek

Classification: Fish & Wildlife
River Basin: Alabama River Basin
7Q10: 49 CFS
7Q2: 75 CFS

IQ10:	36.75 CFS
Annual Average Flow:	193 CFS
303(d) List:	NO
Impairment:	<u>N/A</u>
TMDL:	NO

DISCUSSION:

The International Paper Prattville Mill utilizes the kraft (sulfate) process to produce pulp, turpentine, and wood fat soaps from wood chips. Pulp is also produced from post-consumer waste paper. Produced pulp is converted to linerboard using two paper machines. Crude tall oil is produced by acidulation of wood fat soaps (black liquor skimmings) and is shipped offsite. Crude sulfate turpentine is condensed, recovered, and shipped offsite.

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 not for a new or expanded discharge. Therefore, the applicant is not required to demonstrate that the discharge is necessary for economic and social development.

EPA has not promulgated specific guidelines for the discharges covered under the proposed permit. Proposed permit limits are based on Best Professional Judgment. The proposed frequencies are based on a review of site-specific conditions and an evaluation of similar facilities.

0011:

<u>Parameter</u>	<u>Monthly Avg Loading</u>	<u>Daily Max Loading</u>	<u>Daily Min Concentration</u>	<u>Monthly Avg Concentration</u>	<u>Daily Max Concentration</u>	<u>Sample Frequency</u>	<u>Sample Type</u>	<u>Basis*</u>
BOD, 5-Day (20 Deg. C)	0 lbs/day	0 lbs/day	-	-	-	3X Weekly test	Composite	WQBEL
BOD, 5-Day (20 Deg. C)	17354 lbs/day	34708 lbs/day	-	-	-	3X Weekly test	Composite	EGL/ABS
pH	-	-	6.0 S.U.	-	9.0 S.U.	3X Weekly test	Grab	WQBEL/ EGL
Solids, Total Suspended	37188 lbs/day	74376 lbs/day	-	-	-	3X Weekly test	Composite	EGL/ABS
Nitrogen, Ammonia Total (As N)	-	-	-	-	REPORT mg/l	Monthly	Composite	BPJ
Nitrogen, Kjeldahl Total (As N)	-	-	-	-	REPORT mg/l	Monthly	Composite	BPJ
Nitrite Plus Nitrate Total 1 Det. (As N)	-	-	-	-	REPORT mg/l	Monthly	Composite	BPJ
Phosphorus, Total (As P)	-	-	-	-	REPORT mg/l	Monthly	Composite	BPJ
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	REPORT MGD	-	-	-	Daily	Totalizer	BPJ
Certification – River Monitoring	-	-	-	-	0 Yes=0; No=1	Monthly	Not Applicable	WQBEL

001Q:

<u>Parameter</u>	<u>Monthly Avg Loading</u>	<u>Daily Max Loading</u>	<u>Daily Min Concentration</u>	<u>Monthly Avg Concentration</u>	<u>Daily Max Concentration</u>	<u>Sample Frequency</u>	<u>Sample Type</u>	<u>Basis*</u>
Pentachlorophenol	-	3.3 lbs/day	-	-	-	Quarterly	Grab	EGL
Trichlorophenol	-	3.1 lbs/day	-	-	-	Quarterly	Grab	EGL

001T:

<u>Parameter</u>	<u>Monthly Avg Loading</u>	<u>Daily Max Loading</u>	<u>Daily Min Concentration</u>	<u>Monthly Avg Concentration</u>	<u>Daily Max Concentration</u>	<u>Sample Frequency</u>	<u>Sample Type</u>	<u>Basis*</u>
Toxicity, Ceriodaphnia Chronic	-	0 pass(0)/fail(1)	-	-	-	Annually	Composite	WQBEL
Toxicity, Pimephales Chronic	-	0 pass(0)/fail(1)	-	-	-	Annually	Composite	WQBEL

0021:

<u>Parameter</u>	<u>Monthly Avg Loading</u>	<u>Daily Max Loading</u>	<u>Daily Min Concentration</u>	<u>Monthly Avg Concentration</u>	<u>Daily Max Concentration</u>	<u>Sample Frequency</u>	<u>Sample Type</u>	<u>Basis*</u>
Temperature, Water Deg. Fahrenheit	-	-	-	-	111 °F	Monthly	Grab	WQBEL/ BPJ
Flow, In Conduit or Thru Treatment Plant	-	REPORT MGD	-	-	-	Monthly	Instantaneous	BPJ

003Q:

<u>Parameter</u>	<u>Monthly Avg Loading</u>	<u>Daily Max Loading</u>	<u>Daily Min Concentration</u>	<u>Monthly Avg Concentration</u>	<u>Daily Max Concentration</u>	<u>Sample Frequency</u>	<u>Sample Type</u>	<u>Basis*</u>
BOD, 5-Day (20 Deg. C)	-	-	-	REPORT mg/l	-	Quarterly	Grab	BPJ
Solids, Total Suspended	-	-	-	REPORT mg/l	-	Quarterly	Grab	BPJ
Flow, In Conduit or Thru Treatment Plant	REPORT MGD	-	-	-	-	Quarterly	Instantaneous	BPJ

*Basis for Permit Limitation

- BPJ – Best Professional Judgment
- ABS – Antibacksliding
- WQBEL – Water Quality Based Effluent Limits
- ELG – Federal Effluent Limitations Guidelines
- 303(d) – 303(d) List of Impaired Waters
- TMDL – Total Maximum Daily Load Requirements

DSN001 – Process wastewaters, landfill leachate, wet decking process water, and storm water runoff from the construction and production area, the landfill, wood yard, and the clay borrow pit

Best Professional Judgment (BPJ)

Flow

Flow monitoring will be continued as totalized daily readings.

Nutrients

Monitoring for Ammonia as Nitrogen, Total Kjeldahl Nitrogen, Nitrates + Nitrites, and Total Phosphorus will be continued in this permit issuance. The frequency of monitoring will remain at once per month during the growing season (April to October).

Water Quality Based Effluent Limits (WOBEL)

Biochemical Oxygen Demand (5-Day)

BOD5 is regulated under 40 CFR 430; however, to ensure protection of water quality during critical periods the discharge of BOD is regulated by an equation from June through October, inclusive. Based on historical data, this equation has proven to be effective at preventing the facility's discharge from causing a contravention of the in-stream D.O. standard.

$$BOD5 \left(\frac{lbs}{day} \right) = 0.0017 Q_R^{1.9502}$$

Q_R = daily mean flow in the Alabama River in CFS

In order to ensure the Department can effectively track compliance with a fluctuating limitation, the facility will be required to report a *Net BOD5* value according to the following equations. A value of less than zero is considered compliant with permit limitations.

$$Net\ BOD5\ (Daily\ Maximum) = Daily\ Allowable\ BOD5 \left(\frac{lbs}{day} \right) - Actual\ BOD5\ discharged \left(\frac{lbs}{day} \right)$$

$$Net\ BOD5\ (Monthly\ Average) = Average\ of\ Daily\ Allowable\ BOD5 \left(\frac{lbs}{day} \right) - Average\ BOD5\ discharged \left(\frac{lbs}{day} \right)$$

Toxicity Testing

The facility will continue to be required to perform whole effluent toxicity testing on an annual basis. A mixing zone analysis was performed by the facility and reviewed by the Department. Based on the analysis, toxicity testing is required on a chronic basis due to a limiting dilution of less than 100:1 with an IWC of 5% (rounded up from 4.42%). The facility has requested to perform definitive testing in lieu of a screening test. The dilutions to be used for the test are as follows: 1%, 3%, 5%, 53%, and 100%.

Reasonable Potential Analysis

A reasonable potential analysis was performed using analytical data submitted with the application for DSN001. No parameters included in that analysis showed a reasonable potential to violate water quality standards; therefore, no additional limitations are proposed to be included in this permit issuance.

Federal Effluent Guideline Limitations (EGL)

The facility is regulated under 40 CFR 430 Subpart C and 40 CFR 430 Subpart J, which provides effluent limitation guidelines for the production processes used by the facility. Calculation of the effluent limitations for these subparts can be found in Attachment A to this rationale.

Landfill Leachate

Landfill leachate, which is also discharged through DSN001, is regulated under 40 CFR 445; however, 40 CFR 445.1(e) specifies that the regulations therein "do not apply to dischargers of landfill wastewater from landfills operated in conjunction with other industrial or commercial operations when the landfill only

receives wastes generated by the industrial or commercial operations directly associated with the landfill". Therefore, limitations found at 40 CFR 445.1(e) will not be applied to discharges from DSN001.

pH

ADEM Administrative Code, Division 6 Regulations, specifically 335-6-10-.09(5)(e)2 – Specific Water Quality for Fish and Wildlife classified streams states: "Sewage, industrial waste or other wastes shall not cause the pH to deviate more than one unit from then normal or natural pH, nor be less than 6.0, nor greater than 8.5 standard units." The current limitations of 6.0-9.0 S.U. will be continued. Due to the low effluent flow/stream flow ratio, the discharge is not expected to affect the pH of the receiving stream and the existing limitations are consistent with the applicable effluent guideline limitations at 40 CFR 430 and 40 CFR 429.

Biochemical Oxygen Demand (5-Day), Total Suspended Solids*

The previous permit determined BOD5 limitations for Subpart C using 40 CFR 430.32(a) (BPT effluent limitations for unbleached Kraft facilities); however, after a review of the facility's operations, the appropriate effluent guideline limitations should be 40 CFR 430.33(b) (BCT effluent limitations for unbleached Kraft facilities where pulp and paper are produced using a combined unbleached Kraft and semi-chemical process...). Additionally, Subpart J provides effluent guideline limitations for production of corrugated medium (40 CFR 102(b)).

The facility has requested an increase to the allowable loadings in the discharge based on a sustained production increase and available assimilative capacity in the receiving stream. Based on the analytical data available to the Department, the facility is consistently able to meet the current permit limitations and has not demonstrated a need for additional allocation; therefore, it is proposed to continue the existing limitations, with the noted corrections below, in this permit issuance.

*The existing limitation were calculated using ELG factors from Subpart C only; however, the facility is also subject to the Subpart J. It is not proposed to adjust the existing limitations based on this previous omission, as the facility is currently able to meet the existing limitations, which are significantly less than the guidelines allow based on current levels of production, and would not change significantly.

Pentachlorophenol*, Trichlorophenol*

These parameters are regulated under 40 CFR 430.34 and 40 CFR 430.104. The sum of these two guidelines provides the final limitations applicable to the discharge; however, the existing permit limitations are more stringent and will be continued.

*In lieu of monitoring for these parameters, the facility can submit an annual certification of non-use as described at 40 CFR 430.02(f) by reporting a value of *9 on the discharge monitoring report.

303(d) List of Impaired Waters/Total Maximum Daily Load (TMDL)

The receiving stream is not listed on the 2018 303(d) List of Impaired Water nor has a TMDL been developed; therefore, no additional monitoring requirements are proposed for this permit issuance.

Stream Monitoring Requirements

The facility is required to conduct river monitoring surveys on a periodic basis for the period from June through October, inclusive. The specific details of the river monitoring requirements can be found in Part IV.F of the permit. The previous permit included language that made river surveys required outside of the period noted above if the flow was below a certain threshold; however, this language was updated to require river surveys only during the period noted above, regardless of river flow.

316(b) Cooling Water Intake Structure Requirements

Section 316(b) of the Clean Water Act requires that facilities minimize adverse environmental impacts resulting from the operation of cooling water intake structures (CWIS) by using the "best technology available" (BTA). U.S. EPA has promulgated rules to implement these requirements under Phase I, Phase II, and Phase III of the rules; however, many facilities that operate intake structures do not fall into these categories and are classified as miscellaneous facilities. For these miscellaneous facilities, a BTA determination must be made using BPJ.

The cooling water intake structure (CWIS) used by the permittee has been evaluated using available information. At this time, the Department has determined, using BPJ, that the cooling water intake structure represents the best technology available (BTA) to minimize adverse environmental impact in accordance with Section 316 (b) of the Federal Clean Water Act (33 U.S.C. section 1326) due to the actual through screen intake flow velocity being less than 0.5 ft/s, the use of fish detraction technology (i.e. rotating screen), the design intake flow being less than 5% of the mean annual flow, and only 4.2% of the withdrawn water being used for cooling purposes.

The requirements that facilities must comply with are listed below:

1. The permittee shall submit the following information at least 180 days prior to expiration of this permit:
 - design in-take flow of the CWIS;
 - percentage of in-take flow, based on highest monthly average in last 5 years, used for cooling purposes;
 - an estimate of the in-take flow reduction at the facility based upon the use of a 100 percent (or some lesser percentage) closed-cycle re-circulating cooling water system compared to a conventional once-through cooling water system;
 - through screen design in-take flow velocity;
 - any impingement and entrainment data that may have been collected based on the operation of the facility's CWIS, collected since the effective date of this NPDES permit; and,
 - a detailed description of any changes in the operation of the CWIS, or changes in the type of technologies used at the CWIS such as screens or other technologies affecting the rates of impingement and/or entrainment of fish and shellfish.
2. The permittee is required to operate and maintain the CWIS in a manner that minimizes impingement and entrainment levels. Documentation detailing the steps that have and are being taken to minimize the impingement and entrainment levels shall be maintained on site and made available upon request.
3. The Permittee must keep records of all submissions that are part of the permit application pertaining to the CWIS until the subsequent permit is issued to the Permittee.
4. Nothing in this Permit authorizes take for the purposes of a facility compliance with the Endangered Species Act.

DSN002: Non-contact turbine condenser cooling water

Temperature

ADEM Administrative Code 335-6-10-.09(5)(e)3(i) states that the maximum stream temperature in the Alabama River Basin shall not exceed 90 degrees Fahrenheit. Based on the low effluent flow/stream flow ratio, no evidence of past adverse effects, historical sampling data, and adequate travel time to the river to allow for cooling, the existing limit of 111°F is expected to be protective of water quality.

Total Residual Chlorine

The facility does not use a chlorine-treated water supply for cooling purposes; therefore, this parameter is not expected to be present in significant amounts and no monitoring is proposed.

DSN003: Non-contact fire pump pressure relief water, mill supply pump seal water, fire suppression water, and stormwater runoff from bark pile, oversized wood, skeet shooting range, and process water treatment areas.

Biochemical Oxygen Demand (5-Day), Total Suspended Solids

Based on the nature of the operations at the facility, monitoring stormwater for these parameters is expected to provide a measure of effectiveness of the facility's BMP plans.

Total Residual Chlorine

The facility does not use a chlorine-treated water supply for the non-stormwater sources to DSN003; therefore, this parameter is not expected to be present in significant amount and no monitoring is proposed.

Best Management Practices (BMPs) are believed to be the most effective way to control the contamination of stormwater from areas of industrial activities. This facility is required to maintain a BMP plan. The requirements of the BMP plan call for minimization of stormwater contact with waste materials, products and by-products, and for prevention of spills or loss of fluids from equipment maintenance activities. The effectiveness of the BMPs will be measured through the monitoring of the pollutants of concern.

Revision (February 4, 2019)

Based on comments received by the facility, the following changes were made to the permit and/or rationale:

- Wet decking process wastewater and storm water runoff from the wood yard was included as a contributing source to DSN001, which did not result in any changes to permit requirements.
- The pentachlorophenol daily maximum, BOD5 daily maximum, and TSS daily maximum and monthly average limitations were corrected to be consistent with the previous permit. The rationale discussion was modified to reflect this change.
- The time in which an equation is to be used to determine water quality based effluent limitations was specified as June through October in the rationale discussion and Part IV of the permit.
- The required toxicity testing has been revised to definitive testing (in lieu of screening).
- Attachment A to the rationale was corrected to show a required pH range of 6.0 to 9.0 S.U.

ATTACHMENT A: EFFLUENT GUIDELINE CALCULATIONS

Permit Limits Summary

Pollutant	Daily Maximum (lbs/day)	Monthly Average (lbs/day)	Basis
Current Permit			
BOD5 (Market Pulp)	34,708	17,354	June 1996 Production
TSS (Market Pulp)	74,376	37,188	June 1996 Production
Pentachlorophenol	3.30	-	June 1996 Production
Trichlorophenol	3.10	-	June 1996 Production
<i>Note: The current limitations are based on Subpart C; however, the facility is subject to both Subpart C and Subpart J, which has been corrected in the Renewal Application calculations</i>			
Renewal Application			
BOD5 (Market Pulp)	46,643	23,255	Highest Monthly Average of Last 12 Months (July '17 to June '18)
TSS (Market Pulp)	95,945	47,972	Highest Monthly Average of Last 12 Months (July '17 to June '18)
Pentachlorophenol	5.20	-	Highest Monthly Average of Last 12 Months (July '17 to June '18)
Trichlorophenol	4.1	-	Highest Monthly Average of Last 12 Months (July '17 to June '18)
<i>Note: Renewal application limitations are based on Subpart J and Subpart C of 40 CFR 430 using the production values provided in the permit application.</i>			
Proposed Permit Limitations			
BOD5 (Total)	34,708	17,354	
TSS (Total)	74376	37188	
Pentachlorophenol	3.30	-	
Trichlorophenol	3.1	-	

2018 Renewal Application

40 CFR 430 - Pulp and Paper Production Point Source Category

Subpart C - Unbleached Kraft Subcategory
40 CFR 430.32 - Best Practicable Technology (BPT) /Best Conventional Technology (BCT)

BPT effluent limitations for unbleached kraft facilities

PM1 Unbleached Kraft Production 1,894 ADT/day
 PM2 Unbleached Kraft Production 1,594 ADT/day
 Off-the-machine production = 6,976,798 lbs/day

Pollutant*	Continuous Discharges		Cluster Limitations	
	Daily Maximum (lbs/1000 lbs product)	Monthly Average (lbs/1000 lbs product)	Daily Maximum (lbs/day)	Monthly Average (lbs/day)
BOD ₅	5.6	2.8	39070	19535
TSS	12	6	83722	41861

*pH within the range of 5.0 to 9.0 S.U.

40 CFR 430.34 Best Available Technology (BAT)

Pollutant	Continuous Discharges		Cluster Limitations	
	Daily Maximum (lbs/1000 lbs product)	Monthly Average (lbs/1000 lbs product)	Daily Maximum (lbs/day)	Monthly Average (lbs/day)
Pentachlorophenol	0.00058	-	4.05	-
Trichlorophenol	0.00053	-	3.70	-

Subpart J - Secondary Fiber Nondeink Subcategory
40 CFR 430.102 - Best Practicable Technology (BPT*) = Best Conventional Technology (BCT)

*BPT = BAT Effluent Limitations

Secondary fiber non-deink facilities where paperboard from wastepaper is produced - corrugating medium finish subdivision

PM1 Unbleached Production 312.0 ADT/day
 PM2 Unbleached Production 352.3 ADT/day
 Off-the-machine production = 1,328,589 lbs/day

Pollutant*	Continuous Discharges		Cluster Limitations	
	Daily Maximum (lbs/1000 lbs product)	Monthly Average (lbs/1000 lbs product)	Daily Maximum (lbs/day)	Monthly Average (lbs/day)
BOD ₅	5.7	2.8	7573	3720
TSS	9.2	4.6	12223	6112

*pH within the range of 6.0 to 9.0 S.U.

40 CFR 430.104 Best Available Technology (BAT)

Pollutant	Continuous Discharges		Cluster Limitations	
	Daily Maximum (lbs/1000 lbs product)	Monthly Average (lbs/1000 lbs product)	Daily Maximum (lbs/day)	Monthly Average (lbs/day)
Pentachlorophenol	0.00087	-	1.16	-
Trichlorophenol	0.00030	-	0.40	-

Total Allocations (Subpart B & Subpart J)

Pollutant	Daily Maximum	
	Daily Maximum (lbs/day)	Monthly Average (lbs/day)
BOD ₅	46643	23255
TSS	95945	47972
Pentachlorophenol	5.20	-
Trichlorophenol	4.10	-

*pH within the range of 6.0 to 9.0 S.U.

Current Permit Limitations (Subpart C)

40 CFR 430 - Pulp and Paper Production Point Source Category

Subpart C - Unbleached Kraft Subcategory

40 CFR 430.32 - Best Practicable Technology (BPT) /Best Control Technology (BCT)

BPT effluent limitations for unbleached kraft facilities

Unbleached Kraft Linerboard 3099 ADT/day
 Off-the-machine production = 6,197,857 lbs/day

<i>Pollutant*</i>	Continuous Discharges		Cluster Limitations	
	<i>Daily Maximum (lbs/1000 lbs product)</i>	<i>Monthly Average (lbs/1000 lbs product)</i>	<i>Daily Maximum (lbs/day)</i>	<i>Monthly Average (lbs/day)</i>
BOD ₅	5.6	2.8	34708	17354
TSS	12	6	74374	37187

*pH within the range of 5.0 to 9.0 S.U.

40 CFR 430.34 Best Available Technology (BAT)

<i>Pollutant</i>	Continuous Discharges		Cluster Limitations	
	<i>Daily Maximum (lbs/1000 lbs product)</i>	<i>Monthly Average (lbs/1000 lbs product)</i>	<i>Daily Maximum (lbs/day)</i>	<i>Monthly Average (lbs/day)</i>
Pentachlorophenol	0.00058	-	3.59	-
Trichlorophenol	0.00053	-	3.28	-

Total Allocations (Subpart B)

Pollutant	Daily Maximum	
	<i>Daily Maximum (lbs/day)</i>	<i>Monthly Average (lbs/day)</i>
BOD ₅	34708	17354
TSS	74376	37188
Pentachlorophenol	3.3	-
Trichlorophenol	3.1	-

*pH within the range of 5.0 to 9.0 S.U.

*These limitations are based on June 1996 production numbers and have been carried forward to prevent anti-backsliding in previous permit issuances

ATTACHMENT B: REASONABLE POTENTIAL ANALYSIS

ATTACHMENT C: MIXING ZONE ANALYSIS

Mixing Zone Analysis Summary

Page 1

REQUEST INFORMATION

request number: 3548

From: (Responsible Engineer) In Branch/Section
 3/7/2019 4/6/2019 605
 9/20/2018

Receiving Waterbody

Previous Stream Name

Facility Name (Name of Discharger-WQ will use to file)

Previous Discharger Name

River Basin Outfall Latitude (decimal degrees)

*County Outfall Longitude (decimal degrees)

Permit Number Permit Type

Permit Status

Type of Discharger

Do other discharges exist that may impact the model? Yes No

If yes, impacting dischargers names.

Impacting dischargers permit numbers.

Existing Discharge Design Flow MGD

Proposed Discharge Design Flow MGD

Note: The flow rates given should be those requested for modeling.

Seasonal limits requested? Yes No

If not seasonal, only the summer sections will be used

Comments included
 Yes No

Information Verified By

Year File Was Started

12 Digit HUC Code

Use Classification

Site Visit Completed? Yes No

Date of MZ Response

Date of Site Visit

Hydrology

Drainage Area	15594	sq mi
Stream 7Q10	4056	cfs
Stream 1Q10	3042	cfs
Stream 7Q2	6313	cfs
Annual Average	24156	cfs

Method Used to Calculate

USGS Estimate
75% of 7Q10
USGS Estimate
USGS Estimate

Date of MZ Analysis

Model Completed by

Pollutant Category

Whole Effluent Toxicity (WET) Thermal Pathogens

Mixing Zone Analysis Summary

WET Parameters

Summer

Acute

Ambient Streamflow cfs
 ZID Length Meters
 ZID IWC %

Chronic

Ambient Streamflow 4056 cfs
 Mixing Zone Length 21.34 Meters
 Mixing Zone IWC 4.42 %

Winter

Acute

Ambient Streamflow cfs
 ZID Length Meters
 ZID IWC %

Chronic

Ambient Streamflow cfs
 Mixing Zone Length 21.34 Meters
 Mixing Zone IWC %

Thermal Parameters

Summer

Ambient Streamflow cfs
 Mixing Zone Length Meters
 Max. Effluent Temp °C

Winter

Ambient Streamflow cfs
 Mixing Zone Length Meters
 Max. Effluent Temp °C

Pathogen Parameters

Summer

Ambient Streamflow cfs
 ZID Length Meters
 Max. Effluent Fecal Conc Cols/100 mls
 Max. Effluent E. coli Conc Cols/100 mls
 Monthly Average Effluent E. coli Conc Cols/100 mls
 Max. Effluent Enterococci Conc (for coastal waters) Cols/100 mls

Winter

Ambient Streamflow cfs
 ZID Length Meters
 Max. Effluent Fecal Conc Cols/100 mls
 Max. Effluent E. coli Conc Cols/100 mls
 Monthly Average Effluent E. coli Conc Cols/100 mls
 Max. Effluent Enterococci Conc (for coastal waters) Cols/100 mls

Comments
 and/or
 Notations

LANCE R. LEFLEUR
DIRECTOR



KAY IVEY
GOVERNOR

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June 20, 2019

MEMORANDUM

TO: Alex Chavers, NPDES Industrial Section
FROM: Keosha Powell, Water Quality Branch
RE: CORMIX Review for International Paper-Prattville (NPDES AL0003115)

The Water Quality Branch has reviewed the CORMIX Dilution Modeling Summary report for NPDES Permit No. AL0003115 submitted by Jacobs Engineering Group, Inc. (Jacobs) on March 7, 2019. International Paper (IP) – Prattville discharges to the Alabama River (Woodruff Lake) with an existing effluent long-term average (LTA) flow rate of 32.4 MGD.

