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Montgomery, Alabama 36130-1463
(334) 271-7700 ■ FAX (334) 271-7950

December 29, 2025

Mr. Anthony Russo
Manager of Environmental Services
Rogers Group, Inc.
421 Great Circle Rd
Nashville, TN 37228

RE: Draft Permit
West Huntsville Quarry
NPDES Permit Number AL0083089
Limestone County (083)

Dear Mr. Russo:

Transmitted herein is a draft of the above referenced permit. Please review the enclosed draft permit carefully. If previously permitted, the draft may contain additions/revisions to the language in your current permit. Please submit any comments on the draft permit to the Department within 30 days from the date of receipt of this letter.

Since the Department has made a tentative decision to reissue the above referenced permit, ADEM Admin. Code r. 335-6-6-.21 requires a public notice of the draft permit followed by a period of at least 30 days for public comment before the permit can be issued. The United States Environmental Protection Agency will also receive the draft permit for review during the 30-day public comment period.

Any mining, processing, construction, land disturbance, or other regulated activity proposed to be authorized by this draft permit is prohibited prior to the effective date of the formal permit. Any mining or processing activity within the drainage basin associated with each permitted outfall which is conducted prior to Departmental receipt of certification from a professional engineer licensed to practice in the State of Alabama, that the Pollution Abatement/Prevention Plan was implemented according to the design plan, or notification from the Alabama Surface Mining Commission that the sediment control structures have been certified, is prohibited.

This permit requires Discharge Monitoring Reports (DMR) to be submitted utilizing the Department's web-based electronic reporting system. Please read Part I.D of the permit carefully and visit <https://aepacs.adem.alabama.gov/nviro/ncore/external/home>.

Should you have any questions concerning this matter, please contact Robert Glover at (334) 271-7975 or robert.glover@adem.alabama.gov.

Sincerely,

A handwritten signature in black ink, appearing to read "W.D. McClimans".

William D. McClimans, Chief
Mining and Natural Resource Section
Stormwater Management Branch
Water Division

WDM/rlg

File: DPER/47496

cc: Robert Glover, ADEM
Environmental Protection Agency Region IV
Alabama Department of Conservation and Natural Resources
U.S. Fish and Wildlife Service
Alabama Historical Commission
Advisory Council on Historic Preservation
U.S. Army Corps of Engineers Mobile District
U.S. Army Corps of Engineers Nashville District
Alabama Department of Labor



Birmingham Office

110 Vulcan Road
Birmingham, AL 35209-4702
(205) 942-6168
(205) 941-1603 (FAX)

Decatur Office

2715 Sandlin Road, S.W.
Decatur, AL 35603-1333
(256) 353-1713
(256) 340-9359 (FAX)

Coastal Office

1615 South Broad Street
Mobile, AL 36605
(251) 450-3400
(251) 479-2593 (FAX)



NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM PERMIT

PERMITTEE: Rogers Group, Inc.
421 Great Circle Road
Nashville, TN 37228

FACILITY LOCATION: West Huntsville Quarry
26024 Newby Rd
Madison, AL 35756
Limestone County
T3S R3W, Section 33

PERMIT NUMBER: AL0083089

<u>DSN</u>	<u>RECEIVING STREAM</u>
001 - 1	Martin Branch
002 - 1	Martin Branch

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

Alabama Department of Environmental Management
Water Division Chief

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT

Limestone Quarry, Wet Preparation Plant, Transportation and Storage, and Associated Areas

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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 each point source identified on Page 1 of this Permit and described more fully in the Permittee's application, if the outfalls have been constructed and certified. Discharges shall be limited and monitored by the Permittee as specified below:

Parameter	Discharge Limitations			Monitoring Requirements	
	Daily Minimum	Monthly Average	Daily Maximum	Sample Type	Measurement Frequency ¹
pH 00400	6.0 s.u.	-----	8.5 s.u.	Grab	2/Month
Solids, Total Suspended 00530	-----	25.0 mg/L	45.0 mg/L	Grab	2/Month
Flow, In Conduit or Thru Treatment Plant ² 50050	-----	Report MGD	Report MGD	Instantaneous	2/Month

B. REQUIREMENTS TO ACTIVATE A PROPOSED MINING OUTFALL

1. Discharge from any point source identified on Page 1 of this Permit which is a proposed outfall is not authorized by this Permit until the outfall has been constructed and certification received by the Department from a professional engineer, registered in the State of Alabama, certifying that such facility has been constructed according to good engineering practices and in accordance with the Pollution Abatement and/or Prevention (PAP) Plan.
2. Certification required by Part I.B.1. shall be submitted on a completed ADEM Form 432. The certification shall include the latitude and longitude of the constructed and certified outfall.
3. Discharge monitoring and Discharge Monitoring Report (DMR) reporting requirements described in Part I.C. of this Permit do not apply to point sources that have not been constructed and certified.
4. Upon submittal of the certification required by Part I.B.1. to the Department, all monitoring and DMR submittal requirements shall apply to the constructed and certified outfall.

C. DISCHARGE MONITORING AND RECORD KEEPING REQUIREMENTS

1. Sampling Schedule and Frequency

- a. The Permittee shall collect at least one grab sample of the discharge to surface waters from each constructed and certified point source identified on Page 1 of this Permit and described more fully in the Permittee's application twice per month at a rate of at least every other week if a discharge occurs at any time during the two week period, but need not collect more than two samples per calendar month. Each sample collected shall be analyzed for each parameter specified in Part I.A. of this Permit.

¹ See Part I.C.2. for further measurement frequency requirements.

² Flow must be determined at the time of sample collection by direct measurement, calculation, or other method acceptable to the Department.

- b. If the final effluent is pumped in order to discharge (e.g. from incised ponds, old highwall cuts, old pit areas or depressions, etc.), the Permittee shall collect at least one grab sample of the discharge from each point source identified on Page 1 of this Permit and described more fully in the Permittee's application each quarterly (three month) monitoring period if a discharge occurs at any time during the quarterly monitoring period which results from direct pumped drainage. Each sample collected shall be analyzed for each parameter specified in Part I.A. of this Permit.
- c. The Permittee may increase the frequency of sampling listed in Parts I.C.1.a and I.C.1.b; however, all sampling results must be reported to the Department and included in any calculated results submitted to the Department in accordance with this Permit.

2. Measurement Frequency

Measurement frequency requirements found in Part I.A. shall mean:

- a. A measurement frequency of one day per week shall mean sample collection on any day of discharge which occurs every calendar week.
- b. A measurement frequency of two days per month shall mean sample collection on any day of discharge which occurs every other week, but need not exceed two sample days per month.
- c. A measurement frequency of one day per month shall mean sample collection on any day of discharge which occurs during each calendar month.
- d. A measurement frequency of one day per quarter shall mean sample collection on any day of discharge which occurs during each calendar quarter.
- e. A measurement frequency of one day per six months shall mean sample collection on any day of discharge which occurs during the period of January through June and during the period of July through December.
- f. A measurement frequency of one day per year shall mean sample collection on any day of discharge which occurs during each calendar year.

3. Monitoring Schedule

The Permittee shall conduct the monitoring required by Part I.A. in accordance with the following schedule:

- a. 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. More frequently than monthly and monthly monitoring may be done anytime during the month, unless restricted elsewhere in this Permit, but the results should be reported on the last Discharge Monitoring Report (DMR) due for the quarter (i.e., with the March, June, September, and December DMRs).
- b. 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 the results should be reported on the last DMR due for the quarter (i.e., with the March, June, September, and December DMRs).

- c. 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 semiannual calendar 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 reported on the last DMR due for the month of the semiannual period (i.e., with the June and December DMRs).
- d. 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 reported on the December DMR.