Model inputs used in ADEM's review were equivalent to those provided by Jacobs with the exception of the 7Q10 flow rate, which was determined to be 4056 cfs based on low-flow data obtained from reference gauge USGS 02420000. Employing the LTA flow rate and the 7Q10 value, a limiting dilution of 82:1 was determined. Therefore, based upon the established ADEM protocol for whole effluent toxicity determination, chronic toxicity using the 7Q10 flow applicable at the edge of the mixing zone was employed for this review. The applicable distance to the edge of the mixing zone is 21.34 meters, which is based upon the criterion stating the mixing zone area cannot exceed one-quarter of the stream cross-sectional area. An IWC of 4.42% was predicted for the LTA flow rate of 32.4 MGD.

IP-Prattville also requested changes to its stream monitoring requirements, which can be viewed in the attached analysis provided by Jacobs. The Water Quality Branch has reviewed those requests and has no objection to the proposed changes to the stream monitoring requirements.

KDP:kdp

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International Paper- Prattville CORMIX Review Rationale

Facility: International Paper-Prattville
Permit #: AL0003115

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Receiving Waterbody: Alabama River (Woodruff Lake)
County: Autauga
Date Completed: 6/20/19
Performed by: KDP-Water Quality

Facility: International Paper-Prattville
Permit #: AL0003115

CORMIX Review Rationale: International Paper- Prattville

I. BACKGROUND

Jacobs submitted a CORMIX modeling report to be reviewed by the Water Quality Branch on March 7, 2019 for International Paper (IP) - Prattville. The facility has an existing long-term average flow rate of 32.4 MGD (50.12 cfs). Model inputs for discharge and ambient parameters developed by Jacobs were utilized in the completion of this review with the exception of the 7Q10 flow. The facility utilizes three parallel diffusers to discharge treated wastewater into the Alabama River. For the purposes of this analysis, the three diffusers were designed as one 140 foot diffuser with a total of 48 ports.

II. AMBIENT CONDITIONS

The use classification for the Alabama River (Woodruff Lake) at the point of discharge is *Fish and Wildlife (F&W)*. Based on the information submitted by Jacobs, the Alabama River has a width, local depth, and average depth of 213 m, 13.2 m, and 13.2 m, respectively, at the point of discharge. Low-flow data obtained from the reference gauge (USGS 02420000) gave a 7Q10 value of 4056 cfs and a 1Q10 value of 3042 cfs at the discharge location. Utilizing the long-term average (LTA) flow of 32.4 MGD and the 7Q10 value, a limiting dilution of 82:1 was determined. Therefore, based upon the established ADEM protocol for Whole Effluent Toxicity (WET) determination, chronic toxicity using the 7Q10 flow applicable at the edge of the mixing zone will be employed for this review.

III. DISCHARGE CONFIGURATION

The IP- Prattville plant has three existing outfall diffusers that are parallel to each other. These diffusers, which are co-flowing, discharge treated wastewater to the Alabama River. The last fifty feet of each diffuser pipeline contains 16 ports comprised of eight 6-inch diameter openings and eight 7.5-inch square openings. The openings are oriented at a 45 degree angle downstream and are perpendicular to the pipeline.

Receiving Waterbody: Alabama River (Woodruff Lake)
County: Autauga
Date Completed: 6/20/19
Performed by: KDP-Water Quality

Facility: International Paper-Prattville
 Permit #: AL0003115

IV. MODEL EVALUATION

A submerged multiport diffuser is modeled with CORMIX2. In the modeling, the plume is positively buoyant and CORMIX2 predicts the plume's centerline to rise towards the surface. The CORMIX2 model also predicted an IWC of 4.42%, which is based on the mixing zone criterion stating the area of the mixing zone cannot exceed 25% of the stream cross-sectional area. According to WET protocol, if the limiting dilution is less than 100:1, chronic toxicity is applicable at the edge of the mixing zone. The mixing zone is the second of two allowable zones, the first being the zone of initial dilution. Water Quality Standards must be met at the edge of the mixing zone. ADEM's mixing zones have the following restrictions:

1. Mixing zone width cannot exceed half the stream width.
2. Mixing zone area cannot exceed one-quarter of the stream cross-sectional area.
3. Mixing zone length cannot exceed five times the width of the mixing zone.
4. Mixing zone cannot encompass drinking water intakes.
5. The total area of all mixing zones in a lake may not encompass more than 10% of the lake's surface area.
6. The radius of the mixing zone in a reservoir/lake is 750 feet.

V. ADEM MIXING ZONE CRITERIA

General Information

Facility:	International Paper-Prattville
Permit #:	AL0003115
Current Outfall #:	001

Receiving Waterbody:	Alabama River (Woodruff Lake)
Discharger Latitude:	32.368056
Discharger Longitude:	-86.485001

Ambient Conditions

Receiving Waterbody 7Q10:	4056	cfs	115	cms
Receiving Waterbody 1Q10:	3042	cfs	86	cms

Width of Waterbody @ discharge point:	213	m	700	ft
---------------------------------------	-----	---	-----	----

Receiving Waterbody: Alabama River (Woodruff Lake)
 County: Autauga
 Date Completed: 6/20/19
 Performed by: KDP-Water Quality

Facility: International Paper-Prattville
 Permit #: AL0003115

Depth of Waterbody @ discharge point:	13.2	m	43.3 ft
Average depth @ discharge point:	13.2	m	43.3 ft

Discharge Conditions:

Discharge flow rate:	50.12	cfs	32.4 MGD
----------------------	-------	-----	----------

WET Protocol

Limiting Dilution

$$S_{lim} = [(Q_w + 7Q_{10}) / Q_w]$$

Applicable Flow to Use in Model

Applicable Toxicity

82
7Q10
Chronic @ Edge of the MZ

Mixing Zone Criteria

- Mixing Zone width cannot exceed more than 1/2 the stream width(BS)
 $0.5 * B_s = 0.5 * 213m = 106.5 m$
- Mixing Zone area cannot exceed one-quarter of the stream cross-sectional area
 $0.25 * B_s * H_a = 0.25 * 213m * 13.2m = 703 m^2$
- Mixing Zone length cannot exceed 5 times the width of the mixing zone
 $5 * MZ_w = 5 * 106.5m = 533 m$
- Mixing zone may not encompass drinking water intakes
 N/A
- The total area of all mixing zone in a lake may not encompass more than 10% of the lake's surface area.
Total area MZ < 10% lake's surface area (12,510 acres)
 $0.1(12,510) = 1251 acres = 5,062,617 m^2$
- The radius of the mixing zone in a reservoir/lake is 750 feet.
229 m

Receiving Waterbody: Alabama River (Woodruff Lake)
 County: Autauga
 Date Completed: 6/20/19
 Performed by: KDP-Water Quality

Facility: International Paper-Prattville
Permit #: AL0003115

APPENDICES

I. AREA MAP

Figure 1. IP- Prattville Outfall Location Map (Aerial Overlay)



Receiving Waterbody: Alabama River (Woodruff Lake)
County: Autauga
Date Completed: 6/20/19
Performed by: KDP-Water Quality

Facility: International Paper-Prattville
Permit #: AL0003115

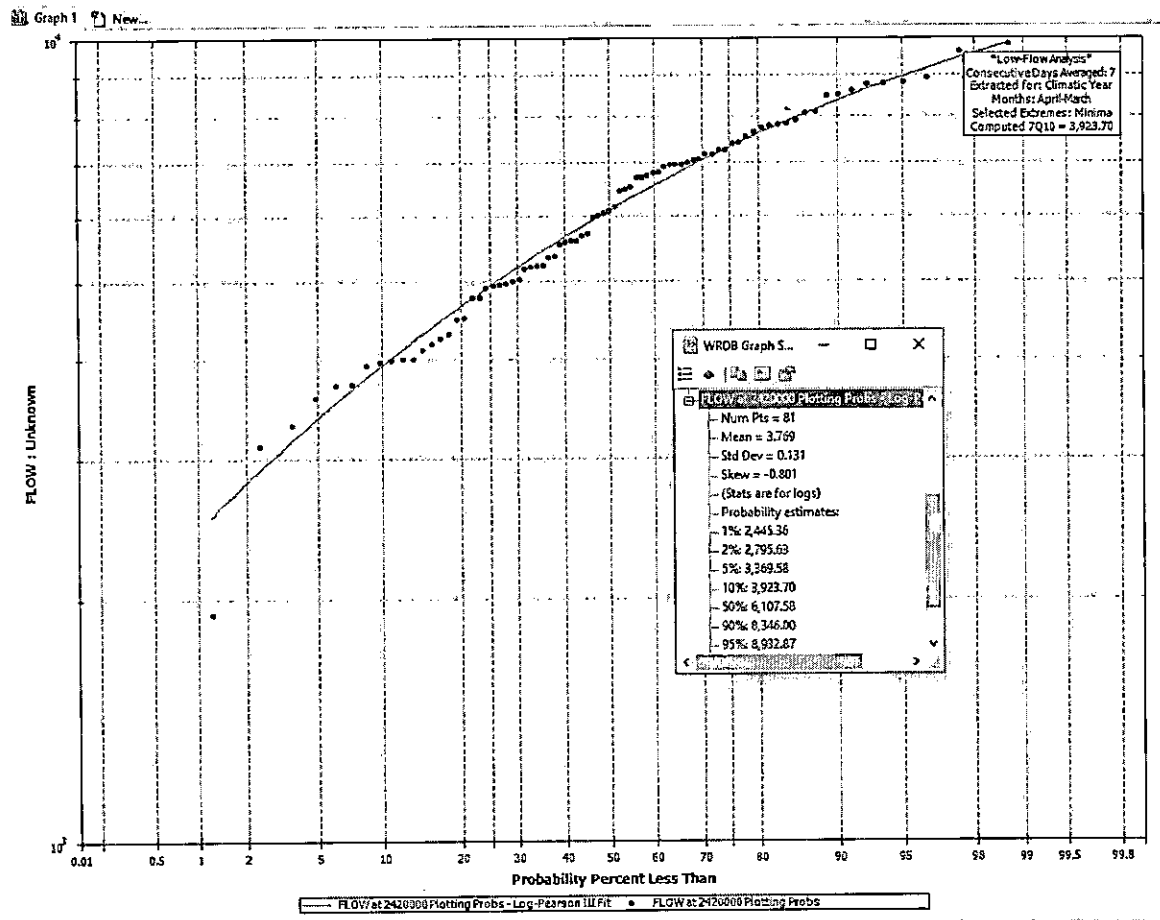
Figure 2. IP- Prattville Outfall Location (Topographic Layer)



Receiving Waterbody: Alabama River (Woodruff Lake)
County: Autauga
Date Completed: 6/20/19
Performed by: KDP-Water Quality

Facility: International Paper-Prattville
 Permit #: AL0003115

Figure 3. Calculated low-flows from WRDB 6.1 at the reference gauge (0242000)



Alabama River at IP-Prattville Outfall:

Using USGS Station 02420000 (Alabama River near Montgomery, AL)

$$7Q10 = 15594 \text{ mi}^2 * \frac{3923.7 \text{ cfs}}{15087 \text{ mi}^2} = 4056 \text{ cfs}$$

$$7Q2 = 15594 \text{ mi}^2 * \frac{6107.58 \text{ cfs}}{15087 \text{ mi}^2} = 6313 \text{ cfs}$$

$$1Q10 = 0.75 * 4056 \text{ cfs} = 3042 \text{ cfs}$$

Receiving Waterbody: Alabama River (Woodruff Lake)

County: Autauga

Date Completed: 6/20/19

Performed by: KDP-Water Quality

Chavers, Alexander

From: Chavers, Alexander
Sent: Wednesday, February 5, 2020 8:41 AM
To: Moody, Kelly (Houston)
Subject: RE: IP Prattville Comments on Draft Permit/Rationale/Limits Calculations, RE: IP Prattville - review

Kelly,

I have revised the draft and it is currently being reviewed. I will forward you a copy once it is signed and placed in the mail.

Below is a summary response to the comments provided on the draft permit for International Paper – Prattville Mill. A summary of the changes to the draft permit and/or rationale as a result of these comments can be found in the Revision section of the rationale. This response will be included with the final draft permit.

1. The DSN001 description in the permit and rationale, the DSN001 discussion and the applicable subparts was modified to include the infrequent/intermittent discharge of runoff from the wet yard area to the #3 Basin. ✓
2. Permit limits that were based on previous permit limitations were corrected in the permit and rationale to reflect existing limits (includes Pentachlorophenol daily maximum, BOD5 daily max, and TSS daily max and monthly average).
3. Ammonia monitoring was not removed from DSN001 based on the request. Monitoring for nutrients during the growing season (April to October) is required for all majors to ensure the Department has the loading information it may need to develop future permit limitations, if necessary.
4. Part IV.A – Stormwater BMP Requirements
 - a. DSN001 - The applicability was not removed from DSN001. While stormwater in this area does drain through a treatment system, the drainage area is still covered under BMP requirements, which includes operating in a way that prevents unnecessary exposure to stormwater.
 - b. DSN002 – The applicability was removed from DSN002 as this outfall does not discharge stormwater.
5. Part IV.B – Stormwater Measurement and Sampling Requirements
 - a. These requirements were removed from outfalls DSN001 and DSN002; however, the requirement will remain for DSN003 as it discharges stormwater (along with other various non-process wastewaters) and a discharge could occur due to a rain event.
6. The time period in which the equation and river monitoring is required was modified to be June through October throughout the rationale and permit.
7. The toxicity testing requirements were modified to require definitive testing with the dilutions previously discussed.
8. Duplicate paragraph deleted at the end of the toxicity testing requirements.
9. Attachment A
 - a. The production basis for PM1 OCC was maintained at 312 ADT/day. When determining a reasonable measure of production, we are looking at the OCC production as a whole, which includes both PM1 and PM2 productions, and should use the same time basis for each. The use of 312 ADT/day at PM1 and 352.3 ADT/day at PM2 (based on the Last 12 Months Highest Monthly Average) is more recent and sets a higher production basis than using the values based on the "Highest Year of Last 5 Monthly Average" (355.4 ADT/day at PM1 and 222 ADT/day at PM2).
 - b. The "Final Limitations" tab of the workbook was not used in the final permit and was deleted from the workbook.
 - c. The required pH Range of 6.0 to 9.0 S.U. was corrected in the appropriate tab of the workbook.

Alexander Chavers, P.E.
Env. Eng. Specialist, Sr.
Industrial Section
Industrial/Municipal Branch

(334) 271-7851



From: Moody, Kelly (Houston) <Kelly.Moody@advisian.com>
Sent: Thursday, December 5, 2019 11:01 AM
To: Chavers, Alexander <adchavers@adem.alabama.gov>
Cc: Jerry Horne <Jerry.Horne@ipaper.com>; Billy J Scott <Billy.Scott@ipaper.com>; Brett Atchison <Brett.Atchison@ipaper.com>; Tony D. Owens <Tony.Owens@ipaper.com>; Martin, J.P./MGM <J.P.Martin@jacobs.com>; Gerow, Eleanor/PNS <eleanor.gerow@jacobs.com>
Subject: IP Prattville Comments on Draft Permit/Rationale/Limits Calculations, RE: IP Prattville - review

Alex,

IP appreciates the opportunity to review the October 29 draft permit, rationale, and limit calculations for the Prattville mill. We have completed our review and are providing the attached comments for ADEM's consideration. The files attached include:

- The 1st file is a 2-page summary of the comments
- The 2nd and 3rd files are the comments reflected in the permit and the rationale in track changes mode
- The last file is the limits workbook (Attachment A to the permit rationale) that you provided for our review. There are 2 comments captured within the workbook re: the correct production basis for PM1 OCC and modifying the Final Limits tab showing current limits as maintained per ABS. There is also 1 comment on the Comment Summary related to the pH range noted in the workbook.

Please let us know if you have any questions regarding these comments, or require any additional information. We also would appreciate review of the revised draft based on these comments or other changes ADEM may make before the permit is issued for public notice.

Thanks!

Kelly Moody

Senior Project Manager

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From: Moody, Kelly (Houston)
Sent: Wednesday, November 20, 2019 11:06 AM
To: Chavers, Alexander <adchavers@adem.alabama.gov>
Cc: Jerry Horne <Jerry.Horne@ipaper.com>; Billy J Scott <Billy.Scott@ipaper.com>; Brett Atchison <Brett.Atchison@ipaper.com>; Tony D. Owens <Tony.Owens@ipaper.com>; Martin, J.P./MGM <J.P.Martin@jacobs.com>
Subject: IP Prattville - review

Alex – thanks for sending the workbook for our review of the production basis and calculations. Per my brief call with you yesterday, we understand that IP may have additional time to review the draft permit dated October 29, 2019, and the workbook, and will submit comments to ADEM by **Friday, December 6.**

Let us know if you have any questions in the interim.

Thanks!

Kelly Moody

Senior Project Manager

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E kelly.moody@advisian.com

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From: Chavers, Alexander <adchavers@adem.alabama.gov>

Sent: Tuesday, November 19, 2019 2:36 PM

To: Moody, Kelly (Houston) <Kelly.Moody@advisian.com>

Subject: FW: Attachment A[External Sender]

From: Chavers, Alexander

Sent: Monday, November 18, 2019 11:21 AM

To: Moody, Kelly/MGM <Kelly.Moody@jacobs.com>

Subject: Attachment A

Hopefully this will help.

Alexander Chavers, P.E.

Env. Eng. Specialist, Sr.

Industrial Section

Industrial/Municipal Branch

(334) 271-7851



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Chavers, Alexander

From: Moody, Kelly (Houston) <Kelly.Moody@advisian.com>
Sent: Thursday, December 5, 2019 11:01 AM
To: Chavers, Alexander
Cc: Jerry Horne; Billy J Scott; Brett Atchison; Tony D. Owens; Martin, J.P./MGM; Gerow, Eleanor/PNS
Subject: IP Prattville Comments on Draft Permit/Rationale/Limits Calculations, RE: IP Prattville - review
Attachments: IP Prattville AL0003115_Draft Permit_Comments Summary_05Dec2019.docx; IP Prattville Draft Permit_Comments_05Dec2019.doc; IP Prattville Rationale_Comments_05Dec2019.doc; Permit Calculations (003).xlsx

Alex,

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- The 1st file is a 2-page summary of the comments
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Please let us know if you have any questions regarding these comments, or require any additional information. We also would appreciate review of the revised draft based on these comments or other changes ADEM may make before the permit is issued for public notice.

Thanks!

Kelly Moody

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Worley Group

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Sent: Wednesday, November 20, 2019 11:06 AM
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Subject: IP Prattville - review

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Let us know if you have any questions in the interim.

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Kelly Moody
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P +13129648637
E kelly.moody@advisian.com
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From: Chavers, Alexander <adchavers@adem.alabama.gov>
Sent: Tuesday, November 19, 2019 2:36 PM
To: Moody, Kelly (Houston) <Kelly.Moody@advisian.com>
Subject: FW: Attachment A[External Sender]

From: Chavers, Alexander
Sent: Monday, November 18, 2019 11:21 AM
To: Moody, Kelly/MGM <Kelly.Moody@jacobs.com>
Subject: Attachment A

Hopefully this will help.

Alexander Chavers, P.E.
Env. Eng. Specialist, Sr.
Industrial Section
Industrial/Municipal Branch
(334) 271-7851



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Review Comments: International Paper, Prattville,
Draft NPDES Permit AL0003115 (dated October 29, 2019)

1. IP requests that the permit and rationale be modified to include the potential infrequent/intermittent discharge of runoff from the wet yard area to # 3 Basin, which ultimately discharges through DSN001. With this change, it is noted that the facility is also subject to 40 CFR 429, Subpart I, but no changes to the permit are needed other than those annotated on the following attached pages of the permit and rationale:
 - Pages 1-4 of 29, Part I.A DSN001 description
 - Permit Rationale, DSN001 description on the first page and in the DSN001 discussion
 - Associated with this change, please add 40 CFR 429, Subpart I to the Industrial Category on the first page of the Permit Rationale
2. IP understands that ADEM considers that anti-backsliding requirements apply to this outfall; based on this position, ADEM will modify the DSN001 TSS limits to reflect the existing limits.
 - Page 1 of 29 Part I.A. and Permit Rationale limits table DSN0011 – TSS Monthly Average Limit should be 37,188 lbs/day; and Daily Maximum limit - 74,376 lbs/day
3. IP requests deletion of Ammonia monitoring from DSN001. The current permit does not require monitoring for ammonia; the concentration reported in the application is 0.28 mg/L and there are no water quality issues anticipated with discharge of ammonia through DSN001.
 - Page 1 of 29, Part I.A and Permit Rationale discussion of DSN001, BPJ, Nutrients - delete ammonia from the limits page and from the discussion in the rationale.
4. IP requests clarification that the BMP Plan referenced in Part IV.A is not applicable to DSN001 (consistent with the current permit), and removal of reference to the BMP plan for DSN002 since there is no industrial activity or stormwater discharge associated with DSN002.
 - Pages 1 - 4 of 29 – delete footnote referencing Part IV.A for DSN001
 - Page 5 of 20 – delete footnote referencing Part IV.A for DSN002
 - Page 23 of 29, Part IV.A.1 - Include the statement (similar to the current permit) clarifying that the BMP is not applicable to areas where releases to stormwater discharge to DSN001.
5. IP requests deletion of Part IV.B Stormwater requirements as not relevant to the IP discharge.
 - Pages 2, 5, 6 of 29 – delete footnotes referencing Part IV.B.
 - Page 24 of 29 – delete Part IV.B.
6. IP requests that river monitoring requirements and the governing BOD equation period be specified for June 1 through September 30 as supported by the stream monitoring data review and to provide consistency in the monitoring period. The following attached pages of the permit and the rationale are annotated to reflect this change:
 - Page 2 of 29, DSN001 Certification – River Monitoring
 - Page 29 of 29, Part IV.E. opening paragraphs
 - Page 29 of 20, Part IV.F – Additional requirements regarding BOD equation
 - Permit Rationale – DSN001, WQBEL, BOD discussion and Stream Monitoring Requirements discussion (note that reference to the permit section for river monitoring details is annotated for correction in the rationale).

Review Comments: International Paper, Prattville -Draft NPDES Permit No. AL 0003115 (dated October 29, 2019)

7. IP requests that toxicity testing be modified to specify definitive testing (in lieu of screening). A change in testing will require the test requirements on Page 25 of 29, Part IV.D.1.a. to be modified. In addition, IP requests that Part IV.D.1.d be modified to allow 14 days (in lieu of 1 calendar week) for re-testing toxicity following a noncompliance.
8. IP has annotated a duplicate paragraph Part IV.D.2.g. (on Page 28 of 219) for deletion.
9. IP requests that Attachment A to the rationale (permit calculations) be corrected for the following:
 - PM1 OCC production basis should be 355.4 ADT/d (not 312 ADT/d) – refer to Table 3-1 of the application for renewal. *[See comment on Renewal Application tab in the workbook.]*
 - Update final limits in the workbook to match the current limits to reflect ADEM's position of anti-backsliding. *[See comment on Final Limitations tab of the workbook.]*
 - Note also that on the Renewal Application tab there is reference to pH within the range of 5.0 to 9.0 S.U.; however, the permitted pH range for IP Prattville is 6.0 to 9.0 S.U.



Alabama Department of Environmental Management
adem.alabama.gov

1400 Coliseum Blvd. 36110-2400 ■ Post Office Box 301463
Montgomery, Alabama 36130-1463
(334) 271-7700 ■ FAX (334) 271-7950

FACT SHEET

**APPLICATION FOR
NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM
PERMIT TO DISCHARGE POLLUTANTS TO WATERS OF
THE STATE OF ALABAMA**

Date: June 26, 2019

Prepared By: Alex Chavers

NPDES Permit No. AL0003115

1. Name and Address of Applicant:

International Paper
100 Jensen Road
Prattville, AL 36067

2. Name and Address of Facility:

International Paper - Prattville Mill
100 Jensen Road
Prattville, Alabama 36067

3. Description of Applicant's Type of Facility and/or Activity Generating the Discharge:

Individual Permit - Standard

4. Applicant's Receiving Waters

<u>Receiving Waters</u>	<u>Classification</u>
Alabama River	Tier 1, F&W
Autauga Creek	F&W

For the Outfall latitude and longitude see the permit application.

5. Permit Conditions:

See attached Rationale and Draft Permit.

6. PROCEDURES FOR THE FORMULATION OF FINAL DETERMINATIONS

a. Comment Period

The Alabama Department of Environmental Management proposes to issue this NPDES permit subject to the limitations and special conditions outlined above. This determination is tentative.

Interested persons are invited to submit written comments on the draft permit to the following address:



Russell A. Kelly, Chief
Permits and Services Division
Alabama Department of Environmental Management
1400 Coliseum Blvd
(Mailing Address: Post Office Box 301463; Zip 36130-1463)
Montgomery, Alabama 36110-2059
(334) 271-7714

All comments received prior to the closure of the public notice period (see public notice for date) will be considered in the formulation of the final determination with regard to this permit.

b. Public Hearing

A written request for a public hearing may be filed within the public notice period and must state the nature of the issues proposed to be raised in the hearing. A request for a hearing should be filed with the Department at the following address:

Russell A. Kelly, Chief
Permits and Services Division
Alabama Department of Environmental Management
1400 Coliseum Blvd
(Mailing Address: Post Office Box 301463; Zip 36130-1463)
Montgomery, Alabama 36110-2059
(334) 271-7714

The Director shall hold a public hearing whenever it is found, on the basis of hearing requests, that there exists a significant degree of public interest in a permit application or draft permit. The Director may hold a public hearing whenever such a hearing might clarify one or more issues involved in the permit decision. Public notice of such a hearing will be made in accordance with ADEM Admin. Code r. 335-6-6-.21.

c. Issuance of the Permit

All comments received during the public comment period shall be considered in making the final permit decision. At the time that any final permit decision is issued, the Department shall prepare a response to comments in accordance with ADEM Admin. Code r. 335-6-6-.21. **The permit record, including the response to comments, will be available to the public via the eFile System (<http://app.adem.alabama.gov/eFile/>) or an appointment to review the record may be made by writing the Permits and Services Division at the above address.**

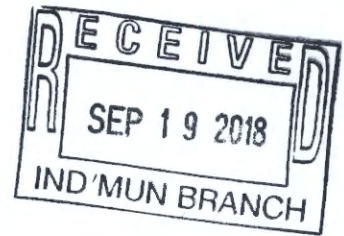
Unless a request for a stay of a permit or permit provision is granted by the Environmental Management Commission, the proposed permit contained in the Director's determination shall be issued and effective, and such issuance will be the final administrative action of the Alabama Department of Environmental Management.

d. Appeal Procedures

As allowed under ADEM Admin. Code chap. 335-2-1, any person aggrieved by the Department's final administrative action may file a request for hearing to contest such action. Such requests should be received by the Environmental Management Commission within thirty days of issuance of the permit. Requests should be filed with the Commission at the following address:

Alabama Environmental Management Commission
1400 Coliseum Blvd
(Mailing Address: Post Office Box 301463; Zip 36130-1463)
Montgomery, Alabama 36110-2059

All requests must be in writing and shall contain the information provided in ADEM Admin. Code r. 335-2-1-.04.



International Paper, Prattville Mill
Prattville, Alabama

Application for Renewal of
NPDES Permit No. AL0003115

Prepared for

Alabama Department of
Environmental Management

September 2018

ch2m:SM

4121 Carmichael Road
Suite 400
Montgomery, AL 36106

RECEIVED
SEP 19 2018
ADEM FRONT DESK

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Acronyms and Abbreviations

°C	degrees Celsius
ADEM	Alabama Department of Environmental Management
ADT/d	air dry tons per day
ADT/y	air dry tons per year
BOD ₅	5-day biochemical oxygen demand
ADMI	American Dye Manufacturer's Institute
BOD ₅	5-day biochemical oxygen demand
C	composite sample
CFR	Code of Federal Regulations
COD	chemical oxygen demand
DO	dissolved oxygen
ELG	Effluent Limitation Guidelines
EPA	U.S. Environmental Protection Agency
G	grab sample
GC/MS	gas chromatography/mass spectrometry
IP	International Paper Company
lb/day	pounds per day
mg/L	milligrams per liter
NCASI	National Council of the Paper Industry for Air and Stream Improvement
NH ₃ -N	ammonia as nitrogen
NO ₃	nitrate
NPDES	National Pollutant Discharge Elimination System
OCC	old corrugated containers
PCP	pentachlorophenol
PCB	polychlorinated biphenyl
PM	paper machine
Q _R	flow rate
TCP	trichlorophenol
TSS	total suspended solids
s.u.	standard units
SM	Standard Methods for the Examination of Water and Wastewater
SVOC	semivolatile organic compound
TKN	total Kjeldahl nitrogen
TOC	total organic carbon
TON	total organic nitrogen
VOC	volatile organic compound

SECTION 1

Introduction

International Paper (IP), Prattville Mill, located in Prattville, Alabama, is herein submitting an application for renewal of the Prattville Mill National Pollutant Discharge Elimination System (NPDES) Permit No. AL0003115.

1.1 Description of Mill Operations

The IP Prattville Mill is located at 100 Jensen Road in Prattville, Alabama. The mill is subject to the Effluent Limitation Guidelines (ELGs) in 40 Code of Federal Regulations (CFR) 430 - Pulp, Paper, and Paperboard Point Source Category, and is authorized currently to discharge process water, nonprocess water, and stormwater via three outfalls to the Alabama River and Autauga Creek.

The mill utilizes the kraft (sulfate) process to produce pulp, turpentine, and wood fat soaps from wood chips. Pulp also is produced from post-consumer waste paper. The pulp is converted to linerboard using two paper machines. Crude tall oil is produced by acidulation of wood fat soaps (black liquor skimmings) and is shipped offsite. Crude sulfate turpentine is condensed, recovered, and shipped offsite.

1.2 Application for NPDES Permit Renewal

This NPDES permit application summarizes the discharge locations, outfall sampling methods and results, and derivation and discussion of requested permit limitations. The IP Prattville Mill's current NPDES permit expires on March 31, 2019. The NPDES permit renewal application is due October 2, 2018, 180 days prior to the current permit expiring. The application package provides the following:

- Description of Outfalls and Sampling Methodology (Section 2)
- Derivation of Permit Limitations (Section 3)
- Requested Permit Limits and Monitoring (Section 4)
- Site Maps and Completed NPDES Application Forms
 - Appendix A – ADEM Form 187
 - Appendix B – EPA Form 1
 - Appendix C – EPA Form 2C
 - Appendix D – EPA Form 2E
 - Appendix E – EPA Form 2F
 - Appendix F – Application Figures

SECTION 2

Discharge Sampling Methodology

2.1 Description of Outfalls

The IP Prattville Mill has three permitted outfalls, which were sampled as outlined in Table 2-1 for the application for permit renewal.

Table 2-1. NPDES Outfall Descriptions and Required Sampling
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Outfall	Receiving Water	Description of Sources	Required Sampling/Comments
DSN001	Alabama River	Process water; landfill leachate; stormwater runoff	Sampled on 07/24/2018 in accordance with EPA Form 2C
DSN002	Alabama River	Non-process water (non-contact turbine condenser cooling water)	Sampled on 07/24/2018 in accordance with EPA Form 2E
DSN003	Autauga Creek	Non-process water (non-contact fire pump pressure relief water, mill supply pump seal water, fire suppression system water); stormwater runoff	Sampled on 07/24/2018 in accordance with EPA Form 2E and on 07/31/2018 in accordance with EPA Form 2F

EPA = U.S. Environmental Protection Agency

2.2 Outfall Sample Methodology

Tables 2-2, 2-3, and 2-4 list the parameters and analytical methods that were used in sampling the outfalls. Samples were collected by Tuscaloosa Testing Laboratories staff, and analysis was performed by Test America Laboratories of Pensacola, Florida. Analytical data from the recent application sampling effort are presented for each outfall on Forms 2C, 2E, and 2F in Appendixes C, D, and E, respectively.

Table 2-2. Process Water Outfall Sampling Parameters for DSN001
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Parameter	Sample Type	Method	Preservative	Holding Time
EPA Form 2C, Part V-A-Requirements				
pH	G	EPA150.2/SM4500H+B	None	Field Measurement Analyze immediately (15 minutes)
Temperature	G	SM2S50B	None	Field Measurement Analyze immediately (15 minutes)
BOD ₅	G	SM5210B	≤6°C	48 hours
COD	G	SM5220 C or D	Sulfuric Acid to pH <2, ≤6°C	28 days
TSS	G	SM2S40D	≤6°C	7 days
NH ₃ -N	G	EPA350.1/SM4500NH3	Sulfuric Acid to pH<2, ≤6°C	28 days
TOC	G	SM5310 B, C, or D	Hydrochloric Acid or Sulfuric Acid to pH<2, ≤6°C	28 days

Table 2-2. Process Water Outfall Sampling Parameters for DSN001
 Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Parameter	Sample Type	Method	Preservative	Holding Time
EPA Form 2C, Part V-B-Requirements				
Color, ADMI	G	SM2120F/ NCASI 253	≤6 °C	48 hours
Fecal Coliform	G	SM9222D	≤6 °C	6 hours
Fluoride	G	EPA300.0	Sulfuric Acid to pH<2, ≤6°C	28 days
Nitrate-Nitrite	G	EPA300.0/353.2/ SM4500-NO3	Sulfuric Acid to pH<2, ≤6°C	28 days
TON	TON will be calculated by subtracting the NH3 results (from Part V-A) from TKN.			
TKN	G	EPA351.2/SM4500NH3	Sulfuric Acid to pH<2, ≤6°C	28 days
Oil and Grease	G	EPA1664A	Sulfuric Acid to pH <2, ≤6°C	28 days
Total Phosphorus (as P)	G	EPA365.1/SM4500P	Sulfuric Acid to pH <2, ≤6°C	28 days
Radioactivity: Alpha Total	G	EPA900.0	Nitric Acid to pH <2	6 months
Beta, Total				
Radium, Total	G	EPA903.0	Nitric Acid to pH <2	6 months
Radium 226, Total	G	EPA903.1	Nitric Acid to pH <2	6 months
Sulfate	G	EPA 300.0/ 375.2/ SM4500SO4	≤6 °C	28 days
Sulfide	G	SM4500-S	Zn Acetate to pH>9, ≤6°C	7 days
Sulfite	G	SM4500SO3	≤6 °C	Field Measurement Analyze immediately (15 minutes)
Surfactants	G	SM5540 C	≤6 °C	48 hours
Aluminum, Total	G	EPA200.8	Nitric Acid to pH <2	180 days
Barium, Total	G	EPA200.8	Nitric Acid to pH <2	180 days
Boron, Total	G	EPA200.8	Nitric Acid to pH <2	180 days
Cobalt, total	G	EPA200.8	Nitric Acid to pH <2	180 days
Iron, Total	G	EPA200.8	Nitric Acid to pH <2	180 days
Magnesium, Total	G	EPA200.8	Nitric Acid to pH <2	180 days
Molybdenum	G	EPA200.8	Nitric Acid to pH <2	180 days
Manganese, Total	G	EPA200.8	Nitric Acid to pH <2	180 days
Tin, Total	G	EPA200.8	Nitric Acid to pH <2	180 days
Titanium, Total	G	EPA200.8	Nitric Acid to pH <2	180 days

Table 2-2. Process Water Outfall Sampling Parameters for DSN001
 Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Parameter	Sample Type	Method	Preservative	Holding Time
EPA Form 2C, Part V-C-Requirements				
Antimony, Total	G	EPA200.8	Nitric Acid to pH<2	180 days
Arsenic, Total	G	EPA200.8/ SM3113B	Nitric Acid to pH<2	180 days
Beryllium, Total	G	EPA200.8	Nitric Acid to pH<2	180 days
Cadmium, Total	G	EPA200.8	Nitric Acid to pH<2	180 days
Chromium, Total	G	EPA200.8	Nitric Acid to pH<2	180 days
Copper, Total	G	EPA200.8	Nitric Acid to pH<2	180 days
Lead, Total	G	EPA200.8/ SM3113B	Nitric Acid to pH<2	180 days
Mercury, Total ¹	G	EPA1631E	5 mL/L 12N Hydrochloric acid	90 days
Nickel, Total	G	EPA200.8	Nitric Acid to pH<2	180 days
Selenium, Total	G	EPA200.8/ SM3113B	Nitric Acid to pH<2	180 days
Silver, Total	G	EPA200.8	Nitric Acid to pH<2	180 days
Thallium, Total	G	EPA200.8/SM3113B	Nitric Acid to pH<2	180 days
Cyanide, Total	G	EPA335.4/ SM4500-CN C, D, or E	Sodium Hydroxide to pH>12, ≤6°C	14 days
Zinc, Total	G	EPA200.8	Nitric Acid to pH<2	180 days
Phenols, Total	G	EPA420.1/	Phosphoric Acid to pH<2,	24 hours
		EPA420.4/SM5530 B or D	copper sulfate, ≤6 °C Sulfuric Acid to pH<2, ≤6°C	28 days
2,3,7,8-Tetrachlorodibenzo- P-Dioxin	G	EPA1613B	≤6°C	1 year
GC/MS Fraction, VOC	G	EPA624	Hydrochloric Acid to pH<2, ≤6°C	14 days
		EPA625	≤6°C	7 days to extract, 40 days to analyze
SVOC, Acid	G	EPA625	≤6°C	7 days to extract, 40 days to analyze
SVOC, Base/Neutral	G	EPA625	≤6°C	7 days to extract, 40 days to analyze
PCB/Pesticides	G	EPA608	≤6°C	1 year until extraction, 1 year after extraction

Table 2-2. Process Water Outfall Sampling Parameters for DSN001
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Parameter	Sample Type	Method	Preservative	Holding Time
Notes:				
¹ EPA method 1631E requires the use of EPA Method 1669 <i>Sampling Ambient Water for Trace Metals at EPA Water Quality Criteria Levels (July 1996)</i> for the collection of low level mercury samples using fluoropolymer bottles with fluoropolymer-lined caps preserved within 48 hours of sample collection.				
°C = degrees Celsius				
ADMI = American Dye Manufacturer's Institute				
BOD ₅ = 5-day biochemical oxygen demand				
COD = chemical oxygen demand				
G = grab sample				
GC/MS = gas chromatography/mass spectrometry				
NCASI = National Council of the Paper Industry for Air and Stream Improvement				
NH ₃ -N = ammonia as nitrogen				
NO ₃ = nitrate				
PCB = polychlorinated biphenyl				
SM = Standard Methods for the Examination of Water and Wastewater				
SVOC = semivolatile organic compound				
TKN = total Kjeldahl nitrogen				
TOC = total organic carbon				
TON = total organic nitrogen				
TSS = total suspended solids				
VOC = volatile organic compound				

Table 2-3. Non-process Wastewater Outfall Sampling Parameters for DSN002 and DSN003
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Parameter	Sample Type	Method	Preservative	Holding Time
pH	G	EPA150.2/ SM4500H+B	None	Field Measurement Analyze immediately (15 minutes)
BOD ₅	C	SM5210B	≤6°C	48 hours
TSS	C	SM2540D	≤6°C	7 days
Fecal Coliform	G	SM9222D	≤6 °C	6 hours
Total Residual Chlorine	G	SM4500-Cl	None	Immediate (field measurement)
Oil & Grease	G	EPA1664A	Sulfuric Acid to pH <2, ≤6°C	28 days
COD (<i>002 only</i>)	C	SM5220 C or D	Sulfuric Acid to pH <2, ≤6°C	28 days
TOC (<i>002 only</i>)	C	SM5310 B, C, or D	Hydrochloric Acid or Sulfuric Acid to pH<2, ≤6°C	28 days
NH ₃ -N	C	EPA350.1/ SM4500NH3	Sulfuric Acid to pH<2, ≤6 °C	28 days
Temperature	G	SM2550B	None	Field Measurement Analyze immediately (15 minutes)

C = composite sample

Table 2-4. Stormwater Outfall Sampling Parameters for DSN003
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Parameter	Sample Type	Method	Preservative	Holding Time
EPA Form 2F, Part VII-A Requirements				
pH	G	EPA150.2/ SM4500H+B	None	Field Measurement Analyze immediately (15 minutes)
Oil & Grease	G	EPA1664A	Sulfuric Acid to pH <2, ≤6 °C	28 days
BOD ₅	G/C	SM5210B	≤6°C	48 hours
COD	G/C	SM5220 C or D	Sulfuric Acid to pH <2, ≤6°C	28 days
TSS	G/C	SM2540D	≤6°C	7 days
Total Nitrogen	Total Nitrogen will be calculated by adding the Nitrate-Nitrite and TKN results			
Nitrate-Nitrite	G	EPA300.0/353.2/ SM4500-NO3	Sulfuric acid to pH<2, ≤6°C	28 days
TKN	G	EPA351.2/ SM4500-NH3	Sulfuric Acid to pH<2, ≤6°C	28 days
Total Phosphorus	G/C	EPA365.1/SM4500P	Sulfuric Acid to pH <2, ≤6 °C	28 days
EPA Form 2F, Part VII-C Requirements				
Total Residual Chlorine	G	SM4500-Cl	None	Immediate (field measurement)
Color, ADMI	G/C	SM2120C/NCASI 253	≤6 °C	48 hours
Fecal Coliform	G	SM9222D	≤6 °C	6 hours
Fluoride	G/C	EPA300.0	Sulfuric Acid to pH<2, ≤6 °C	28 days
Nitrate-Nitrite	G/C	EPA300.0/353.2/ SM4500-NO3	Sulfuric acid to pH<2, <6 °C	28 days
TON	TON will be calculated by subtracting the NH3 results from TKN (analyzed under Part VII-A)			
NH3-N	G/C	EPA350.1/SM4500NH3	Sulfuric Acid to pH<2, ≤6 °C	28 days
Sulfate	G/C	EPA 300.0/ 375.2/ SM4500SO4	≤6 °C	28 days
Sulfite	G/C	SM4500SO3	≤6 °C	Field Measurement Analyze immediately (15 minutes)
Surfactants	G/C	SM5540 C	≤6 °C	48 hours
Aluminum, Total	G/C	EPA200.8	Nitric Acid to pH <2	180 days
Barium	G/C	EPA200.8	Nitric Acid to pH <2	180 days
Iron, Total	G/C	EPA200.8	Nitric Acid to pH <2	180 days
Magnesium, Total	G/C	EPA200.8	Nitric Acid to pH <2	180 days
Manganese	G/C	EPA200.8	Nitric Acid to pH <2	180 days

Derivation of Permit Limitations

This section discusses the applicable ELG subparts, ELG calculations, and water quality-based limitations for the IP Prattville NPDES permit renewal. There are no planned mill changes during the next permit cycle that will impact the production-based limits; however, with this permit renewal, IP is requesting correction of the applicable ELGs in the permit basis to include Subpart J for the portion of the pulp furnished from old corrugated cardboard (OCC).

3.1 Applicable Effluent Limitation Guidelines

Based on operations at IP Prattville Mill, 40 CFR 430, *Subpart C (Unbleached Kraft)* and *Subpart J (Secondary Fiber)* ELGs are applicable and provide the basis for the calculated allocations for the ELG-based limits presented in this section. Note that ADEM's 2013 permit rationale and ELG calculations assume Subpart C applicability only, which is discussed further in Section 3.2.

3.2 ELG Calculations

Production-based effluent limits are calculated using a reasonable measure of actual long-term production. The linerboard production values shown in Table 3-1 reflect historical values from 2013 through June 2018. For these values, production is defined as off-the-machine production (including off-the-machine coating where applicable). Production furnished from kraft pulp is subject to Subpart C. Production furnished from recycled pulp is subject to Subpart J. The NPDES permit production basis is presented in Table 3-1.

Table 3-1. NPDES Permit Production Basis
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Process Description	Last 12 Months ¹ Highest Monthly Average 1,000 lb/day	Highest Year of Last 5 ² Monthly Average 1,000 lb/day
PM1 Unbleached Kraft Production from Wood Pulp ³	3,789 (1,894 ADT/d)	3,674 (1,837 ADT/d)
PM2 Unbleached Kraft Production from Wood Pulp ³	3,188 (1,594 ADT/d)	2,486 (1,243 ADT/d)
PM1 Unbleached Production from Old Corrugated Container Pulp ⁴	624 (312 ADT/d)	710.7 (355.4 ADT/d)
PM2 Unbleached Production from Old Corrugated Container Pulp ⁴	704.5 (352.3 ADT/d)	445 (222 ADT/d)

¹ Last 12 months: July 2017 through June 2018

² Highest Year of Last 5: 2013 through 2017

³ Measured as off-the-machine production furnished by kraft pulp; regulated by 40 CFR 430, Subpart C (40 CFR 430.32)

⁴ Measured as off-the-machine production furnished by OCC; regulated by 40 CFR 430, Subpart J (40 CFR 430.102)

ADT/d = air dry tons per day

ADT/y = air dry tons per year

lb/day = pounds per day

PM = paper machine

The calculated ELG-based allocations for 5-day biochemical oxygen demand (BOD₅) and total suspended solids (TSS) based on 2013 to June 2018 historical production are shown in Table 3-2; the current permit limits are listed for comparison. It is noted that the current permit limits were set in 2014 (and previously in 2007) to avoid backsliding, with the more stringent limits for BOD₅, TSS, pentachlorophenol (PCP), and trichlorophenol (TCP) retained from the previous permit rather than setting the limits based on the calculated 2012 production-based allocations.

As noted above, it also appears that previous permit limits were based on applicability of Subpart C only. For additional comparison, Table 3-2 includes a correction to the current permit limits for that portion of the pulp furnished from OCC. To make the correction, the production basis that set the current permit limits was back-calculated using the current limits and the ELG factors, resulting in a total production of 3,099 ADT/day. This production basis was confirmed by reviewing historical production information provided in the 2001 application, which reported a maximum yearly average production of 3,091 ADT/day between 1996 and 2000. [It was noted that with the 2001 application IP requested additional allocation for a planned sustained production increase of 3,276 ADT/day; however, this additional allocation does not appear to be reflected in the current limits.]

Based on the 2013 to 2018 data, the OCC pulp contribution has ranged between 4% and 21%, averaging 11%. The OCC pulp contribution when the current permit limits were set is not available in the historical (2001 and 2006) applications. The corrected allocations, therefore, reflect the 3,099 ADT/day, split between Subpart B (virgin pulp) and Subpart J (OCC furnished pulp) at a ratio of 4% OCC (the lower end of the range based on 2013 to 2018 production).

With this permit renewal, IP is requesting correction of the permit basis to include application of both Subparts C and J at the calculated allocations based on 2013 to 2018 production, as shown below.

Table 3-2. Calculated Effluent Guideline-based Allocations: BOD₅, TSS, PCP, TCP
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Production	Daily Max (lb/day)	Monthly Average (lb/day)
Current Permit (Anti-backsliding per 2013 permit rationale; Subpart C only)		
BOD ₅	34,708	17,354
TSS	74,376	37,188
PCP ¹	3.3	--
TCP ¹	3.1	--
Corrected Allocations (Subparts C and J; Current Permit/Anti-backsliding Production Basis)		
BOD ₅	34,715	17,354
TSS	74,202	37,101
PCP ¹	3.6	--
TCP ¹	3.3	--
Calculated Allocations (based on 2013 to 2018 Production, Subparts C and J)		
BOD ₅	47,138	23,498
TSS	96,743	48,371
PCP ¹	5.3	--
TCP ¹	4.1	--

¹ Limits for PCP and TCP are not applicable if discharger certifies non-use of chlorophenolic biocides. IP will continue to submit annual certification.

3.3 Water Quality Limitations

3.3.1 BOD₅

IP Prattville's current NPDES permit requires effluent guidelines for BOD₅ to be applicable year-round, and a formula to calculate BOD₅ limits based on Alabama River water quality to be applicable May 15 through October 15.

$$\text{BOD}_5 \text{ (lbs/day)} = 0.0017Q_R^{1.8502}$$

The equation relates the flow rate (Q_R) in cubic feet per second of the Alabama River at Jones Bluff Lock and Dam (now known as Robert F. Henry Lock and Dam) to an allowable discharge rate of BOD₅ in pounds per day (lbs/day). IP Prattville obtains the Alabama River flow rate from the schedule of dam releases published by the U.S. Army Corps of Engineers on their web page.

The equation has proven to be protective of water quality, and IP requests no changes to the BOD₅ discharge equation or the period of the year in which it is applicable.

3.3.2 Stream Monitoring

To verify that IP Prattville's NPDES permit requirements regarding the discharge of BOD₅ are not causing or contributing to low dissolved oxygen (DO) concentrations in the Alabama River downstream of the facility's treated wastewater discharge, IP Prattville is required to conduct water quality surveys along the river from Alabama River Mile 278.3 (US Highway 31 bridge) to Alabama River Mile 250.2 (Blue Bluff) at least once per week between May 15 and October 15 at 10 routine sampling locations. [Note that the mill's discharge location is at River mile 275.3.] If the DO concentration of the river at Alabama River Mile 250.2 is less than 7 milligrams per liter (mg/L) and is decreasing by more than 0.3 mg/L between Alabama River Miles 253.8 and 250.2, IP Prattville must continue sampling downstream at 2-mile intervals until the DO concentration is no longer decreasing by more than 0.3 mg/L between stations. The river surveys are not required to be conducted downstream of Jones Bluff Lock and Dam, located at Alabama River Mile 236.1. However, if the DO concentration at any of the survey stations is less than 5.9 mg/L, the monitoring frequency increases to twice per week. If the minimum DO concentration at any of the river survey stations is less than 5.4 mg/L, the monitoring frequency increases to daily. Parameters to be measured during each survey include DO at a depth of 5 feet, water temperature, pH, and BOD₅. BOD₅ is required no more than once per 7-day period. Sampling time is to be recorded for each station and, when possible, sampling should be completed before 12:00 noon. River monitoring is not required on days when there is no discharge of treated wastewater from the IP Prattville wastewater treatment facility at outfall DSN001.

DO concentrations in the Alabama River measured by the IP Prattville facility at the 10 routine sampling locations during river surveys conducted between May 2006 and October 2017 are summarized in Table 3-3. The DO concentrations measured in the Alabama River at the conditional river monitoring stations located downstream of Alabama River Mile 250.2 are summarized in Table 3-4.

The data illustrate that DO concentrations of less than 5.0 mg/L are extremely rare within the routinely monitored segment of the Alabama River between River Miles 278.3 and 250.2, as only one measured DO concentration was less than 5.0 mg/L between 2006 and 2017. During this time, 2,579 measurements were recorded over the entire monitored segment and only four DO concentrations were less than 5.0 mg/L. Three of those four measurements were reported on a single day (July 15, 2011) at the conditional monitoring locations downstream of River Mile 250.2.

The 10th percentile DO concentration for each station is shown in Tables 3-3 and 3-4. This information is useful for determining trends between stations. For example, the 10th percentile DO concentrations at River Miles 278.3, 275.3, and 272.5 vary by less than 0.1 mg/L, indicating that the lowest 10 percent of

the DO concentrations measured at these locations were consistent during the monitoring period and little change in minimum DO concentration occurs within this segment of the river. A similar comparison can be made for River Miles 270.0 and 268.7, River Miles 260.2 and 257.0, and River Miles 253.8 and 250.2.

Table 3-3. River Survey DO Summary for Routine River Survey Stations (2006 to 2017)

Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

	All Stations	River Mile 278.3	River Mile 275.3	River Mile 272.5	River Mile 270.2	River Mile 268.7	River Mile 264.5	River Mile 260.2	River Mile 257.0	River Mile 253.8	River Mile 250.2
Number of Samples	2,579	251	250	250	250	250	250	248	247	248	248
Minimum DO, mg/L	4.35	5.64	5.79	5.89	5.60	5.01	5.12	5.08	5.13	4.78	5.01
Average DO, mg/L	7.17	7.69	7.62	7.58	7.34	7.28	7.07	6.84	6.85	6.86	6.92
Median DO, mg/L	7.11	7.64	7.53	7.53	7.20	7.18	7.00	6.70	6.75	6.76	6.82
10th Percentile DO, mg/L	6.07	6.86	6.82	6.77	6.47	6.43	6.22	5.96	5.89	5.84	5.84
# DO < 5.0 mg/L	4	0	0	0	0	0	0	0	0	1	0
# DO < 5.5 mg/L	58	0	0	0	0	1	7	7	8	9	11
Percent DO < 5.9 mg/L	6.48	1.21	0.40	0.40	1.60	2.40	4.80	8.06	10.12	12.10	12.10
Percent DO < 6.1 mg/L	10.51	1.21	0.80	1.20	2.80	4.00	7.20	14.92	20.24	20.97	18.55
Percent DO < 7.0 mg/L	43.51	13.71	16.00	20.00	34.80	36.00	48.00	66.13	63.56	62.90	57.66

Table 3-4. River Survey DO Summary for Conditional River Survey Stations (2006 to 2017)
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

	River Mile 247.9	River Mile 245.8	River Mile 244.0	River Mile 241.8	River Mile 240.8	River Mile 237.6
Number of Samples	51	18	9	3	2	2
Minimum DO, mg/L	5.03	5.11	5.17	4.71	4.44	4.35
Average DO, mg/L	6.17	6.08	5.87	5.56	5.14	4.84
Median DO, mg/L	6.19	6.18	5.72	5.67	5.14	4.84
10th Percentile DO, mg/L	5.51	5.29	5.18	4.90	4.58	4.45
# DO < 5.0 mg/L	0	0	0	1	1	1
# DO < 5.5 mg/L	5	3	3	1	1	2
Percent DO < 5.9 mg/L	35.29	33.33	55.56	66.67	100.00	100.00
Percent DO < 6.1 mg/L	47.06	44.44	55.56	66.67	100.00	100.00
Percent DO < 7.0 mg/L	94.12	64.44	100.00	100.00	100.00	100.00

Based on the summaries of DO concentrations in the Alabama River between River Miles 278.3 and 237.6, IP Prattville is requesting that the following changes to the river survey requirements be included in the NPDES permit:

1. Delete monitoring stations at River Miles 278.3, 272.5, 270.2, 264.5, and 257.0 since these stations are redundant to nearby stations and DO concentrations measured at these locations provide no new information regarding water quality conditions in the Alabama River.
2. Remove the DO monitoring frequency triggers (minimum DO concentrations of 5.9 mg/L and 5.4 mg/L) and set the river survey frequency to once per week from May 15 through October 15. DO concentration data have shown that periods of low DO are rare. Only 2.2 percent of DO concentrations have been less than 5.5 mg/L.
3. Revise the conditional DO monitoring trigger for stations downstream of River Mile 250.2 from 7.0 to 6.1 mg/L, as the data summary showed that there were no downstream DO concentrations less than 5.0 mg/l when DO at River Mile 250.2 was greater than 6.1 mg/L. Retain the 0.3 mg/L decreasing DO trigger between River Miles 253.2 and 250.2, to require monitoring at 2-mile intervals downstream.
4. Remove the requirement to collect water samples for BOD₅ analysis. BOD₅ concentrations measured between 2006 and 2017 are consistently near background levels and do not provide useful information about water quality conditions in the Alabama River.
5. Remove the requirement to measure pH during river surveys. River pH levels are consistently within the normal range for the Alabama River. The 10th percentile level is 6.90 standard units (s.u.) and the 90th percentile value is 7.75 s.u. The pH data are not used by IP Prattville in their wastewater discharge management decisions.

SECTION 4

Requested Permit Limits and Monitoring

This section presents the requested permit limitations and monitoring requirements for the IP Prattville Mill NPDES permit renewal. IP requests that the monitoring frequencies remain the same as in the existing permit for Outfalls DSN001, DSN002, and DSN003, and that limitations for Outfalls DSN002 and DSN003 remain the same.

IP also requests that the permit basis for Outfall DSN001 be corrected to reflect application of both 40 CFR 430, *Subpart C (Unbleached Kraft)* and *Subpart J (Secondary Fiber)*. Requested ELG-based permit limits for DSN001, which reflect this correction, are listed in Table 4-1.

Table 4-1. Requested Permit Limits for Outfall DSN001
Application for NPDES Permit Renewal, IP Prattville Mill, Prattville, Alabama

Production	Daily Maximum (lbs/d)	Monthly Average (lbs/d)
BOD ₅	47,138	23,498
TSS	96,743	48,371
PCP ¹	5.3	--
TCP ¹	4.1	--

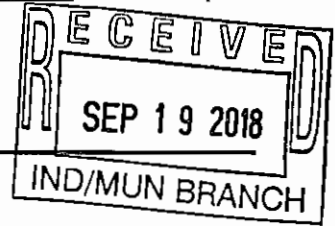
¹ Limits for PCP and TCP are not applicable if discharger certifies non-use of chlorophenolic biocides. IP will continue to submit annual certification.

IP also is requesting changes to the NPDES permit Part IV.C.2 stream monitoring requirements as outlined in Section 3.3.2.

ALABAMA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT (ADEM)
NPDES INDIVIDUAL PERMIT APPLICATION
SUPPLEMENTARY INFORMATION FOR INDUSTRIAL FACILITIES

Instructions: This form should be used to submit the required supplementary information for an application for an NPDES individual permit for industrial facilities. The completed application should be submitted to ADEM 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 not applicable to the applicant. Please type or print legibly in blue or black ink. Mail the completed application to:

ADEM-Water Division
Industrial Section
P O Box 301463
Montgomery, AL 36130-1463



PURPOSE OF THIS APPLICATION

- Initial Permit Application for New Facility* Initial Permit Application for Existing Facility*
 Modification of Existing Permit Reissuance of Existing Permit
 Revocation & Reissuance of Existing Permit * An application for participation in the ADEM's Electronic Environmental (E2) Reporting must be submitted to allow permittee to electronically submit reports as required.

SECTION A - GENERAL INFORMATION

1. Facility Name: International Paper, Prattville Mill
a. Operator Name: International Paper
b. Is the operator identified in A.1.a, the owner of the facility? Yes No
If no, provide name and address of the operator and submit information indicating the operator's scope of responsibility for the facility.

2. NPDES Permit Number: AL 0003115 (not applicable if initial permit application)
3. SID Permit Number (if applicable): IU _____ - _____ - _____
4. NPDES General Permit Number (if applicable): ALG _____
5. Facility Physical Location: (Attach a map with location marked; street, route no. or other specific identifier)
Street: 100 Jensen Road
City: Prattville County: Autauga State: AL Zip: 36067
Facility Location (Front Gate): Latitude: 32 degrees 25 minutes 14.6 seconds Longitude: 86 degrees 28 minutes 23.4 seconds
6. Facility Mailing Address: 100 Jensen Road
City: Prattville County: Autauga State: AL Zip: 36067
7. Responsible Official (as described on the last page of this application):
Name and Title: Carl Gunter - Mill Manager
Address: 100 Jensen Road
City: Prattville State: AL Zip: 36067
Phone Number: (334) 361-5001 Email Address: Carl.Gunter@ipaper.com
8. Designated Facility Contact:
Name and Title: Jerry Horne - Environmental Lead
Phone Number: (334) 361-5038 Email Address: Jerry.Horne@ipaper.com

9. Designated Discharge Monitoring Report (DMR) Contact:

Name and Title: Brett Atchison - Environmental Health and Safety Specialist
Phone Number: (334) 361-5030 Email Address: Brett.Atchison@ipaper.com

10. Type of Business Entity:

- Corporation General Partnership Limited Partnership Limited Liability Company Sole Proprietorship
 Other (Please Specify) _____

11. Complete this section if the Applicant's business entity is a Corporation

a) Location of Incorporation:

Address: 111 Eighth Avenue - 13th Floor
City: New York County: New York State: New York Zip: 10011

b) Parent Corporation of Applicant:

Name: International Paper
Address: 6400 Poplar Avenue
City: Memphis State: TN Zip: 38197

c) Subsidiary Corporation(s) of Applicant:

Name: N/A
Address: _____
City: _____ State: _____ Zip: _____

d) Corporate Officers:

Name: Mark S. Sutton - Chairman and Chief Executive Officer
Address: 6400 Poplar Ave
City: Memphis State: TN Zip: 38197

Name: Tommy S. Joseph - Senior Vice President
Address: 6400 Poplar Avenue
City: Memphis State: TN Zip: 38197

e) Agent designated by the corporation for purposes of service:

Name: CT Corporation
Address: 2 North Jackson Street - Suite 605
City: Montgomery State: AL Zip: 36104

12. If the Applicant's business entity is a Partnership, please list the general partners.

Name: N/A Name: N/A
Address: _____ Address: _____
City: _____ State: _____ Zip: _____ City: _____ State: _____ Zip: _____

13. If the Applicant's business entity is a Proprietorship, please enter the proprietor's information.

Name: N/A

Address: _____

City: _____ State: _____ Zip: _____

14. Permit numbers for Applicant's previously issued NPDES Permits and identification of any other State of Alabama Environmental Permits presently held by the Applicant, its parent corporation, or subsidiary corporations within the State of Alabama:

<u>Permit Name</u>	<u>Permit Number</u>	<u>Held By</u>
See Attachment 1		
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____
_____	_____	_____

15. Identify all Administrative Complaints, Notices of Violation, Directives, Administrative Orders, or Litigation concerning water pollution, if any, against the Applicant, its parent corporation or subsidiary corporations within the State of Alabama within the past five years (attach additional sheets if necessary):

<u>Facility Name</u>	<u>Permit Number</u>	<u>Type of Action</u>	<u>Date of Action</u>
None identified			
_____	_____	_____	_____
_____	_____	_____	_____
_____	_____	_____	_____
_____	_____	_____	_____
_____	_____	_____	_____

SECTION B – BUSINESS ACTIVITY

1. Indicate applicable Standard Industrial Classification (SIC) Codes for all processes. If more than one applies, list in order of importance:

- a. 2631 Paperboard Mills
- b. 2611 Pulp Mills
- c. 2861 Gum and Wood Chemicals
- d. _____
- e. _____
- f. _____

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

- | | |
|---|---|
| <input type="checkbox"/> Aluminum Forming | <input type="checkbox"/> Metal Molding and Casting |
| <input type="checkbox"/> Asbestos Manufacturing | <input type="checkbox"/> Metal Products |
| <input type="checkbox"/> Battery Manufacturing | <input type="checkbox"/> Nonferrous Metals Forming |
| <input type="checkbox"/> Can Making | <input type="checkbox"/> Nonferrous Metals Manufacturing |
| <input type="checkbox"/> Canned and Preserved Fruit and Vegetables | <input type="checkbox"/> Oil and Gas Extraction |
| <input type="checkbox"/> Canned and Preserved Seafood | <input type="checkbox"/> Organic Chemicals Manufacturing |
| <input type="checkbox"/> Cement Manufacturing | <input type="checkbox"/> Paint and Ink Formulating |
| <input type="checkbox"/> Centralized Waste Treatment | <input type="checkbox"/> Paving and Roofing Manufacturing |
| <input type="checkbox"/> Carbon Black | <input type="checkbox"/> Pesticides Manufacturing |
| <input type="checkbox"/> Coal Mining | <input type="checkbox"/> Petroleum Refining |
| <input type="checkbox"/> Coil Coating | <input type="checkbox"/> Phosphate Manufacturing |
| <input type="checkbox"/> Copper Forming | <input type="checkbox"/> Photographic |
| <input type="checkbox"/> Electric and Electronic Components Manufacturing | <input type="checkbox"/> Pharmaceutical |
| <input type="checkbox"/> Electroplating | <input type="checkbox"/> Plastic & Synthetic Materials |
| <input type="checkbox"/> Explosives Manufacturing | <input type="checkbox"/> Plastics Processing Manufacturing |
| <input type="checkbox"/> Feedlots | <input type="checkbox"/> Porcelain Enamel |
| <input type="checkbox"/> Ferroalloy Manufacturing | <input checked="" type="checkbox"/> Pulp, Paper, and Fiberboard Manufacturing |
| <input type="checkbox"/> Fertilizer Manufacturing | <input type="checkbox"/> Rubber |
| <input type="checkbox"/> Foundries (Metal Molding and Casting) | <input type="checkbox"/> Soap and Detergent Manufacturing |
| <input type="checkbox"/> Glass Manufacturing | <input type="checkbox"/> Steam and Electric |
| <input type="checkbox"/> Grain Mills | <input type="checkbox"/> Sugar Processing |
| <input checked="" type="checkbox"/> Gum and Wood Chemicals Manufacturing | <input type="checkbox"/> Textile Mills |
| <input type="checkbox"/> Inorganic Chemicals | <input type="checkbox"/> Timber Products |
| <input type="checkbox"/> Iron and Steel | <input type="checkbox"/> Transportation Equipment Cleaning |
| <input type="checkbox"/> Leather Tanning and Finishing | <input type="checkbox"/> Waste Combustion |
| <input type="checkbox"/> Metal Finishing | <input type="checkbox"/> Other (specify) _____ |
| <input type="checkbox"/> Meat Products | |

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.

3. Give a brief description of all operations at this facility including primary products or services (attach additional sheets if necessary):

The kraft (sulfate) process is used to produce pulp, turpentine, and wood fat soaps from wood chips. Pulp is also
produced from post-consumer waste paper. Pulp is converted to linerboard using two fourdrinier paper machines.
Crude tall oil is produced by acidulation of wood fat soaps (black liquor skimmings) and is shipped off-site. Crude
sulfate turpentine is condensed, recovered and shipped off-site.

SECTION C – WASTEWATER DISCHARGE INFORMATION

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

1. **For Non-Categorical Users Only:** Provide wastewater flows for each of the processes or proposed processes. Using the process flow schematic (Figure 1), enter the description that corresponds to each process. **(The flow schematic should include all treatment units as well as monitoring and discharge points).** [New facilities should provide estimates for each discharge.]

Process Description	Last 12 Months (gals/day) Highest Month Avg. Flow	Highest Flow Year of Last 5 (gals/day) Monthly Avg. Flow	Discharge Type (batch, continuous, intermittent)
N/A	N/A	N/A	N/A

If batch discharge occurs or will occur, indicate: [new facilities may estimate.]

- a. Number of batch discharges: N/A per day
- b. Average discharge per batch: N/A (GPD)
- c. Time of batch discharges N/A at N/A
(days of week) (hours of day)
- d. Flow rate: N/A gallons/minute
- e. Percent of total discharge: N/A

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
<u>N/A</u>	<u>N/A</u>	<u>N/A</u>

2. Complete this Section only if you are subject to Categorical Standards and plan to directly discharge the associated wastewater to a water of the State. If Categorical wastewater is discharged exclusively via an indirect discharge to a public or privately-owned treatment works, check "Yes" in the appropriate space below and proceed directly to part 2.c.

Yes

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 discharge.]

2a.

Regulated Process	Applicable Category	Applicable Subpart	Type of Discharge Flow (batch, continuous, intermittent)
<u>See Attachment 2</u>	<u>See Attachment 2</u>	<u>See Attachment 2</u>	<u>See Attachment 2</u>
_____	_____	_____	_____

2b.

Process Description	Last 12 Months (gals/day), (lbs/day), etc. Highest Month Average*	Highest Flow Year of Last 5 (gals/day), (lbs/day), etc. Monthly Average*	Discharge Type (batch, continuous, intermittent)
<u>See Attachment 2</u>	<u>See Attachment 2</u>	<u>See Attachment 2</u>	<u>See Attachment 2</u>
_____	_____	_____	_____

* Reported values should be expressed in units of the applicable Federal production-based standard. For example, flow (MGD), production (pounds per day), etc.

If batch discharge occurs or will occur, indicate: [new facilities may estimate.]

- a. Number of batch discharges: N/A per day
- b. Average discharge per batch: N/A (GPD)
- c. Time of batch discharges N/A at N/A
(days of week) (hours of day)
- d. Flow rate: N/A gallons/minute
- e. Percent of total discharge: N/A

2c.

Non categorical Process Description	Last 12 Months (gals/day) Highest Month Avg. Flow	Highest Flow Year of Last 5 (gals/day) Monthly Avg. Flow	Discharge Type (batch, continuous, intermittent)
N/A	N/A	N/A	N/A

If batch discharge occurs or will occur, indicate: [new facilities may estimate.]

- a. Number of batch discharges: N/A per day
- b. Average discharge per batch: N/A (GPD)
- c. Time of batch discharges N/A at N/A
(days of week) (hours of day)
- d. Flow rate: N/A gallons/minute
- e. Percent of total discharge: N/A

2d.

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
DSN002	3,340,000	3,230,000
DSN003	80,000	550,000

All Applicants must complete C.3 – C.6.

3. Do you share an outfall with another facility? Yes No (If no, continue to C.4)
For each shared outfall, provide the following:

Applicant's Outfall No.	Name of Other Permittee/Facility	NPDES Permit No.	Where is sample collected by Applicant?
N/A	N/A	N/A	N/A

4. Do you have, or plan to have, automatic sampling equipment or continuous wastewater flow metering equipment at this facility?

- Current:** Flow Metering Yes No N/A
 Sampling Equipment Yes No N/A
- Planned:** Flow Metering Yes No N/A
 Sampling Equipment Yes No N/A

If so, please attach a schematic diagram of the sewer system indicating the present or future location of this equipment and describe the equipment below:

See Figure 2

5. Are any process changes or expansions planned during the next three years that could alter wastewater volumes or characteristics?
 Yes No (If no, continue to C.6)

Briefly describe these changes and their anticipated effects on the wastewater volume and characteristics:
 N/A

6. List the trade name and chemical composition of all biocides and corrosion inhibitors used:

Trade Name	Chemical Composition
See Attachment 3	See Attachment 3

For each biocide and/or corrosion inhibitor used, please include the following information:

- (1) 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
- (5) EPA registration number, if applicable

SECTION D -- WATER SUPPLY

Water Sources (check as many as are applicable):

- Private Well Surface Water
 Municipal Water Utility (Specify City): _____ Other (Specify): _____

IF MORE THAN ONE WELL OR SURFACE INTAKE, PROVIDE DATA FOR EACH ON AN ATTACHMENT

City: N/A MGD* Well: See Att. 4 MGD* Well Depth: See Att. 4 Ft. Latitude: See Att. 4 Longitude: See Att. 4
Surface Intake Volume: 38.5 max MGD* Intake Elevation in Relation to Bottom: 88 Ft.
Intake Elevation: 88 Ft. Latitude: 32°24'24" Longitude: 86°27'19"
Name of Surface Water Source: Alabama River

* MGD – Million Gallons per Day

Cooling Water Intake Structure Information

Complete D.1 and D.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...)

1. 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: N/A b) Location of Provider: N/A
c) Latitude: N/A Longitude: N/A
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 treated water, not raw water)? Yes No (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
4. Using the average monthly measurements over any 12-month period, approximately what percentage of water withdrawn is used exclusively for cooling purposes? 4.2 %
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 D.6 – D.17)
6. a. Is the cooling water used in a once-through cooling system? Yes No
b. Is the cooling water used in a closed cycle cooling system? Yes No

7. When was the intake installed? 1967
 (Please provide dates for all major construction/installation of intake components including screens)
8. What is the maximum intake volume? 38,500,000
 (maximum pumping capacity in gallons per day)
9. What is the average intake volume? 30,080,000
 (average intake pump rate in gallons per day average in any 30-day period)
10. What is the actual intake flow (AIF) as defined in 40 CFR §125.92(a)? 39.09 MGD
11. How is the intake operated? (e.g., continuously, intermittently, batch) continuously
12. What is the mesh size of the screen on your intake? 1/4 inch square
13. What is the intake screen flow-through area? approximately 390 square feet (dependent upon river level)
14. What is the through-screen design intake flow velocity? 2.06 ft/sec
15. What is the through-screen actual velocity (in ft/sec)? 0.005 ft/sec
16. What is the mechanism for cleaning the screen? (e.g., does it rotate for cleaning) rotate
17. Do you have any additional fish detraction technology on your intake? Yes No
18. Have there been any studies to determine the impact of the intake on aquatic organisms? Yes No (If yes, please provide.)
19. 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:

Description of Waste	Description of Storage Location
Small quantities of hazardous waste, primarily paint still bottoms	Hazardous Waste Storage Building
Non-hazardous solid waste	Onsite permitted landfill

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.

Description of Waste	Quantity (lbs/day)	Disposal Method*
See Attachment 5		

*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.

SECTION F – COASTAL ZONE INFORMATION

Is the discharge(s) located within the 10-foot elevation contour and within the limits of Mobile or Baldwin County? Yes No
 If yes, complete items F.1 – F.12:

- | | Yes | No |
|--|--------------------------|--------------------------|
| 1. Does the project require new construction? <u>N/A</u> | <input type="checkbox"/> | <input type="checkbox"/> |
| 2. Will the project be a source of new air emissions? <u>N/A</u> | <input type="checkbox"/> | <input type="checkbox"/> |

	Yes	No
3. Does the project involve dredging and/or filling of a wetland area or water way? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
If Yes, has the Corps of Engineers (COE) permit been received? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
COE Project No. <u>N/A</u>		
4. Does the project involve wetlands and/or submersed grassbeds? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
5. Are oyster reefs located near the project site? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
If Yes, include a map showing project and discharge location with respect to oyster reefs		
6. Does the project involve the site development, construction and operation of an energy facility as defined in ADEM Admin. Code r. 335-8-1-.02(bb)? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
7. Does the project involve mitigation of shoreline or coastal area erosion? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
8. Does the project involve construction on beaches or dune areas? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
9. Will the project interfere with public access to coastal waters? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
10. Does the project lie within the 100-year floodplain? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
11. Does the project involve the registration, sale, use, or application of pesticides? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
12. Does the project propose or require construction of a new well or to alter an existing groundwater well to pump more than 50 gallons per day (GPD)? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>
If yes, has the applicable permit for groundwater recovery or for groundwater well installation been obtained? <u>N/A</u>	<input type="checkbox"/>	<input type="checkbox"/>

SECTION G – ANTI-DEGRADATION EVALUATION

In accordance with 40 CFR §131.12 and the ADEM Admin. Code r. 335-6-10-04 for anti-degradation, the following information must be provided, if applicable. It is the applicant's 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
 If yes, complete G.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 G.1? Yes No

If yes, do not complete this section. If no, and the discharge is to a Tier II waterbody as defined in ADEM Admin. Code r. 335-6-10-12(4), complete G.2.A – G.2.F below and ADEM Forms 311 and 313 (attached). ADEM 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?
N/A
- B. How much will the discharger be increasing employment (at its existing facility or as the result of locating a new facility)?
N/A
- C. How much reduction in employment will the discharger be avoiding?
N/A
- D. How much additional state or local taxes will the discharger be paying?
N/A
- E. What public service to the community will the discharger be providing?
N/A
- F. What economic or social benefit will the discharger be providing to the community?
N/A

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. The EPA application forms are found on the Department's website at <http://www.adem.alabama.gov/programs/water/waterforms.cnt>. 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

Outfall No.	Receiving Water(s)	303(d) Segment?	Included in TMDL?*
001	Alabama River	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
002	Alabama River	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
003	Autauga Creek	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
		<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input type="checkbox"/> No
		<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input type="checkbox"/> No

*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 Code r. 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."

Signature of Responsible Official: Carl Gunter Date Signed: 9/19/18

Name and Title: Carl Gunter - Mill Manager

If the Responsible Official signing this application is not identified in Section A.7, provide the following information:

Mailing Address: _____

City: _____ State: _____ Zip: _____

Phone Number: _____ Email Address: _____

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.

ADEM Form 187 Attachment 1 - International Paper, Prattville Mill

Section A, Question 14. Permit numbers for applicant's previously issued NPDES Permits and identification of any other State of Alabama Environmental Permits presently held by the applicant, its parent corporation, or subsidiary corporations within the State of Alabama

Permit Name	Permit Number	Facility
NPDES	AL0003115	IP Prattville Mill
Title V Permit	201-0001	Prattville Mill
State of Alabama Industrial Landfill	01-05	Prattville Mill
State of Alabama Drinking Water	PWSID #0000021	Prattville Mill
Other Permits Held by Applicant		
NPDES	AL0003018	IP Riverdale Mill
NPDES	ALR10BDV2	IP Riverdale Mill
NPDES	AL0000396	IP Courtland Mill
NPDES	AL0002674	IP Pine Hill Mill
NPDES	ALG060346	IP Bay Minette Container
NPDES	ALG060177	IP Decatur Container
NPDES	ALG060080	IP Riverdale Woodyard
NPDES	ALG060242	IP Huntsville
Major Source Operating Permit	104-0003	IP Riverdale Mill
Major Source Operating Permit	109-0001	IP Pine Hill Mill
Synthetic Minor Operating Permit	501-0006	IP Bay Minette Container
Major Source Operating Permit	707-0001	IP Courtland Mill
State of Alabama Industrial Landfill	66-02	IP Pine Hill Mill
State of Alabama Industrial Landfill	40-05I	IP Courtland Mill
State of Alabama Industrial Landfill	40-09	IP Courtland Mill
State of Alabama Industrial Landfill	24-06	IP Riverdale Mill

ADEM Form 187 Attachment 2 – International Paper, Prattville Mill

For Categorical Users: Provide the wastewater discharge flows or production (whichever is applicable by the effluent guidelines) for each of your processes or proposed process. Using the process flow schematic, enter the description that corresponds to each process.

2a.

Regulated Process	Applicable Category	Applicable Subpart	Type of Discharge Flow
Unbleached Kraft Linerboard Production	The Pulp, Paper, and Paperboard Point Source Category	40 CFR 430.32 - Subpart C Unbleached Kraft	Continuous
Unbleached Linerboard Production from Old Corrugated Container Pulp	The Pulp, Paper, and Paperboard Point Source Category	40 CFR 430.102 - Subpart J Secondary Fiber Nondeink	Continuous

2b.

Process Description	Last 12 Months Highest Monthly Average 1,000 lbs/day	Highest Year of Last 5 Monthly Average 1,000 lbs/day	Discharge Type
Unbleached Kraft Production from Wood Pulp PM1	3,789 (1,894 ADT/d)	3,674 (1,837 ADT/d)	Continuous
Unbleached Kraft Production from Wood Pulp PM2	3,188 (1,594 ADT/d)	2,486 (1,243 ADT/d)	Continuous
Unbleached Production from Old Corrugated Container Pulp PM1	624 (312 ADT/d)	710.7 (355.4 ADT/d)	Continuous
Unbleached Production from Old Corrugated Container Pulp PM2	704.5 (352.3 ADT/d)	445 (222 ADT/d)	Continuous

ADEM Form 187 Attachment 3 - International Paper, Prattville Mill

Section C, Item 6 List the trade name and chemical composition of all biocide and corrosion inhibitors used

Trade Name	EPA Registration Number	Quantity to be Used (lbs/year)	Frequency of Use	Chemical Composition (%)	96-hour Median Tolerance Limit	Proposed Discharge Concentration
Drewguard 2808	NA	10,500	continuous	Sodium Nitrite (15-20)	LC50 = 1250 mg/l; no effect level = 500 mg/l	No detectable discharge projected.
				Inorganic Salt (5-10)		
				Sodium Hydroxide (1-1.5)		
Amersite 2215	NA	10,000	continuous	Hydroquinone (1,4 - benzenediol) (15.0-20)	LC50 = 134 mg/l; no effect level = 26 mg/l	No constituents listed in Form 2C; no detectable discharge projected.
				Diethylhydroxylamine (1.0-1.5)		
Amercor 8682	NA	10,000	continuous	Amine (20-40)	LC50 = 147 mg/l; no effect level = 5 mg/l	No constituents listed in Form 2C; no detectable discharge projected.
Drewperse 6910	NA	60,000	continuous	Acrylic Copolymer (40-50)	no aquatic toxicology data available	No constituents listed in Form 2C; no detectable discharge projected.
				Maleic Acid (10-15)		
Amertrrol HT1016	NA	88,000	continuous	Amine (0.45)	LC50 = 500 mg/l; no effect level = 10 mg/l	No constituents listed in Form 2C; no detectable discharge projected.
				Salt (5.65)		
Amertrrol HT4558	NA	88,000	continuous	Salt (1-5)	no aquatic toxicology data available	No constituents listed in Form 2C; no detectable discharge projected.
				Alkaline (1-5)		
Amertrrol HPD9970	NA	500	Every 7 Years	Sodium Hydroxide (1-1.5)	no aquatic toxicology data available	No constituents listed in Form 2C; no detectable discharge projected.
Biosperse CX9110	NA	33,000	continuous	Halogenated Complex (18)	LC50 = 3.8 mg/l; no effect level = 2.6 mg/l	No constituents listed in Form 2C; no detectable discharge projected.
				Sodium Hydroxide (10)		
Biosperse CN7539	NA	14,000	continuous	2-Bromo-2-Nitro-1,3-Propanediol (5.5)	LC50 = 35 mg/l; no effect level = .08 mg/l	No constituents listed in Form 2C; no detectable discharge projected.
				5-Chloro-2-Methyl-4-Isothiazolin-3-One (1.9)		
				Magnesium Chloride (1-5)		
				2-Methyl-4-Isothiazolin-3-One (0.68)		
Performax MX2202	NA	250	continuous	Inorganic salt (5-10)	no aquatic toxicology data available	No constituents listed in Form 2C; no detectable discharge projected.
				Triazole (5-10)		
Drewperse 7130	NA	250	continuous	Ammonium Chloride Solution (20-30)	no aquatic toxicology data available	No constituents listed in Form 2C; no detectable discharge projected.
				Alcohol (1-5)		
Millsperse 955	NA	101,000	continuous	Zinc Chloride (50-60)	LC50 = 6.2 mg/l; no effect level = 0.625 mg/l	<0.1 ppm as total zinc based on previous effluent analyses during usage.
Millsperse 8369	NA	38,000	continuous	none	LC50 = 1960 mg/l; no effect level = 313 mg/l	No constituents listed in Form 2C; no detectable discharge projected.
Drewgard 120	NA	35,000	continuous	Inorganic Salt (60-70)	LC50 = 100 mg/l; no effect level = 50 mg/l	No constituents listed in Form 2C; no detectable discharge projected.
Spectrum RX3100 Microbicide	NA	11,000	daily	Dodecylguanidine Hydrochloride (10-15)	LC50 = 2.7 mg/l; no effect level = 0.14 mg/l	No constituents listed in Form 2C; no detectable discharge projected.
				Methylene Bis(Thiocyanate) (5-10)		
				Isopropanol (1-5)		
Biosperse CX3195	NA	20,000	continuous	Ammonium Carbamate (15-20)	no aquatic toxicology data available	No constituents listed in Form 2C; no detectable discharge projected.
SP6650 Couch Roll Corrosion Inhibitor	NA	23,000	continuous	Sodium 2-mercaptobenzothiazole (6)	LC50 = 123 mg/l; no effect level = 58 mg/l	No constituents listed in Form 2C; no detectable discharge projected.

NA= Not applicable

ADEM Form 187 Attachment 4 - International Paper, Prattville Mill
Section D, Water Supply

The Prattville Mill has five production wells from which it draws ground water. There are no accurate flow-measuring devices on the pumps and the wells are all in close proximity to each other, so estimated water consumption is reported as Wells 1, 2, 3, 4 and 5 combined.

Estimated combined intake consumption: 1.80 MGD.

Well <u>No. 1</u>	Well Depth: <u>356 ft.</u>	Latitude <u>32° 25' 11"</u>	Longitude <u>86° 28' 43"</u>
Well <u>No. 2</u>	Well Depth: <u>360 ft.</u>	Latitude <u>32° 25' 13"</u>	Longitude <u>86° 28' 17"</u>
Well <u>No. 3</u>	Well Depth: <u>340 ft.</u>	Latitude <u>32° 24' 54"</u>	Longitude <u>86° 28' 06"</u>
Well <u>No. 4</u>	Well Depth: <u>380 ft.</u>	Latitude <u>32° 24' 51"</u>	Longitude <u>86° 28' 43"</u>
Well <u>No. 5</u>	Well Depth: <u>381 ft.</u>	Latitude <u>32° 24' 39"</u>	Longitude <u>86° 29' 56"</u>

ADEM Form 187 Attachment 5 - International Paper, Prattville Mill
Section E, Waste Storage and Disposal Information

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.

Description of Waste	Quantity	Description of Disposal
Primary Clarifier Sludge	12,000 tons/year – estimated	Sludge removed from the primary clarifier is typically recycled back in the process.
Sludge from other Effluent Treatment System Basins	Varies	Sludge removed from other Effluent Treatment System Basins (including the Emergency Holding Pond) has been disposed of or reused in numerous ways. In the past, these have included transferring to inactive portions of the Effluent Treatment System. Options for future dispositioning of sludge may include its use as an agricultural soil enhancement for onsite fields or other beneficial use projects.
Debris collected on Effluent Treatment System Bar Screens	20 Cubic Yards/day – estimated	Debris collected on bar screens is placed into dumpsters and then placed in the Mill's on-site industrial landfill.

FORM 1 GENERAL		U.S. ENVIRONMENTAL PROTECTION AGENCY GENERAL INFORMATION Consolidated Permits Program <i>(Read the "General Instructions" before starting.)</i>	I. EPA I.D. NUMBER ALD005557004
LABEL ITEMS		PLEASE PLACE LABEL IN THIS SPACE	GENERAL INSTRUCTIONS If a preprinted label has been provided, affix it in the designated space. Review the information carefully; if any of it is incorrect, cross through it and enter the correct data in the appropriate fill-in area below. Also, if any of the preprinted data is absent (the area to the left of the label space lists the information that should appear), please provide it in the proper fill-in area(s) below. If the label is complete and correct, you need not complete Items I, III, V, and VI (except VI-B which must be completed regardless). Complete all items if no label has been provided. Refer to the instructions for detailed item descriptions and for the legal authorizations under which this data is collected.
I. EPA I.D. NUMBER			
III. FACILITY NAME			
V. FACILITY MAILING ADDRESS			
VI. FACILITY LOCATION			

II. POLLUTANT CHARACTERISTICS

INSTRUCTIONS: Complete A through J to determine whether you need to submit any permit application forms to the EPA. If you answer "yes" to any questions, you must submit this form and the supplemental form listed in the parenthesis following the question. Mark "X" in the box in the third column if the supplemental form is attached. If you answer "no" to each question, you need not submit any of these forms. You may answer "no" if your activity is excluded from permit requirements; see Section C of the instructions. See also, Section D of the instructions for definitions of **bold-faced terms**.

SPECIFIC QUESTIONS	Mark "X"			SPECIFIC QUESTIONS	Mark "X"		
	YES	NO	FORM ATTACHED		YES	NO	FORM ATTACHED
A. Is this facility a publicly owned treatment works which results in a discharge to waters of the U.S.? (FORM 2A)		X		B. Does or will this facility (either existing or proposed) include a concentrated animal feeding operation or aquatic animal production facility which results in a discharge to waters of the U.S.? (FORM 2B)		X	
C. Is this a facility which currently results in discharges to waters of the U.S. other than those described in A or B above? (FORM 2C)	X		X	D. Is this a proposed facility (other than those described in A or B above) which will result in a discharge to waters of the U.S.? (FORM 2D)		X	
E. Does or will this facility treat, store, or dispose of hazardous wastes? (FORM 3)		X		F. Do you or will you inject at this facility industrial or municipal effluent below the lowermost stratum containing, within one quarter mile of the well bore, underground sources of drinking water? (FORM 4)		X	
G. Do you or will you inject at this facility any produced water or other fluids which are brought to the surface in connection with conventional oil or natural gas production, inject fluids used for enhanced recovery of oil or natural gas, or inject fluids for storage of liquid hydrocarbons? (FORM 4)		X		H. Do you or will you inject at this facility fluids for special processes such as mining of sulfur by the Frasch process, solution mining of minerals, in situ combustion of fossil fuel, or recovery of geothermal energy? (FORM 4)		X	
I. Is this facility a proposed stationary source which is one of the 28 industrial categories listed in the instructions and which will potentially emit 100 tons per year of any air pollutant regulated under the Clean Air Act and may affect or be located in an attainment area? (FORM 5)		X		J. Is this facility a proposed stationary source which is NOT one of the 28 industrial categories listed in the instructions and which will potentially emit 250 tons per year of any air pollutant regulated under the Clean Air Act and may affect or be located in an attainment area? (FORM 5)		X	

III. NAME OF FACILITY

1 SKIP International Paper

IV. FACILITY CONTACT

A. NAME & TITLE (last, first, & title) Jerry Horne- Environmental Lead

B. PHONE (area code & no.) (334) 361-5038

V. FACILITY MAILING ADDRESS

A. STREET OR P.O. BOX 100 Jensen Road

B. CITY OR TOWN Prattville

C. STATE AL

D. ZIP CODE 36067

VI. FACILITY LOCATION

A. STREET, ROUTE NO. OR OTHER SPECIFIC IDENTIFIER 100 Jensen Road

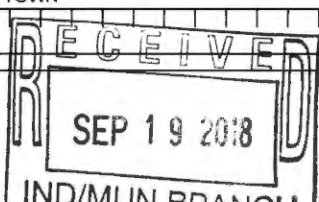
B. COUNTY NAME Autauga

C. CITY OR TOWN Prattville

D. STATE AL

E. ZIP CODE 36067

F. COUNTY CODE (if known) 01



CONTINUED FROM THE FRONT

VII. SIC CODES (4-digit, in order of priority)			
A. FIRST		B. SECOND	
C	7 2631 (specify) Unbleached Kraft Linerboard Mill	C	7 2611 (specify) Pulp Mills
15	16 - 19	15	16 - 19
C. THIRD		D. FOURTH	
C	7 2861 (specify) Gum and Wood Chemicals (Tall Oil & Turpentine)	C	7 NA (specify) NA
15	16 - 19	15	16 - 19

VIII. OPERATOR INFORMATION	
A. NAME	
C	8 International Paper
15	16
B. Is the name listed in Item VIII-A also the owner? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO	

C. STATUS OF OPERATOR (Enter the appropriate letter into the answer box: if "Other," specify.)		D. PHONE (area code & no.)	
F = FEDERAL	M = PUBLIC (other than federal or state)	P	(specify) NA
S = STATE	O = OTHER (specify)	A	(334) 361-5000
P = PRIVATE		15	16 - 18 19 - 21 22 - 26

E. STREET OR P.O. BOX	
100 Jensen Road	
29	55

F. CITY OR TOWN		G. STATE	H. ZIP CODE	IX. INDIAN LAND
C	B Prattville	AL	36067	Is the facility located on Indian lands? <input type="checkbox"/> YES <input checked="" type="checkbox"/> NO
15	16	40 41	42 47 - 51	52

X. EXISTING ENVIRONMENTAL PERMITS			
A. NPDES (Discharges to Surface Water)		D. PSD (Air Emissions from Proposed Sources)	
C	T I	C	T I
9	N AL0003115	9	P 201-0001 Title V
15	16 17 18	30	15 16 17 18

B. UIC (Underground Injection of Fluids)		E. OTHER (specify)	
C	T I	C	T I
9	U NA	9	01-05 (specify) State of Alabama Industrial Landfill
15	16 17 18	30	15 16 17 18

C. RCRA (Hazardous Wastes)		E. OTHER (specify)	
C	T I	C	T I
9	R NA	9	PWSID #0000021 (specify) State of Alabama Drinking Water
15	16 17 18	30	15 16 17 18

XI. MAP	
Attach to this application a topographic map of the area extending to at least one mile beyond property boundaries. The map must show the outline of the facility, the location of each of its existing and proposed intake and discharge structures, each of its hazardous waste treatment, storage, or disposal facilities, and each well where it injects fluids underground. Include all springs, rivers, and other surface water bodies in the map area. See instructions for precise requirements.	

XII. NATURE OF BUSINESS (provide a brief description)	
The kraft (sulfate) process is used to produce pulp, turpentine, and wood fat soaps from wood chips. Pulp is also produced from post-consumer waste paper. Pulp is converted to linerboard using two fourdrinier paper machines. Crude tall oil is produced by acidulation of wood fat soaps (black liquor skimmings) and is shipped off site. Crude sulfate turpentine is condensed, recovered, and is shipped off site.	

XIII. CERTIFICATION (see instructions)	
I certify under penalty of law that I have personally examined and am familiar with the information submitted in this application and all attachments and that, based on my inquiry of those persons immediately responsible for obtaining the information contained in the application, I believe that the information is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment.	

A. NAME & OFFICIAL TITLE (type or print)	B. SIGNATURE	C. DATE SIGNED
Carl Gunter, Mill Manager		9/19/18

COMMENTS FOR OFFICIAL USE ONLY	
C	
15	16

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

ALD00557004

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

Please print or type in the unshaded areas only.

FORM
2C
NPDES



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

I. OUTFALL LOCATION

For each outfall, list the latitude and longitude of its location to the nearest 15 seconds and the name of the receiving water.

A. OUTFALL NUMBER (list)	B. LATITUDE			C. LONGITUDE			D. RECEIVING WATER (name)
	1. DEG.	2. MIN.	3. SEC.	1. DEG.	2. MIN.	3. SEC.	
DSN001	32.00	22.00	5.00	86.00	29.00	6.00	Alabama River

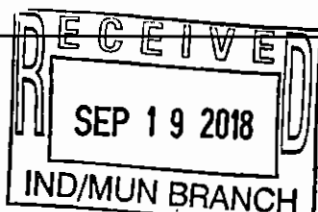
II. FLOWS, SOURCES OF POLLUTION, AND TREATMENT TECHNOLOGIES

A. Attach a line drawing showing the water flow through the facility. Indicate sources of intake water, operations contributing wastewater to the effluent, and treatment units labeled to correspond to the more detailed descriptions in Item B. Construct a water balance on the line drawing by showing average flows between intakes, operations, treatment units, and outfalls. If a water balance cannot be determined (e.g., for certain mining activities), provide a pictorial description of the nature and amount of any sources of water and any collection or treatment measures.

B. For each outfall, provide a description of: (1) All operations contributing wastewater to the effluent, including process wastewater, sanitary wastewater, cooling water, and storm water runoff; (2) The average flow contributed by each operation; and (3) The treatment received by the wastewater. Continue on additional sheets if necessary.

1. OUTFALL NO. (list)	2. OPERATION(S) CONTRIBUTING FLOW		3. TREATMENT	
	a. OPERATION (list)	b. AVERAGE FLOW (include units)	a. DESCRIPTION	b. LIST CODES FROM TABLE 2C-1
DSN001	Steam Generation/Chemical Recovery	10 MGD	Mechanical Clarifier	1 U
	Kraft Sulfate Pulping	2 MGD	Emergency Holding Pond	1 U
	Linerboard Formation	12 MGD	Mechanically Aerated Basin (ASB)	3 B
	Secondary Fiber (Waste Paper Conversion)	2 MGD	Naturally Aerated Basins	3 G
	Woodyard	1.2 MGD	Ash Pond	1 U
	Ash Sluice System	2 MGD	Bar Screen	1 T
	Operating Industrial Landfill Leachate & landfill Stormwater Runoff	intermittent		
	Stormwater Runoff from:	intermittent		
	Production Area			
	Clay Borrow Pit			
	Closed Industrial landfill			
	Woodyard			
	Agricultural/Silvicultural Lands			

OFFICIAL USE ONLY (effluent guidelines sub-categories)



CONTINUED FROM THE FRONT

C. Except for storm runoff, leaks, or spills, are any of the discharges described in Items II-A or B intermittent or seasonal?
 YES (complete the following table) NO (go to Section III)

1. OUTFALL NUMBER (list)	2. OPERATION(S) CONTRIBUTING FLOW (list)	3. FREQUENCY		4. FLOW				C. DURATION (in days)
		a. DAYS PER WEEK (specify average)	b. MONTHS PER YEAR (specify average)	a. FLOW RATE (in mgd)		B. TOTAL VOLUME (specify with units)		
				1. LONG TERM AVERAGE	2. MAXIMUM DAILY	1. LONG TERM AVERAGE	2. MAXIMUM DAILY	
N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

III. PRODUCTION

A. Does an effluent guideline limitation promulgated by EPA under Section 304 of the Clean Water Act apply to your facility?
 YES (complete Item III-B) NO (go to Section IV)

B. Are the limitations in the applicable effluent guideline expressed in terms of production (or other measure of operation)?
 YES (complete Item III-C) NO (go to Section IV)

C. If you answered "yes" to Item III-B, list the quantity which represents an actual measurement of your level of production, expressed in the terms and units used in the applicable effluent guideline, and indicate the affected outfalls.

1. AVERAGE DAILY PRODUCTION			2. AFFECTED OUTFALLS (list outfall numbers)
a. QUANTITY PER DAY	b. UNITS OF MEASURE	c. OPERATION, PRODUCT, MATERIAL, ETC. (specify)	
6,977 (3,488)	1,000 lb/day (ADT/d)	Unbleached Kraft Linerboard Manufactured from Wood Pulp	DSN001
1,415 (708)	1,000 lb/day (ADT/d)	Unbleached Kraft Linerboard Manufactured from Recycled Old Corrugated Container Pulp	DSN001

IV. IMPROVEMENTS

A. Are you now required by any Federal, State or local authority to meet any implementation schedule for the construction, upgrading or operations of wastewater treatment equipment or practices or any other environmental programs which may affect the discharges described in this application? This includes, but is not limited to, permit conditions, administrative or enforcement orders, enforcement compliance schedule letters, stipulations, court orders, and grant or loan conditions.
 YES (complete the following table) NO (go to Item IV-B)

1. IDENTIFICATION OF CONDITION, AGREEMENT, ETC.	2. AFFECTED OUTFALLS		3. BRIEF DESCRIPTION OF PROJECT	4. FINAL COMPLIANCE DATE	
	a. NO.	b. SOURCE OF DISCHARGE		a. REQUIRED	b. PROJECTED
N/A	N/A	N/A	N/A	N/A	N/A

B. OPTIONAL: You may attach additional sheets describing any additional water pollution control programs (or other environmental projects which may affect your discharges) you now have underway or which you plan. Indicate whether each program is now underway or planned, and indicate your actual or planned schedules for construction.
 MARK "X" IF DESCRIPTION OF ADDITIONAL CONTROL PROGRAMS IS ATTACHED

CONTINUED FROM PAGE 2

V. INTAKE AND EFFLUENT CHARACTERISTICS

A, B, & C: See instructions before proceeding - Complete one set of tables for each outfall - Annotate the outfall number in the space provided.

NOTE: Tables V-A, V-B, and V-C are included on separate sheets numbered V-1 through V-9.

D. Use the space below to list any of the pollutants listed in Table 2c-3 of the instructions, which you know or have reason to believe is discharged or may be discharged from any outfall. For every pollutant you list, briefly describe the reasons you believe it to be present and report any analytical data in your possession.

1. POLLUTANT	2. SOURCE	1. POLLUTANT	2. SOURCE
Acetaldehyde			
Aluminum Sulfate			
Carbon Disulfide			
Cresol			
Formaldehyde			
Hydrogen Sulfide			
Methyl Mercaptan			
Sodium Hydrosulfide			
Xylene			
Vanadium	<p>Kraft Sulfate Pulping Process. May be produced as a byproduct during pulping and recovery processes.</p> <p>Petroleum Coke, which contains small amounts of Vanadium, is burned as fuel in the No. 2 Lime Kiln.</p>		

VI. POTENTIAL DISCHARGES NOT COVERED BY ANALYSIS

Is any pollutant listed in Item V-C a substance or a component of a substance which you currently use or manufacture as an intermediate or final product or byproduct?

 YES (list all such pollutants below) NO (go to Item VI-B)

CONTINUED FROM THE FRONT

VII. BIOLOGICAL TOXICITY TESTING DATA

Do you have any knowledge or reason to believe that any biological test for acute or chronic toxicity has been made on any of your discharges or on a receiving water in relation to your discharge within the last 3 years?

YES (identify the test(s) and describe their purposes below)

NO (go to Section VIII)

Whole Effluent Toxicity (WET) testing has been performed annually on outfall DSN001 as specified in the facility's past and current NPDES permits. The testing program consists of a 48 hour acute toxicity test using 14% effluent concentration on both ceriodaphnia and fathead minnows.

The purpose of the test is to demonstrate that treated effluent released from the facility into the Alabama River does not cause unacceptable levels of instream toxicity to aquatic life. All tests have demonstrated compliance with 90% survival rate.

VIII. CONTRACT ANALYSIS INFORMATION

Were any of the analyses reported in Item V performed by a contract laboratory or consulting firm?


YES (list the name, address, and telephone number of, and pollutants analyzed by, each such laboratory or firm below)

NO (go to Section IX)

A. NAME	B. ADDRESS	C. TELEPHONE (area code & no.)	D. POLLUTANTS ANALYZED (list)
TTL, Inc.	3516 Greensboro Avenue Tuscaloosa, AL 35401	(205) 345-0816	DMR Parameters
TestAmerica Laboratory	3355 McLemore Street Pensacola, FL 32514	(850) 474-1001	Application sampling parameters

IX. 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 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.

A. NAME & OFFICIAL TITLE (type or print) Carl Gunter- Mill Manager	B. PHONE NO. (area code & no.) (334) 361-5001
C. SIGNATURE 	D. DATE SIGNED 9/19/18

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. SEE INSTRUCTIONS.

EPA I.D. NUMBER (copy from Item 1 of Form 1)
ALD005557004

V. INTAKE AND EFFLUENT CHARACTERISTICS (continued from page 3 of Form 2-C)		OUTFALL NO. DSN001
--	--	-----------------------

PART A – You must provide the results of at least one analysis for every pollutant in this table. Complete one table for each outfall. See instructions for additional details.

1. POLLUTANT	2. EFFLUENT						d. NO. OF ANALYSES	3. UNITS <i>(specify if blank)</i>		4. INTAKE <i>(optional)</i>		
	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE <i>(if available)</i>		c. LONG TERM AVRG. VALUE <i>(if available)</i>			a. CONCENTRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
a. Biochemical Oxygen Demand (BOD)	70	18,470	52	12,273	28	6,786	788	mg/L	1b/d	--	--	--
b. Chemical Oxygen Demand (COD)	160	50,707	--	--	--	--	1	mg/L	1b/d	--	--	--
c. Total Organic Carbon (TOC)	24	7,606	--	--	--	--	1	mg/L	1b/d	--	--	--
d. Total Suspended Solids (TSS)	144	43,344	80	22,634	46	11,062	702	mg/L	1b/d	--	--	--
e. Ammonia (as N)	0.28	88.74	--	--	--	--	1	mg/L	1b/d	--	--	--
f. Flow	VALUE 50		VALUE 41.09		VALUE 29.34		1,245	MGD	MGD	VALUE --		--
g. Temperature (winter)	VALUE --		VALUE --		VALUE --		--	°C		VALUE --		--
h. Temperature (summer)	VALUE 30.1		VALUE 30.1		VALUE --		1	°C		VALUE --		--
i. pH	MINIMUM 7.4	MAXIMUM 8.7	MINIMUM 7.4	MAXIMUM 8.4			541	STANDARD UNITS				

PART B – Mark "X" in column 2-a for each pollutant you know or have reason to believe is present. Mark "X" in column 2-b for each pollutant you believe to be absent. If you mark column 2a for any pollutant which is limited either directly, or indirectly but expressly, in an effluent limitations guideline, you must provide the results of at least one analysis for that pollutant. For other pollutants for which you mark column 2a, you must provide quantitative data or an explanation of their presence in your discharge. Complete one table for each outfall. See the instructions for additional details and requirements.

1. POLLUTANT AND CAS NO. <i>(if available)</i>	2. MARK "X"		3. EFFLUENT						d. NO. OF ANALYSES	4. UNITS		5. INTAKE <i>(optional)</i>		
	a. BELIEVED PRESENT	b. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE <i>(if available)</i>		c. LONG TERM AVRG. VALUE <i>(if available)</i>			a. CONCENTRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
			(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
a. Bromide (24959-67-9)		X	NA	NA	--	--	--	--	NA	NA	--	--	--	
b. Chlorine, Total Residual		X	<0.01	<3.2	--	--	--	--	1	mg/L	1b/d	--	--	
c. Color	X		470	NA	--	--	--	--	1	C.U.	NA	--	--	
d. Fecal Coliform	X		230	NA	--	--	--	--	1	CFU/100 mL	NA	--	--	
e. Fluoride (16984-48-8)	X		0.082	26	--	--	--	--	1	mg/L	1b/d	--	--	
f. Nitrate-Nitrite (as N)	X		0.035	11.1	--	--	--	--	1	mg/L	1b/d	--	--	

ITEM V-B CONTINUED FROM FRONT

1. POLLUTANT AND CAS NO. (if available)	2. MARK "X"		3. EFFLUENT						4. UNITS		5. INTAKE (optional)			
	a. BELIEVED PRESENT	b. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE (if available)		c. LONG TERM AVRG. VALUE (if available)		d. NO. OF ANALYSES	a. CONCEN- TRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
			(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
g. Nitrogen, Total Organic (as N)	X		5.5	1,743	--	--	--	--	1	mg/L	lb/d	--	--	--
h. Oil and Grease	X		1.7	539	--	--	--	--	1	mg/L	lb/d	--	--	--
i. Phosphorus (as P), Total (7723-14-0)	X		0.71	225	--	--	--	--	1	mg/L	lb/d	--	--	--
j. Radioactivity														
(1) Alpha, Total	X		<0.141	NA	--	--	--	--	1	pCi/L	NA	--	--	--
(2) Beta, Total	X		14.6	NA	--	--	--	--	1	pCi/L	NA	--	--	--
(3) Radium, Total	X		<0.485	NA	--	--	--	--	1	pCi/L	NA	--	--	--
(4) Radium 226, Total	X		0.862	NA	--	--	--	--	1	pCi/L	NA	--	--	--
k. Sulfate (as SO ₄) (14808-79-8)	X		410	129,937	--	--	--	--	1	mg/L	lb/d	--	--	--
l. Sulfide (as S)	X		0.52	165	--	--	--	--	1	mg/L	lb/d	--	--	--
m. Sulfite (as SO ₃) (14265-45-3)	X		<2.0	<0.634	--	--	--	--	1	mg/L	lb/d	--	--	--
n. Surfactants	X		0.32	101	--	--	--	--	1	mg/L	lb/d	--	--	--
o. Aluminum, Total (7429-90-5)	X		480	152	--	--	--	--	1	ug/L	lb/d	--	--	--
p. Barium, Total (7440-39-3)	X		40	13	--	--	--	--	1	ug/L	lb/d	--	--	--
q. Boron, Total (7440-42-8)	X		180	57	--	--	--	--	1	ug/L	lb/d	--	--	--
r. Cobalt, Total (7440-48-4)	X		<0.4	<0.127	--	--	--	--	1	ug/L	lb/d	--	--	--
s. Iron, Total (7439-89-6)	X		<53	<16,797	--	--	--	--	1	ug/L	lb/d	--	--	--
t. Magnesium, Total (7439-95-4)	X		5,600	1,775	--	--	--	--	1	ug/L	lb/d	--	--	--
u. Molybdenum, Total (7439-98-7)	X		1.1	0.35	--	--	--	--	1	ug/L	lb/d	--	--	--
v. Manganese, Total (7439-96-5)	X		670	212	--	--	--	--	1	ug/L	lb/d	--	--	--
w. Tin, Total (7440-31-5)	X		<1.1	<0.349	--	--	--	--	1	ug/L	lb/d	--	--	--
x. Titanium, Total (7440-32-6)	X		3.3	1.045	--	--	--	--	1	ug/L	lb/d	--	--	--

EPA I.D. NUMBER (copy from Item 1 of Form 1)	OUTFALL NUMBER
ALD005557004	001

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-c for each pollutant you believe is absent. If you mark column 2a for any pollutant, you must provide the results of at least one analysis for that pollutant. If you mark column 2b for any pollutant, you must provide the results of at least one analysis for that pollutant if you know or have reason to believe it will be discharged in concentrations of 10 ppb or greater. 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.

1. POLLUTANT AND CAS NUMBER (if available)	2. MARK "X"			3. EFFLUENT						4. UNITS		5. INTAKE (optional)			
	a. TESTING REQUIRED	b. BELIEVED PRESENT	c. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE (if available)		c. LONG TERM AVRG. VALUE (if available)		d. NO. OF ANALYSES	a. CONCENTRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
				(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
METALS, CYANIDE, AND TOTAL PHENOLS															
1M. Antimony, Total (7440-36-0)	X		X	<1	<0.317	----	--	--	--	1	ug/L	lb/d	--	--	--
2M. Arsenic, Total (7440-38-2)	X		X	<0.46	<0.146	--	--	--	--	1	ug/L	lb/d	--	--	--
3M. Beryllium, Total (7440-41-7)	X		X	<0.34	<0.108	--	--	--	--	1	ug/L	lb/d	--	--	--
4M. Cadmium, Total (7440-43-9)	X		X	<0.34	<0.108	--	--	--	--	1	ug/L	lb/d	--	--	--
5M. Chromium, Total (7440-47-3)	X		X	<1.1	<0.349	--	--	--	--	1	ug/L	lb/d	--	--	--
6M. Copper, Total (7440-50-8)	X		X	<2.1	<0.665	--	--	--	--	1	ug/L	lb/d	--	--	--
7M. Lead, Total (7439-92-1)	X		X	<0.35	<0.111	--	--	--	--	1	ug/L	lb/d	--	--	--
8M. Mercury, Total (7439-97-6)	X		X	<1	<0.316	--	--	--	--	1	ng/L	lb/d	--	--	--
9M. Nickel, Total (7440-02-0)	X	X		2.8	0.887	--	--	--	--	1	ug/L	lb/d	--	--	--
10M. Selenium, Total (7782-49-2)	X	X		0.29	0.092	--	--	--	--	1	ug/L	lb/d	--	--	--
11M. Silver, Total (7440-22-4)	X		X	<0.11	<0.035	--	--	--	--	1	ug/L	lb/d	--	--	--
12M. Thallium, Total (7440-28-0)	X		X	<0.085	<0.027	--	--	--	--	1	ug/L	lb/d	--	--	--
13M. Zinc, Total (7440-66-6)	X	X		19	6.02	--	--	--	--	1	ug/L	lb/d	--	--	--
14M. Cyanide, Total (57-12-5)	X		X	<0.0050	<2	--	--	--	--	1	mg/L	lb/d	--	--	--
15M. Phenols, Total	X		X	<0.0080	<2.5	--	--	--	--	1	mg/L	lb/d	--	--	--
DIOXIN															
2,3,7,8-Tetra-chlorodibenzo-P-Dioxin (1764-01-6)	X		X	DESCRIBE RESULTS Not detected at a detection limit of 0.13 pg/L											

CONTINUED FROM THE FRONT

1. POLLUTANT AND CAS NUMBER (if available)	2. MARK "X"			3. EFFLUENT							4. UNITS		5. INTAKE (optional)		
	a. TESTING REQUIRED	b. BELIEVED PRESENT	c. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE (if available)		c. LONG TERM AVRG. VALUE (if available)		d. NO. OF ANALYSES	a. CONCEN- TRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
				(1)	(2)	(1)	(2)	(1)	(2)				(1)	(2)	
				CONCENTRATION	MASS	CONCENTRATION	MASS	CONCENTRATION	MASS				CONCENTRATION	MASS	
GC/MS FRACTION - VOLATILE COMPOUNDS															
1V. Accrolein (107-02-8)	X		X	<10	<3.169	--	--	--	--	1	ug/L	lb/d	--	--	--
2V. Acrylonitrile (107-13-1)	X		X	<2.8	<0.887	--	--	--	--	1	ug/L	lb/d	--	--	--
3V. Benzene (71-43-2)	X		X	<0.38	<0.120	--	--	--	--	1	ug/L	lb/d	--	--	--
4V. Bis (Chloro- methyl) Ether (542-88-1)	X		X	<57	<18	--	--	--	--	1	ug/L	lb/d	--	--	--
5V. Bromoform (75-25-2)	X		X	<0.71	<0.225	--	--	--	--	1	ug/L	lb/d	--	--	--
6V. Carbon Tetrachloride (56-23-5)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
7V. Chlorobenzene (108-90-7)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
8V. Chlorodi- bromomethane (124-48-1)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
9V. Chloroethane (75-00-3)	X		X	<0.76	<0.263	--	--	--	--	1	ug/L	lb/d	--	--	--
10V. 2-Chloro- ethylvinyl Ether (110-75-8)	X		X	<2.0	<0.634	--	--	--	--	1	ug/L	lb/d	--	--	--
11V. Chloroform (67-66-3)	X		X	<0.60	<0.200	--	--	--	--	1	ug/L	lb/d	--	--	--
12V. Dichloro- bromomethane (75-27-4)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
13V. Dichloro- difluoromethane (75-71-8)	X		X	<1.9	<3.169	--	--	--	--	1	ug/L	lb/d	--	--	--
14V. 1,1-Dichloro- ethane (75-34-3)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
15V. 1,2-Dichloro- ethane (107-06-2)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
16V. 1,1-Dichloro- ethylene (75-35-4)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
17V. 1,2-Dichloro- propane (78-87-5)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
18V. 1,3-Dichloro- propylene (542-75-6)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
19V. Ethylbenzene (100-41-4)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
20V. Methyl Bromide (74-83-9)	X		X	<0.98	<311	--	--	--	--	1	ug/L	lb/d	--	--	--
21V. Methyl Chloride (74-87-3)	X		X	<3.0	<0.951	--	--	--	--	1	ug/L	lb/d	--	--	--

CONTINUED FROM PAGE V-4

1. POLLUTANT AND CAS NUMBER (if available)	2. MARK "X"			3. EFFLUENT							4. UNITS		5. INTAKE (optional)		
	a. TESTING REQUIRED	b. BELIEVED PRESENT	c. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE (if available)		c. LONG TERM AVRG. VALUE (if available)		d. NO. OF ANALYSES	a. CONCENTRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
				(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
GC/MS FRACTION - VOLATILE COMPOUNDS (continued)															
22V. Methylene Chloride (75-09-2)	X		X	<3.0	<0.951	--	--	--	--	1	ug/L	lb/d	--	--	--
23V. 1,1,2,2-Tetrachloroethane (79-34-5)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
24V. Tetrachloroethylene (127-18-4)	X		X	<0.58	<0.184	--	--	--	--	1	ug/L	lb/d	--	--	--
25V. Toluene (108-88-3)	X		X	<0.70	<222	--	--	--	--	1	ug/L	lb/d	--	--	--
26V. 1,2-Trans-Dichloroethylene (156-60-5)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
27V. 1,1,1-Trichloroethane (71-55-6)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
28V. 1,1,2-Trichloroethane (79-00-5)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
29V Trichloroethylene (79-01-6)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
30V. Trichlorofluoromethane (75-69-4)	X		X	<0.52	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
31V. Vinyl Chloride (75-01-4)	X		X	<0.50	<0.158	--	--	--	--	1	ug/L	lb/d	--	--	--
GC/MS FRACTION - ACID COMPOUNDS															
1A. 2-Chlorophenol (95-57-8)	X		X	<13	<2.120	--	--	--	--	1	ug/L	lb/d	--	--	--
2A. 2,4-Dichlorophenol (120-83-2)	X		X	<17	<5.388	--	--	--	--	1	ug/L	lb/d	--	--	--
3A. 2,4-Dimethylphenol (105-67-9)	X		X	<20	<6.338	--	--	--	--	1	ug/L	lb/d	--	--	--
4A. 4,6-Dinitro-O-Cresol (534-52-1)	X		X	<9.1	<2.884	--	--	--	--	1	ug/L	lb/d	--	--	--
5A. 2,4-Dinitrophenol (51-28-5)	X		X	<19	<6.021	--	--	--	--	1	ug/L	lb/d	--	--	--
6A. 2-Nitrophenol (88-75-5)	X		X	<30	<9.507	--	--	--	--	1	ug/L	lb/d	--	--	--
7A. 4-Nitrophenol (100-02-7)	X		X	<12	<3.803	--	--	--	--	1	ug/L	lb/d	--	--	--
8A. P-Chloro-M-Cresol (59-50-7)	X		X	<22	<6.972	--	--	--	--	1	ug/L	lb/d	--	--	--
9A. Pentachlorophenol (87-86-5)	X		X	<8.0	<2.535	--	--	--	--	1	ug/L	lb/d	--	--	--
10A. Phenol (108-95-2)	X		X	<15	<4.753	--	--	--	--	1	ug/L	lb/d	--	--	--
11A. 2,4,6-Trichlorophenol (88-05-2)	X		X	<20	<6.338	--	--	--	--	1	ug/L	lb/d	--	--	--

CONTINUED FROM THE FRONT

1. POLLUTANT AND CAS NUMBER (if available)	2. MARK "X"			3. EFFLUENT						4. UNITS		5. INTAKE (optional)			
	a. TESTING REQUIRED	b. BELIEVED PRESENT	c. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE (if available)		c. LONG TERM AVRG. VALUE (if available)		d. NO. OF ANALYSES	a. CONCENTRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
				(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
GC/MS FRACTION - BASE/NEUTRAL COMPOUNDS															
1B. Acenaphthene (83-32-9)	X		X	<0.91	<0.288	--	--	--	--	1	ug/L	lb/d	--	--	--
2B. Acenaphthylene (208-96-8)	X		X	<0.97	<0.307	--	--	--	--	1	ug/L	lb/d	--	--	--
3B. Anthracene (120-12-7)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	lb/d	--	--	--
4B. Benzidine (92-87-5)	X		X	<110	<34.86	--	--	--	--	1	ug/L	lb/d	--	--	--
5B. Benzo (a) Anthracene (56-55-3)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	lb/d	--	--	--
6B. Benzo (a) Pyrene (50-32-8)	X		X	<0.68	<0.216	--	--	--	--	1	ug/L	lb/d	--	--	--
7B. 3,4-Benzo-fluoranthene (205-99-2)	X		X	<0.86	<0.273	--	--	--	--	1	ug/L	lb/d	--	--	--
8B. Benzo (ghi) Perylene (191-24-2)	X		X	<1.3	<0.412	--	--	--	--	1	ug/L	lb/d	--	--	--
9B. Benzo (k) Fluoranthene (207-08-9)	X		X	<0.91	<0.288	--	--	--	--	1	ug/L	lb/d	--	--	--
10B. Bis (3-Chloroethoxy) Methane (111-91-1)	X		X	<0.91	<0.288	--	--	--	--	1	ug/L	lb/d	--	--	--
11B. Bis (2-Chloroethyl) Ether (111-44-4)	X		X	<15	<4.75	--	---	--	--	1	ug/L	lb/d	--	--	--
12B. Bis (2-Chloroisopropyl) Ether (102-80-1)	X		X	<57	<18	--	--	--	--	1	ug/L	lb/d	--	--	--
13B. Bis (2-Ethylhexyl) Phthalate (117-81-7)	X		X	<11	<3.486	--	--	--	--	1	ug/L	lb/d	--	--	--
14B. 4-Bromophenyl Phenyl Ether (101-55-3)	X		X	<57	<18	--	--	--	--	1	ug/L	lb/d	--	--	--
15B. Butyl Benzyl Phthalate (85-68-7)	X		X	<1.1	<0.348	--	--	--	--	1	ug/L	lb/d	--	--	--
16B. 2-Chloronaphthalene (91-58-7)	X		X	<0.80	<0.254	--	--	--	--	1	ug/L	lb/d	--	--	--
17B. 4-Chlorophenyl Phenyl Ether (7005-72-3)	X		X	<11	<3.486	--	--	--	--	1	ug/L	lb/d	--	--	--
18B. Chrysene (218-01-9)	X		X	<1.1	<0.348	--	--	--	--	1	ug/L	lb/d	--	--	--
19B. Dibenzo (a,h) Anthracene (53-70-3)	X		X	<1.4	<0.444	--	--	--	--	1	ug/L	lb/d	--	--	--
20B. 1,2-Dichlorobenzene (95-50-1)	X		X	<0.97	<0.307	--	--	--	--	1	ug/L	lb/d	--	--	--
21B. 1,3-Di-chlorobenzene (541-73-1)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	lb/d	--	--	--

CONTINUED FROM PAGE V-6

1. POLLUTANT AND CAS NUMBER (if available)	2. MARK "X"			3. EFFLUENT							4. UNITS		5. INTAKE (optional)		
	a. TESTING REQUIRED	b. BELIEVED PRESENT	c. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE (if available)		c. LONG TERM AVRG. VALUE (if available)		d. NO. OF ANALYSES	a. CONCEN- TRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
				(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
GC/MS FRACTION - BASE/NEUTRAL COMPOUNDS (continued)															
22B. 1,4-Dichloro- benzene (106-46-7)	X		X	<0.91	<0.288	--	--	--	--	1	ug/L	lb/d	--	--	--
23B. 3,3-Dichloro- benzidine (91-94-1)	X		X	<15	<4.75	--	--	--	--	1	ug/L	lb/d	--	--	--
24B. Diethyl Phthalate (84-66-2)	X		X	<1.4	<0.444	--	--	--	--	1	ug/L	lb/d	--	--	--
25B. Dimethyl Phthalate (131-11-3)	X		X	<0.97	<0.288	--	--	--	--	1	ug/L	lb/d	--	--	--
26B. Di-N-Butyl Phthalate (84-74-2)	X		X	<15	<4.75	--	--	--	--	1	ug/L	lb/d	--	--	--
27B. 2,4-Dinitro- toluene (121-14-2)	X		X	<11	<3.486	--	--	--	--	1	ug/L	lb/d	--	--	--
28B. 2,6-Dinitro- toluene (606-20-2)	X		X	<11	<3.486	--	--	--	--	1	ug/L	lb/d	--	--	--
29B. Di-N-Octyl Phthalate (117-84-0)	X		X	<0.97	<0.288	--	--	--	--	1	ug/L	lb/d	--	--	--
30B. 1,2-Diphenyl- hydrazine (as Azo- benzene) (122-66-7)	X		X	<5.7	<1.8	--	--	--	--	1	ug/L	lb/d	--	--	--
31B. Fluoranthene (206-44-0)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	lb/d	--	--	--
32B. Fluorene (86-73-7)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	lb/d	--	--	--
33B. Hexachloro- benzene (118-74-1)	X		X	<0.97	<0.288	--	--	--	--	1	ug/L	lb/d	--	--	--
34B. Hexachloro- butadiene (87-68-3)	X		X	<21	<6.65	--	--	--	--	1	ug/L	lb/d	--	--	--
35B. Hexachloro- cyclopentadiene (77-47-4)	X		X	<15	<4.75	--	--	--	--	1	ug/L	lb/d	--	--	--
36B Hexachloro- ethane (87-72-1)	X		X	<24	<7.61	--	--	--	--	1	ug/L	lb/d	--	--	--
37B. Indeno (1,2,3-cd) Pyrene (193-39-5)	X		X	<1.3	<0.412	--	--	--	--	1	ug/L	lb/d	--	--	--
38B. Isophorone (78-59-1)	X		X	<0.80	<0.253	--	--	--	--	1	ug/L	lb/d	--	--	--
39B. Naphthalene (91-20-3)	X		X	<0.97	<0.288	--	--	--	--	1	ug/L	lb/d	--	--	--
40B. Nitrobenzene (98-95-3)	X		X	<0.74	<0.235	--	--	--	--	1	ug/L	lb/d	--	--	--
41B. N-Nitro- sodimethylamine (62-75-9)	X		X	<20	<6.34	--	--	--	--	1	ug/L	lb/d	--	--	--
42B. N-Nitrosodi- N-Propylamine (621-64-7)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	lb/d	--	--	--

CONTINUED FROM THE FRONT

1. POLLUTANT AND CAS NUMBER (if available)	2. MARK "X"			3. EFFLUENT						4. UNITS		5. INTAKE (optional)			
	a. TESTING REQUIRED	b. BELIEVED PRESENT	c. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE (if available)		c. LONG TERM AVRG. VALUE (if available)		d. NO. OF ANALYSES	a. CONCENTRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
				(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
GC/MS FRACTION - BASE/NEUTRAL COMPOUNDS (continued)															
43B. N-Nitrosodiphenylamine (86-30-6)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	1b/d	--	--	--
44B. Phenanthrene (85-01-8)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	1b/d	--	--	--
45B. Pyrene (129-00-0)	X		X	<1.2	<0.380	--	--	--	--	1	ug/L	1b/d	--	--	--
46B. 1,2,4-Trichlorobenzene (120-82-1)	X		X	<1.0	<0.317	--	--	--	--	1	ug/L	1b/d	--	--	--
GC/MS FRACTION - PESTICIDES															
1P. Aldrin (309-00-2)	X		X	<0.012	<0.004	--	--	--	--	1	ug/L	1b/d	--	--	--
2P. α -BHC (319-84-6)	X		X	<0.015	<0.005	--	--	--	--	1	ug/L	1b/d	--	--	--
3P. β -BHC (319-85-7)	X		X	<0.012	<0.004	--	--	--	--	1	ug/L	1b/d	--	--	--
4P. γ -BHC (58-89-9)	X		X	<0.0086	<0.003	--	--	--	--	1	ug/L	1b/d	--	--	--
5P. δ -BHC (319-86-8)	X		X	<0.10	<0.032	--	--	--	--	1	ug/L	1b/d	--	--	--
6P. Chlordane (57-74-9)	X		X	<0.53	<0.168	--	--	--	--	1	ug/L	1b/d	--	--	--
7P. 4,4'-DDT (50-29-3)	X		X	<0.016	<0.005	--	--	--	--	1	ug/L	1b/d	--	--	--
8P. 4,4'-DDE (72-55-9)	X		X	<0.0090	<0.003	--	--	--	--	1	ug/L	1b/d	--	--	--
9P. 4,4'-DDD (72-54-8)	X		X	<0.012	<0.004	--	--	--	--	1	ug/L	1b/d	--	--	--
10P. Dieldrin (60-57-1)	X		X	<0.012	<0.004	--	--	--	--	1	ug/L	1b/d	--	--	--
11P. α -Endosulfan (115-29-7)	X		X	<0.012	<0.004	--	--	--	--	1	ug/L	1b/d	--	--	--
12P. β -Endosulfan (115-29-7)	X		X	<0.030	<0.009	--	--	--	--	1	ug/L	1b/d	--	--	--
13P. Endosulfan Sulfate (1031-07-8)	X		X	<0.0086	<0.003	--	--	--	--	1	ug/L	1b/d	--	--	--
14P. Endrin (72-20-8)	X		X	<0.012	<0.004	--	--	--	--	1	ug/L	1b/d	--	--	--
15P. Endrin Aldehyde (7421-93-4)	X		X	<0.012	<0.004	--	--	--	--	1	ug/L	1b/d	--	--	--
16P. Heptachlor (76-44-8)	X		X	<0.01	<0.003	--	--	--	--	1	ug/L	1b/d	--	--	--

EPA I.D. NUMBER (copy from Item 1 of Form 1)	OUTFALL NUMBER
ALD005557004	001

CONTINUED FROM PAGE V-8

1. POLLUTANT AND CAS NUMBER (if available)	2. MARK "X"			3. EFFLUENT						4. UNITS		5. INTAKE (optional)			
	a. TESTING REQUIRED	b. BELIEVED PRESENT	c. BELIEVED ABSENT	a. MAXIMUM DAILY VALUE		b. MAXIMUM 30 DAY VALUE (if available)		c. LONG TERM AVRG. VALUE (if available)		d. NO. OF ANALYSES	a. CONCENTRATION	b. MASS	a. LONG TERM AVERAGE VALUE		b. NO. OF ANALYSES
				(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS	(1) CONCENTRATION	(2) MASS				(1) CONCENTRATION	(2) MASS	
GC/MS FRACTION -- PESTICIDES (continued)															
17P. Heptachlor Epoxide (1024-57-3)	X		X	<0.013	<0.004	--	--	--	--	1	ug/L	lb/d	--	--	--
18P. PCB-1242 (53469-21-9)	X		X	<0.14	<0.048	--	--	--	--	1	ug/L	lb/d	--	--	--
19P. PCB-1254 (11097-69-1)	X		X	<0.23	<0.073	--	--	--	--	1	ug/L	lb/d	--	--	--
20P. PCB-1221 (11104-28-2)	X		X	<0.90	<0.285	--	--	--	--	1	ug/L	lb/d	--	--	--
21P. PCB-1232 (11141-16-5)	X		X	<0.41	<0.130	--	--	--	---	1	ug/L	lb/d	--	---	--
22P. PCB-1248 (12672-29-6)	X		X	<0.082	<0.026	--	--	--	--	1	ug/L	lb/d	--	--	--
23P. PCB-1260 (11096-82-5)	X		X	<0.63	<0.200	--	--	--	--	1	ug/L	lb/d	--	--	--
24P. PCB-1016 (12674-11-2)	X		X	<1.1	<0.348	--	--	--	--	1	ug/L	lb/d	--	--	--
25P. Toxaphene (8001-35-2)	X		X	<1.2	<0.380	--	--	--	--	1	ug/L	lb/d	--	--	--

Please print or type in the unshaded areas only.

EPA ID Number (copy from Item 1 of Form 1)
ALD005557004

Form Approved: OMB No. 2040-0086.
Approval expires 5-31-92.

FORM
2E
NPDES



Facilities Which Do Not Discharge Process Wastewater

I. RECEIVING WATERS

For this outfall, list the latitude and longitude, and name of the receiving water(s):

Outfall Number (list)	Latitude			Longitude			Receiving Water (name)
	Deg	Min	Sec	Deg	Min	Sec	
DSN002	32	23	54	86	28	31	Alabama River

II. DISCHARGE DATE (If a new discharger, the date you expect to begin discharging)

III. TYPE OF WASTE

A. Check the box(es) indicating the general type(s) of wastes discharged.

- Sanitary Wastes
 Restaurant or Cafeteria Wastes
 Noncontact Cooling Water
 Other Nonprocess Wastewater (Identify)

B. If any cooling water additives are used, list them here. Briefly describe their composition if this information is available.

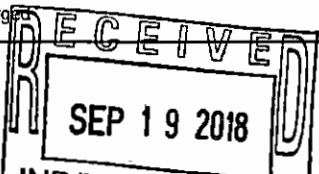
None used.



IV. EFFLUENT CHARACTERISTICS

- A. Existing Sources** — Provide measurements for the parameters listed in the left-hand column below, unless waived by the permitting authority (see instructions).
B. New Dischargers — Provide estimates for the parameters listed in the left-hand column below, unless waived by the permitting authority. Instead of the number of measurements taken, provide the source of estimated values (see instructions).

Pollutant or Parameter	(1) Maximum Daily Value (include units)		(2) Average Daily Value (last year) (include units)		(3) Number of Measurements Taken (last year)	(4) Source of Estimate (if new discharger)
	Mass	Concentration	Mass	Concentration	(or)	
Biochemical Oxygen Demand (BOD)	30.85 lb/d	2.7 mg/L	--	--	1.00	--
Total Suspended Solids (TSS)	57.1 lb/d	5.0 mg/L	--	--	1.00	--
Fecal Coliform (if believed present or if sanitary waste is discharged)	NA	150 CFU/100mL	--	--	1.00	--
Total Residual Chlorine (if chlorine is used)	0.114 lb/d	0.01 mg/L	--	--	1.00	--
Oil and Grease	29.7 lb/d	2.6 mg/L	--	--	1.00	--
*Chemical oxygen demand (COD)	148.5 lb/d	13 mg/L	--	--	1.00	--
*Total organic carbon (TOC)	37.7 lb/d	3.3 mg/L	--	--	1.00	--
Ammonia (as N)	<0.251 lb/d	<0.022 mg/L	--	--	1.00	--
Discharge Flow	Value 3.8 mgd		2.22 mgd		56.00	--
pH (give range)	Value 7.64		--		1.00	--
Temperature (Winter)			25.60 °C	17.80 °C	28.00	--
Temperature (Summer)			37.80 °C	31.10 °C	28.00	--

*If noncontact cooling water is discharged.



V. Except for leaks or spills, will the discharge described in this form be intermittent or seasonal?		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
If yes, briefly describe the frequency of flow and duration.		
N/A		
VI. TREATMENT SYSTEM (Describe briefly any treatment system(s) used or to be used)		
None.		
VII. OTHER INFORMATION (Optional)		
Use the space below to expand upon any of the above questions or to bring to the attention of the reviewer any other information you feel should be considered in establishing permit limitations. Attach additional sheets, if necessary.		
N/A		
VIII. CERTIFICATION		
<p><i>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></p>		
A. Name & Official Title	B. Phone No. (area code & no.)	
Carl Gunter - Mill Manager	(334) 361-5001	
C. Signature	D. Date Signed	
		

Please print or type in the unshaded areas only.

EPA ID Number (copy from Item 1 of Form 1)
ALD005557004

Form Approved, OMB No. 2040-0086.
Approval expires 5-31-92.

FORM
2E
NPDES



Facilities Which Do Not Discharge Process Wastewater

I. RECEIVING WATERS

For this outfall, list the latitude and longitude, and name of the receiving water(s).

Outfall Number (list)	Latitude			Longitude			Receiving Water (name)
	Deg	Min	Sec	Deg	Min	Sec	
DSN003	32	25	0	86	27	46	Autauga Creek

II. DISCHARGE DATE (If a new discharger, the date you expect to begin discharging)

III. TYPE OF WASTE

A. Check the box(es) indicating the general type(s) of wastes discharged.

- Sanitary Wastes
 Restaurant or Cafeteria Wastes
 Noncontact Cooling Water
 Other Nonprocess Wastewater (Identify)

B. If any cooling water additives are used, list them here. Briefly describe their composition if this information is available.

None used.

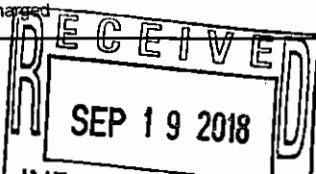
*non-contact fire pump pressure relief water, mill supply pump seal water, fire suppression system water


IV. EFFLUENT CHARACTERISTICS

- A. Existing Sources** — Provide measurements for the parameters listed in the left-hand column below, unless waived by the permitting authority (see instructions).
B. New Dischargers — Provide estimates for the parameters listed in the left-hand column below, unless waived by the permitting authority. Instead of the number of measurements taken, provide the source of estimated values (see instructions).

Pollutant or Parameter	(1) Maximum Daily Value (include units)		(2) Average Daily Value (last year) (include units)		(3)	(4)
	Mass	Concentration	Mass	Concentration	Number of Measurements Taken (last year)	Source of Estimate (if new discharger)
Biochemical Oxygen Demand (BOD)	0.457 lb/d	2.0 mg/L	1.09 lb/d	0.98 mg/L	5.00	--
Total Suspended Solids (TSS)	2.14 lb/d	5.0 mg/L	1.60 lb/d	3.48 mg/L	5.00	--
Fecal Coliform (if believed present or if sanitary waste is discharged)	NA	80 CFU/100mL	--	--	1.00	--
Total Residual Chlorine (if chlorine is used)	0.005 lb/d	0.02 mg/L	--	--	1.00	--
Oil and Grease	0.5 lb/d	2.0 mg/L	--	--	1.00	--
*Chemical oxygen demand (COD)	<1.46 lb/d	<6.4 mg/L	--	--	1.00	--
*Total organic carbon (TOC)	0.91	4.0 mg/L	--	--	1.00	--
Ammonia (as N)	<0.005 lb/d	<0.022 mg/L	--	--	1.00	--
Discharge Flow	Value 0.08 mgd		0.06 mgd		4.00	--
pH (give range)	Value 7.47		--		1.00	--
Temperature (Winter)			°C			--
Temperature (Summer)	27.10 °C		°C		1.00	--

*If noncontact cooling water is discharged



V. Except for leaks or spills, will the discharge described in this form be intermittent or seasonal? If yes, briefly describe the frequency of flow and duration.		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
N/A		
VI. TREATMENT SYSTEM <i>(Describe briefly any treatment system(s) used or to be used)</i>		
None.		
VII. OTHER INFORMATION <i>(Optional)</i>		
Use the space below to expand upon any of the above questions or to bring to the attention of the reviewer any other information you feel should be considered in establishing permit limitations. Attach additional sheets, if necessary.		
N/A		
VIII. CERTIFICATION		
<i>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>		
A. Name & Official Title Carl Gunter - Mill Manager		B. Phone No. (area code & no.) (334) 361-5001
C. Signature 		D. Date Signed 9/19/18

Please print or type in the unshaded areas only.

EPA ID Number (copy from Item 1 of Form 1)
ALD005557004

Form Approved. OMB No. 2040-0086
Approval expires 5-31-92

FORM
2F
NPDES



U.S. Environmental Protection Agency
Washington, DC 20460

**Application for Permit to Discharge Storm Water
Discharges Associated with Industrial Activity**

Paperwork Reduction Act Notice

Public reporting burden for this application is estimated to average 28.6 hours per application, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding the burden estimate, any other aspect of this collection of information, or suggestions for improving this form, including suggestions which may increase or reduce this burden to: Chief, Information Policy Branch, PM-223, U.S. Environmental Protection Agency, 1200 Pennsylvania Avenue, NW, Washington, DC 20460, or Director, Office of Information and Regulatory Affairs, Office of Management and Budget, Washington, DC 20503.

I. Outfall Location

For each outfall, list the latitude and longitude of its location to the nearest 15 seconds and the name of the receiving water.

A. Outfall Number (list)	B. Latitude			C. Longitude			D. Receiving Water (name)
DSN001	32	22	05	86	29	06	Alabama River
DSN003	32	25	00	86	27	46	Autauga Creek

II. Improvements

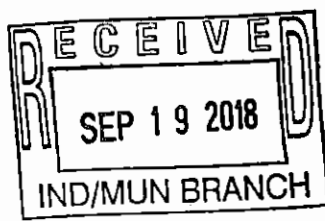
A. Are you now required by any Federal, State, or local authority to meet any implementation schedule for the construction, upgrading or operation of wastewater treatment equipment or practices or any other environmental programs which may affect the discharges described in this application? This includes, but is not limited to, permit conditions, administrative or enforcement orders, enforcement compliance schedule letters, stipulations, court orders, and grant or loan conditions.

1. Identification of Conditions, Agreements, Etc.	2. Affected Outfalls		3. Brief Description of Project	4. Final Compliance Date	
	number	source of discharge		a. req.	b. proj.
None					

B: You may attach additional sheets describing any additional water pollution (or other environmental projects which may affect your discharges) you now have under way or which you plan. Indicate whether each program is now under way or planned, and indicate your actual or planned schedules for construction.

III. Site Drainage Map

Attach a site map showing topography (or indicating the outline of drainage areas served by the outfalls(s) covered in the application if a topographic map is unavailable) depicting the facility including: each of its intake and discharge structures; the drainage area of each storm water outfall; paved areas and buildings within the drainage area of each storm water outfall, each known past or present areas used for outdoor storage or disposal of significant materials, each existing structural control measure to reduce pollutants in storm water runoff, materials loading and access areas, areas where pesticides, herbicides, soil conditioners and fertilizers are applied; each of its hazardous waste treatment, storage or disposal units (including each area not required to have a RCRA permit which is used for accumulating hazardous waste under 40 CFR 262.34); each well where fluids from the facility are injected underground; springs, and other surface water bodies which received storm water discharges from the facility.



Continued from the Front

IV. Narrative Description of Pollutant Sources

A. For each outfall, provide an estimate of the area (include units) of impervious surfaces (including paved areas and building roofs) drained to the outfall, and an estimate of the total surface area drained by the outfall.

Outfall Number	Area of Impervious Surface (provide units)	Total Area Drained (provide units)	Outfall Number	Area of Impervious Surface (provide units)	Total Area Drained (provide units)
DSN001	400 Acres	3,400 Acres	DSN003	7 Acres	70 Acres

B. Provide a narrative description of significant materials that are currently or in the past three years have been treated, stored or disposed in a manner to allow exposure to storm water; method of treatment, storage, or disposal; past and present materials management practices employed to minimize contact by these materials with storm water runoff; materials loading and access areas, and the location, manner, and frequency in which pesticides, herbicides, soil conditioners, and fertilizers are applied.

See Form 2F Attachment 1

C. For each outfall, provide the location and a description of existing structural and nonstructural control measures to reduce pollutants in storm water runoff; and a description of the treatment the storm water receives, including the schedule and type of maintenance for control and treatment measures and the ultimate disposal of any solid or fluid wastes other than by discharge.

Outfall Number	Treatment	List Codes from Table 2F-1
DSN001	See Form 2F Attachment 2	1T, 1U, 3B, 3G
DSN003	See Form 2F Attachment 2	4A

V. Nonstormwater Discharges

A. I certify under penalty of law that the outfall(s) covered by this application have been tested or evaluated for the presence of nonstormwater discharges, and that all nonstormwater discharged from these outfall(s) are identified in either an accompanying Form 2C or Form 2E application for the outfall.

Name and Official Title (type or print)	Signature	Date Signed
Carl Gunter, Mill Manager		9/19/18

B. Provide a description of the method used, the date of any testing, and the onsite drainage points that were directly observed during a test.

Both outfalls covered by this application are known to include non-storm water discharges. An accompanying Form 2C is submitted for DSN001 and Form 2E for DSN003. These outfalls were observed during dry weather on April 26, 2018 to confirm only the identified non-stormwater discharges were contributing flow.

VI. Significant Leaks or Spills

Provide existing information regarding the history of significant leaks or spills of toxic or hazardous pollutants at the facility in the last three years, including the approximate date and location of the spill or leak, and the type and amount of material released.

None.

VII. Discharge Information

A, B, C, & D: See instructions before proceeding. Complete one set of tables for each outfall. Annotate the outfall number in the space provided.
Table VII-A, VII-B, VII-C are included on separate sheets numbers VII-1 and VII-2.

E. Potential discharges not covered by analysis – is any toxic pollutant listed in table 2F-2, 2F-3, or 2F-4, a substance or a component of a substance which you currently use or manufacture as an intermediate or final product or byproduct?

Yes (list all such pollutants below)

No (go to Section IX)

N/A

VIII. Biological Toxicity Testing Data

Do you have any knowledge or reason to believe that any biological test for acute or chronic toxicity has been made on any of your discharges or on a receiving water in relation to your discharge within the last 3 years?

Yes (list all such pollutants below)

No (go to Section IX)

48 hour acute toxicity screening tests have been performed annually on Outfall DSN001 as required by the current NPDES permit for this facility. Passing the test requires a 90% or greater survival rate for both Pimephales promelus and Ceriodaphnia dubia at 14% effluent concentration. Each test has demonstrated compliance.

IX. Contract Analysis Information

Were any of the analyses reported in Item VII performed by a contract laboratory or consulting firm?

Yes (list the name, address, and telephone number of, and pollutants analyzed by, each such laboratory or firm below)

No (go to Section X)


A. Name	B. Address	C. Area Code & Phone No.	D. Pollutants Analyzed
TTL, Inc.	3516 Greensboro Avenue Tuscaloosa, AL 35401	(205) 345-0816	DMR parameters
TestAmerica Laboratory	3355 McLemore Street Pensacola, FL 32514	(850) 474-1001	Application sampling parameters

X. 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 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.

A. Name & Official Title (Type Or Print)
Carl Gunter, Mill Manager

B. Area Code and Phone No.
(334) 361-5001

C. Signature


D. Date Signed
9/19/18

VII. Discharge information (Continued from page 3 of Form 2F)

Part A - You must provide the results of at least one analysis for every pollutant in this table. Complete one table for each outfall. See instructions for additional details.

Pollutant and CAS Number (if available)	Maximum Values (include units)		Average Values (include units)		Number of Storm Events Sampled	Sources of Pollutants
	Grab Sample Taken During First 20 Minutes	Flow-Weighted Composite	Grab Sample Taken During First 20 Minutes	Flow-Weighted Composite		
Oil and Grease	1.7 mg/L	N/A	--	--	1.00	Roads, Vehicles
Biological Oxygen Demand (BOD ₅)	2.0	3.3	0.98 mg/L	--	5.00	Bark pile, soil/clay, vegetation
Chemical Oxygen Demand (COD)	<6.4 mg/L	14 mg/L	--	--	1.00	Bark pile, soil/clay, vegetation
Total Suspended Solids (TSS)	5.0 mg/L	<3.2 mg/L	3.48 mg/L	--	5.00	Bark pile, soil/clay, vegetation
Total Nitrogen	<0.282 mg/L	<0.282 mg/L	--	--	1.00	Bark pile, soil/clay, vegetation
Total Phosphorus	0.099 mg/L	0.087 mg/L	--	--	1.00	Bark pile, soil/clay, vegetation
pH	Minimum 7.11	Maximum 7.11	Minimum	Maximum	1.00	NA

Part B - List each pollutant that is limited in an effluent guideline which the facility is subject to or any pollutant listed in the facility's NPDES permit for its process wastewater (if the facility is operating under an existing NPDES permit). Complete one table for each outfall. See the instructions for additional details and requirements.

Pollutant and CAS Number (if available)	Maximum Values (include units)		Average Values (include units)		Number of Storm Events Sampled	Sources of Pollutants
	Grab Sample Taken During First 20 Minutes	Flow-Weighted Composite	Grab Sample Taken During First 20 Minutes	Flow-Weighted Composite		
NA						

DSN003

Continued from the Front

Part C - List each pollutant shown in Table 2F-2, 2F-3, and 2F-4 that you know or have reason to believe is present. See the instructions for additional details and requirements. Complete one table for each outfall.

Pollutant and CAS Number (if available)	Maximum Values (include units)		Average Values (include units)		Number of Storm Events Sampled	Sources of Pollutants
	Grab Sample Taken During First 20 Minutes	Flow-Weighted Composite	Grab Sample Taken During First 20 Minutes	Flow-Weighted Composite		
Fluoride	<0.082 mg/L	<0.082 mg/L	--	--	1.00	Mill Process Water Treatment Area
Sulfate	6.8 mg/L	6.7 mg/L	--	--	1.00	Pulp&Paper Operations, Soil Erosion
Color	30 C.U.	39 C.U.	--	--	1.00	Bark Pile, Soil/Clay, Vegetation
Aluminum, T	170 ug/L	62 ug/L	--	--	1.00	Pulp&Paper Operations, Soil Erosion
Iron, T	510 ug/L	160 ug/L	--	--	1.00	Pulp&Paper Operations, Soil Erosion
Magnesium, T	4,700 ug/L	4,500 ug/L	--	--	1.00	Pulp&Paper Operations, Soil Erosion
Zinc, T	40 ug/L	24 ug/L	--	--	1.00	Pulp&Paper Operations, Soil Erosion
Surfactant	<0.032 mg/L	<0.032 mg/L	--	--	1.00	Mill Process Water Treatment Area
Ammonia	<0.022	<0.022	--	--	1.00	Pulp & Paper Operations
Nitrate + Nitrite	0.12 mg/L	0.12 mg/L	--	--	1.00	Pulp & Paper Operations
TKN	<0.26 mg/L	<0.26 mg/L	--	--	1.00	Pulp & Paper Operations
Manganese	46 ug/L	26 ug/L	--	--	1.00	Pulp&Paper Operations, Soil Erosion
TRC	0.05 mg/L	NA	--	--	1.00	Mill Process Water Treatment Area
Fecal	300 CFU/100mL	NA	--	--	1.00	Waterfowl and Animal Waste
Sulfite	<2.0 mg/L	<2.0 mg/L	--	--	1.00	Pulp & Paper Operations
Barium, T	34 ug/L	31 ug/L	--	--	1.00	Bark Pile, Soil Erosion

Part D - Provide data for the storm event(s) which resulted in the maximum values for the flow weighted composite sample.

1. Date of Storm Event	2. Duration of Storm Event (in minutes)	3. Total rainfall during storm event (in inches)	4. Number of hours between beginning of storm measured and end of previous measurable rain event	5. Maximum flow rate during rain event (gallons/minute or specify units)	6. Total flow from rain event (gallons or specify units)
07/31/2018	3 hours	0.12 inches	>72 hours	110 gpm	17,073 gallons

7. Provide a description of the method of flow measurement or estimate.

Parshall flume weir measurements recorded during storm event.

EPA Form 2F, Attachment 1

Item IV

B-Provide a narrative description of significant materials that are currently or in the past three years have been treated, stored or disposed in a manner to allow exposure to storm water; method of treatment, storage, or disposal; past and present materials management practices employed to minimize contact by these materials with storm water runoff; materials loading and access areas, and the location, manner, and frequency in which pesticides, herbicides, soil conditioners, and fertilizers are applied

The materials stored onsite are kept in covered containers, such as a covered tank, preventing exposure to storm water. Any leaks or spills which might occur from these containers drain to diked areas or to the effluent treatment system.

Included with this application is a map which identifies storage areas and materials loading/access areas. Spill prevention practices are implemented at loading/unloading areas, and these areas are either diked or drain to the Effluent Treatment System.

A discussion of pesticide, herbicide, soil conditioner, and fertilizer use is given below. A facility map with application areas marked has been included to augment the narrative description.

Herbicides are sprayed on the lawns and shrubs once during the early spring and late fall, and as needed. Weed control chemicals are sprayed along fence line, gates and ditches as needed.

During the summer months it is necessary to control mosquitoes in the immediate area of the mill proper. The insecticide is sprayed with a truck mounted fogger. Mosquito control briquettes may also be utilized within the mill. The frequency of application is dependent upon need, with weather a major influencing factor. Other insecticides are generally applied twice per year or as needed.

Fertilizer is broadcast onto the lawns and shrub beds approximately three times each year.

Agricultural Chemicals

The International Paper, Prattville Mill facility covers 6,263 acres, with approximately 700 acres leased for agricultural purposes. The independent companies which lease this property farm a combination of cotton, soybeans, grain sorghum, bahia, and field com, with crops rotated occasionally. Runoff from approximately 55% of this acreage drains into the mill's effluent treatment system and is discharged through permitted Outfall 001, while approximately 15% could runoff through Outfalls 002 or 003. Runoff from the remainder of this acreage remains segregated from runoff from the areas associated with industrial activity and is exempt from the storm water permitting regulations (40 CFR 122.26). It is standard practice in the agricultural community to use a wide variety of chemicals to improve crop performance. The farmlands on International Paper property are managed similarly to any other agricultural property in this area of Alabama. A summary of the typical types of applications used on International Paper, Prattville Mill property in recent years is given below.

Cotton Fields:

Anhydrous Ammonia	One application before planting	6-10" in ground with chisel plow apparatus
Fertilizer	One application before planting	6-10" in ground with chisel plow apparatus
Herbicide	One application before planting	Sprayed onto soil from tractor
Fungicide	One application before planting	Placed in furrow with seed
Insecticide	One application before planting	Placed in furrow with seed
Herbicide	One application at planting	Sprayed onto soil from tractor
Herbicides	Two chemicals applied twice when plowing	Sprayed onto soil from tractor
Insecticides	Applied often during growing season	Sprayed from air
Growth Regulator	Applied twice on some fields	Sprayed from air
Defoliant	Applied at end of growing season	Sprayed from air

Grain sorghum and corn fields:

Anhydrous Ammonia	One application before planting	6-10" in ground with chisel plow apparatus
Fertilizer	One application before planting	6-10" in ground with chisel plow apparatus
Herbicide	Annlication after germination	Sprayed onto soil from tractor

Silvicultural Chemicals

Approximately 26% of the 6,263 acres at the International paper, Prattville Mill facility is being utilized as silvicultural land to support the company's timber needs. Best management practices are followed and include the application of herbicides as needed. An herbicide is sprayed onto the area to be managed prior to or at the time of planting. Fencerows and management area perimeters are also treated with an herbicide spray as needed to control unwanted growth. Single trees on hedgerows may have herbicide injected into a cut to selectively cull undesirable trees.

EPA Form 2F Attachment 2

Item IV

C - For each outfall, provide the location and a description of existing structural and nonstructural control measures to reduce pollutants in storm water runoff; and a description of the treatment the storm water receives, including the schedule and type of maintenance for control and treatment measures and the ultimate disposal of any solid or fluid wastes other than by discharge.

DSN 001

Structural and nonstructural control measures: The facility operating departments are continually monitoring tanks for the presence of leaks through visual inspections and tank level measurements. Several tanks are equipped with remote level indicators and alarms to alert personnel if unusual level changes occur. In addition, the mill has an oil spill prevention, control, and countermeasure plan which includes inspection of all oil-containing tanks for leaks and spills. Structural integrity of the mill's tanks is monitored through an engineering program which includes periodic visual inspection of the tank interior and exterior in addition to testing of wall, floor, and roof thicknesses.

Control measures are also implemented to contain and/or treat any spills which might occur. Several of the mill's tanks, including all acid tanks, are equipped with dikes which contain at least one and a half times the tank volume. The mill has an acid dike drainage plan in effect which requires testing of accumulated liquids within dikes and neutralization of the liquids. Spill response equipment is kept on hand at all times in the event of a material spill.

Any drainage from the mill production area will be treated in the facility's effluent treatment system. The system includes an emergency holding pond, a primary clarifier, an aerated stabilization basin, and two large naturally aerated basins with extended retention times. The system also includes underflow structures which serve to skim any floating materials. The discharge at Outfall DSN001 itself is a controlled flow discharge and may be reduced or halted as needed.

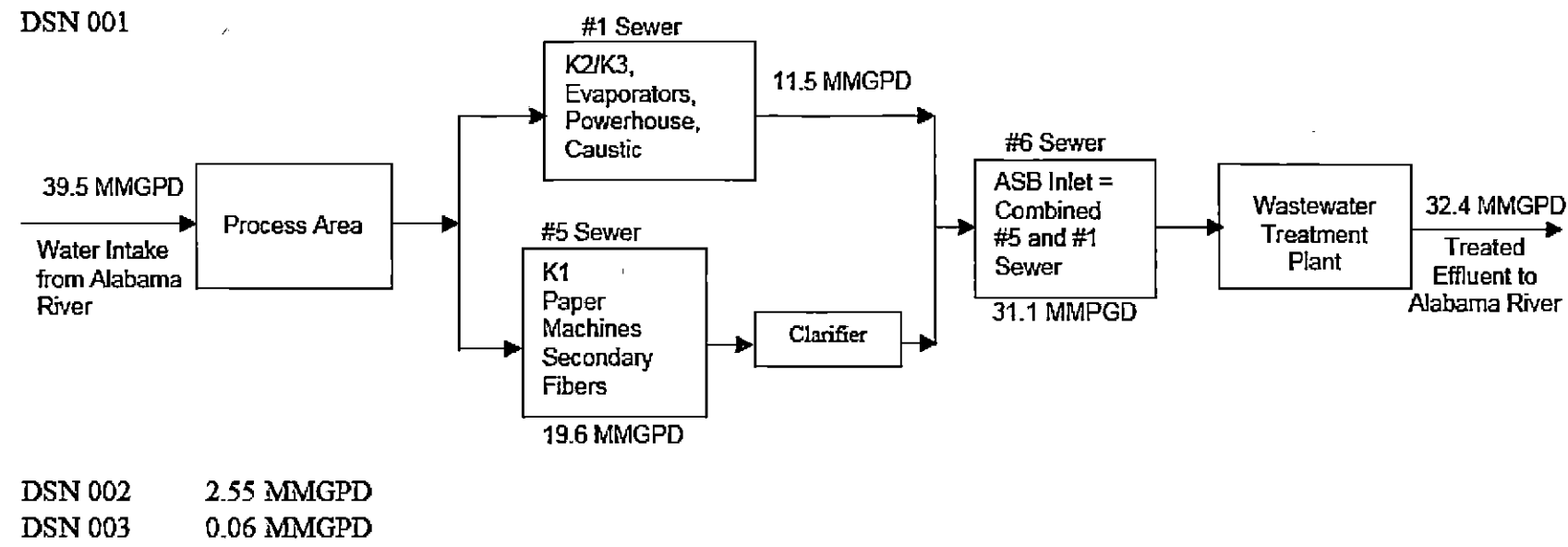
Treatment Codes: 1T, 1U, 3B, 3G

DSN 003

Structural and nonstructural control measures: Tanks located in this drainage area are equipped with a dike capable of holding one and a half times the tank contents. The tank loading area is paved and sloped to contain any spilled liquid. The tank and loading area are covered with a roof to divert any rain water.

Treatment Codes: 4A

Figure 1
 Line drawing showing the water flow through the facility.

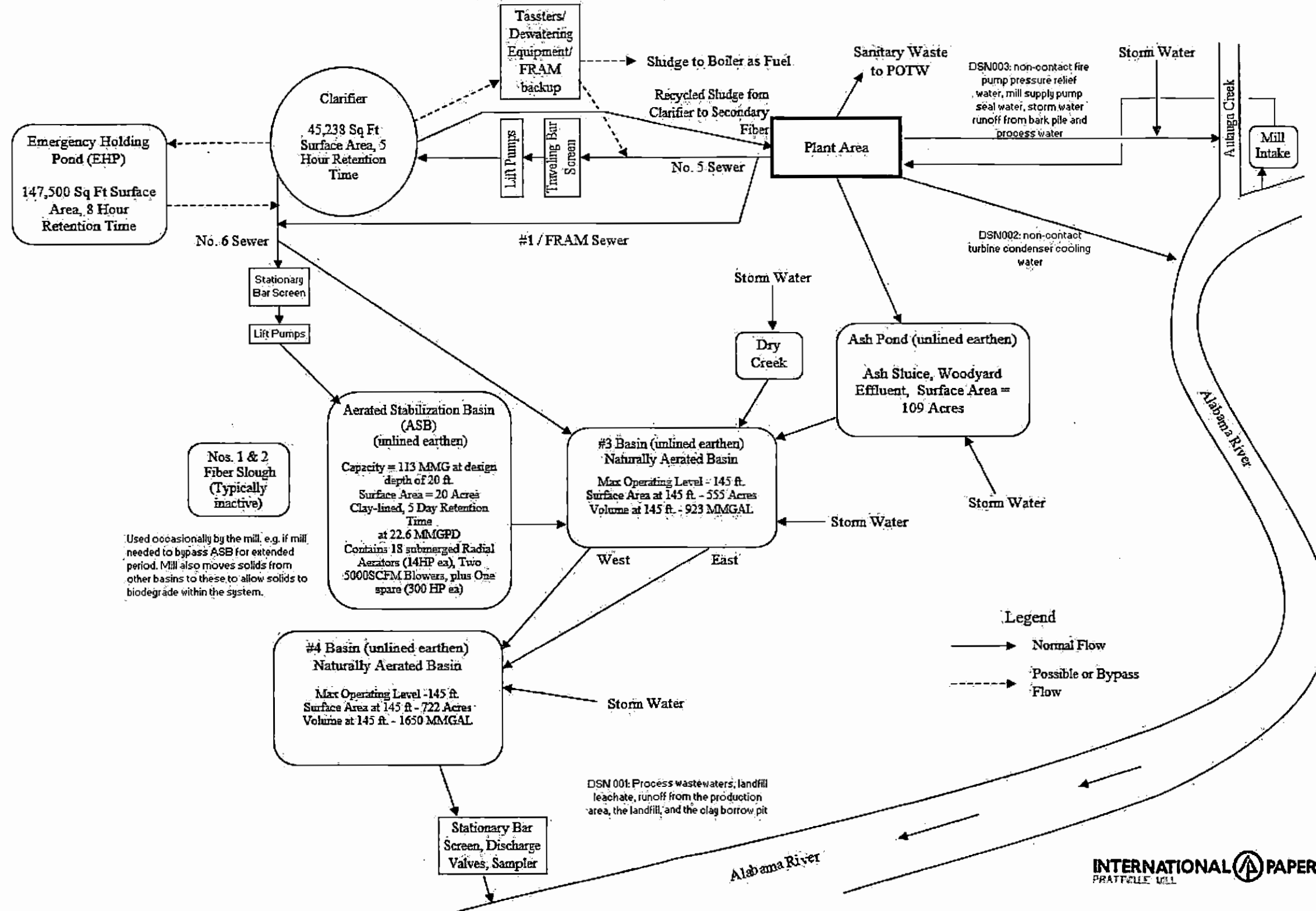


DSN002: non-contact turbine condenser cooling water

DSN003: non-contact fire pump pressure relief water mill supply pump seal water, storm water runoff from bark pile and process water

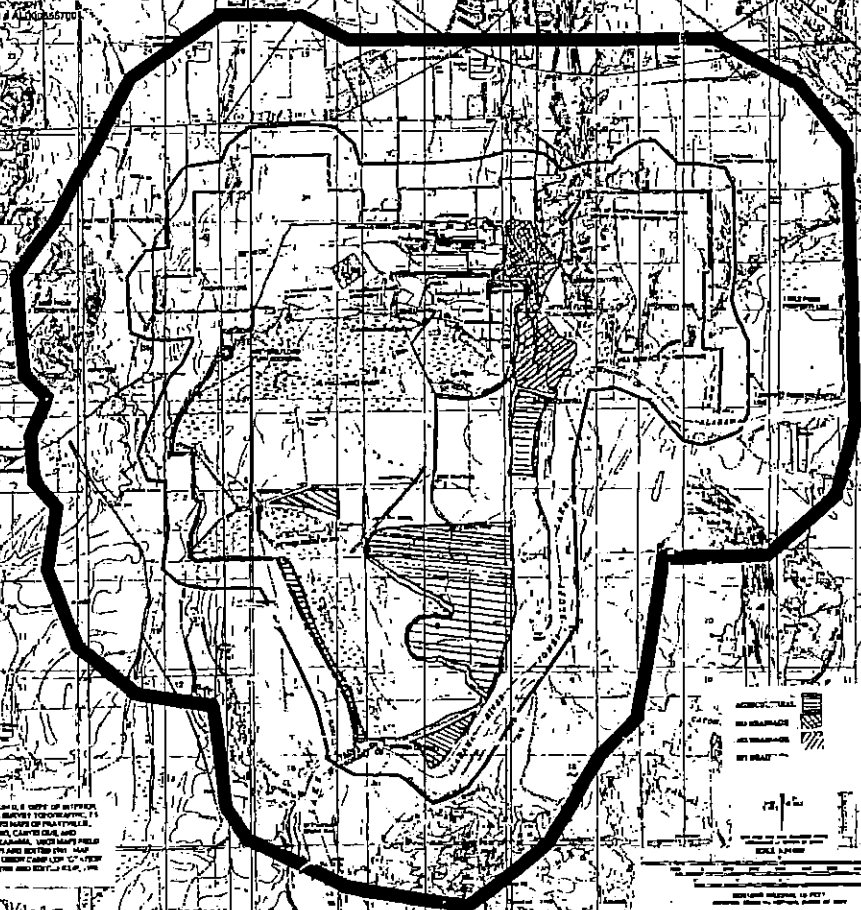
Figure 2
Effluent Treatment System Schematic

EFFLUENT TREATMENT SYSTEM SCHEMATIC



INTERNATIONAL  PAPER
PRATTVILLE MILL PROPERTY

Scale of 1" = 1000 feet



ADAPTED FROM U.S. COPY OF SURVEY
FROM GEOL. SURVEY OF ALABAMA
PROPERTY RECORDS OF PRATTVILLE
INDUSTRIAL PARK, ALABAMA
PROPERTY RECORDS OF PRATTVILLE
INDUSTRIAL PARK, ALABAMA
PROPERTY RECORDS OF PRATTVILLE
INDUSTRIAL PARK, ALABAMA

	ROAD
	STREAM
	CONTOUR
	BUILDING
	UTILITY

Scale of 1" = 1000 feet

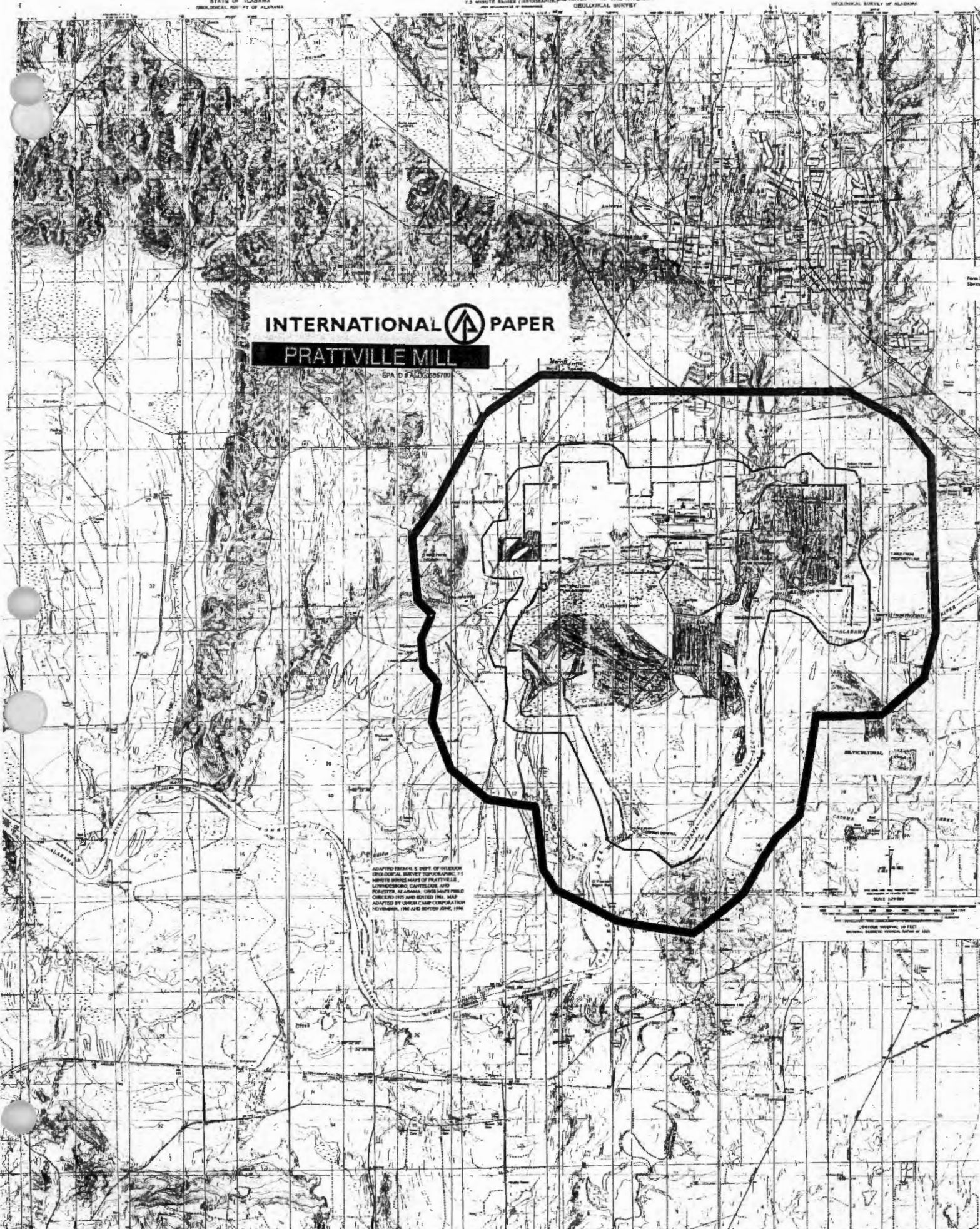
INTERNATIONAL PAPER
PRATTVILLE MILL

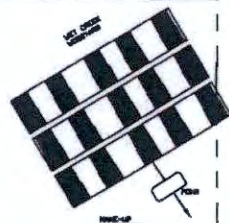
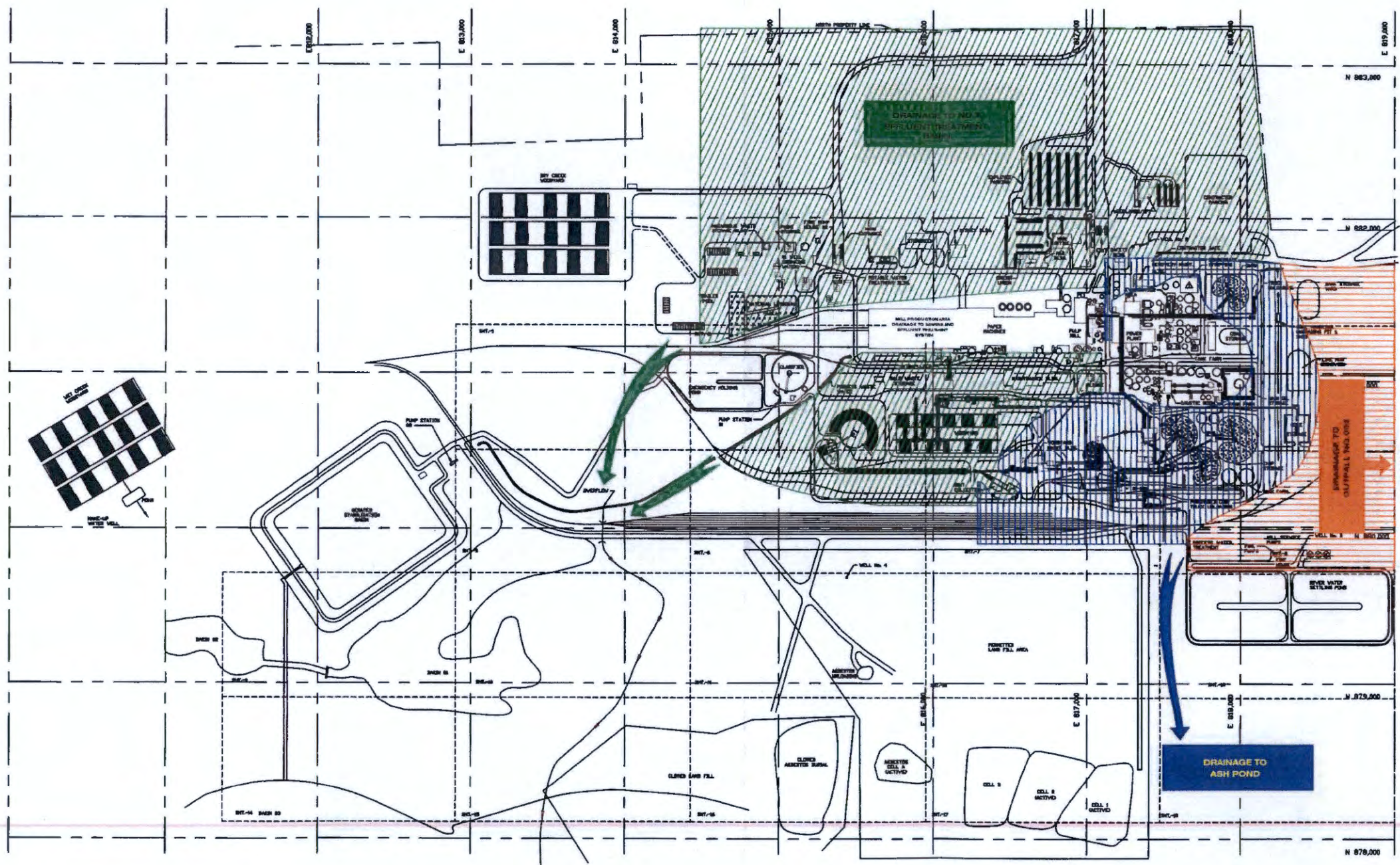
EPA ID # 2100000000

ADAPTED FROM U.S. DEPT. OF INTERIOR
GEOLOGICAL SURVEY TOPOGRAPHIC 1:250,000
SERIES MAPS OF PRATTVILLE,
LONGLENDING, CANTON, AND
FOSTER, ALABAMA. CROSS HAIR FIELD
CHECKED 1977 AND REVISED 1981. MAP
ADAPTED BY LONG-CAMP CONSULTANTS
HOUSTON, 1982 AND REVISED 1984.

SCALE 1:250,000

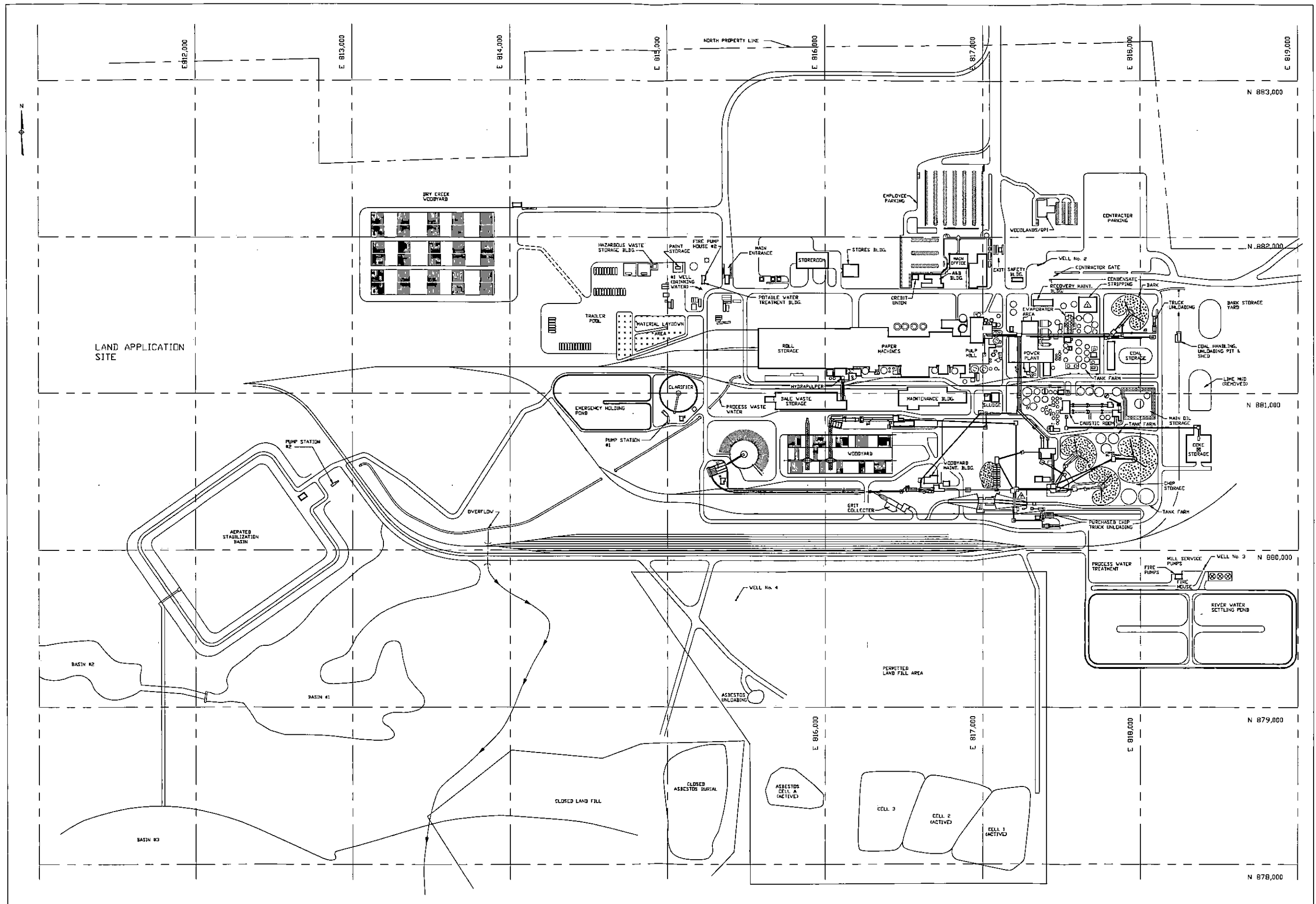
VERTICAL SCALE OF FEET
HORIZONTAL SCALE OF FEET





INTERNATIONAL PAPER				
PRATIME-III				
EPA FORM SP, ITEM III				
PRODUCTION AREA DRAINAGE MAP				
SCALE				
1"=200'				
CHARGE NO. DWG. NO.				
001-060-069-S001				

NUMBER	TITLE	DATE	SYMBOL	REVISION	BY
	REFERENCE DRAWINGS				



E01-0199	FIGURE 3-2	1/29/97	ADDED CONDENSATE STRIPPER	TLM	INTERNATIONAL PAPER PRATTVILLE MILL <small>10/13/94</small> ADEM FORM 187 SECTION E WASTE STORAGE MAP <small>ENGIN PROJECT NUMBER DRAWN ENGINEER SCALE</small> <small>TLM SD 1"=200'</small> <small>CHARGE NO. DWG. NO.</small> <small>001-068-0049-S001</small>
		2/6/98	ADDED CHIP DUMPER	TLM	
NUMBER	TITLE	DATE	SYMBOL	REVISION	BY
	REFERENCE DRAWINGS				