4. Sampling Location

Unless restricted elsewhere in this Permit, samples collected to comply with the monitoring requirements specified in Part I.A. shall be collected at the nearest accessible location just prior to discharge and after final treatment, or at an alternate location approved in writing by the Department.

5. Representative Sampling

Sample collection and measurement actions 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.

6. 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, guidelines published pursuant to Section 304(h) of the FWPCA, 33 U.S.C. Section 1314(h), and ADEM Standard Operating Procedures. 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 pollutant 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 identified in Parts I.C.6.a. and b. 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.

7. 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 or measurements;
- 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.

8. Routine Inspection by Permittee

- a. The Permittee shall inspect all point sources identified on Page 1 of this Permit and described more fully in the Permittee's application and all treatment or control facilities or systems used by the Permittee to achieve compliance with the terms and conditions of this Permit at least as often as the applicable sampling frequency specified in Part I.C.1 of this Permit.
- b. The Permittee shall maintain a written log for each point source identified on Page 1 of this Permit and described more fully in the Permittee's application in which the Permittee shall record the following information:
 - (1) The date and time the point source and any associated treatment or control facilities or systems were inspected by the Permittee;
 - (2) Whether there was a discharge from the point source at the time of inspection by the Permittee;
 - (3) Whether a sample of the discharge from the point source was collected at the time of inspection by the Permittee;

- (4) Whether all associated treatment or control facilities or systems appeared to be in good working order and operating as efficiently as possible, and if not, a description of the problems or deficiencies; and
- (5) The name and signature of the person performing the inspection of the point source and associated treatment or control facilities or systems.

9. Records Retention and Production

- a. 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 this 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 (3) years from the date of the sample collection, 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, AEMA, 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, the Permittee shall provide the Director with a copy of any record required to be retained by this paragraph. Copies of these records should not be submitted unless requested.
- b. All records required to be kept for a period of three (3) years shall be kept at the permitted facility or an alternate location approved by the Department in writing and shall be available for inspection.

10. 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.

D. DISCHARGE REPORTING REQUIREMENTS

1. Requirements for Reporting of Monitoring

- a. Monitoring results obtained during the previous three (3) months shall be summarized for each month on a Discharge Monitoring Report (DMR) Form approved by the Department, and submitted to the Department so that it is received by the Director no later than the 28th day of the month following the quarterly reporting period (i.e., on the 28th day of January, April, July, and October of each year).
- b. The Department utilizes a web-based electronic reporting system for submittal of DMRs. Except as allowed by Part I.D.1.c. or d., the Permittee shall submit all DMRs required by Part I.D.1.a. by utilizing the Department's current electronic reporting system. The Department's current reporting system, Alabama Environmental Permitting and Compliance System (AEPACS), can be found online at <https://aepacs.adem.alabama.gov/nviro/ncore/external/home>.

- c. If the electronic reporting system is down (i.e. electronic submittal of DMR data is unable to be completed due to technical problems originating with the Department's system; this could include entry/submittal issues with an entire set of DMRs or individual parameters), permittees are not relieved of their obligation to submit DMR data to the Department by the required submittal date. However, if the electronic reporting system is down on the 28th day of the month or is down for an extended period of time as determined by the Department when a DMR is required to be submitted, the facility may submit the data in an alternate manner and format acceptable to the Department. Preapproved alternate acceptable methods include faxing, e-mailing, mailing, or hand-delivery of data such that they are received by the required reporting date. Within five calendar days of the electronic reporting system resuming operation, the Permittee shall enter the data into the reporting system unless an alternate timeframe is approved by the Department. An attachment should be included with the electronic DMR submittal verifying the original submittal date (date of the fax, copy of dated e-mail, or hand-delivery stamped date).
- d. 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 Part I.D.1.i.
- e. If the Permittee, using approved analytical methods as specified in Part I.C.6., monitors any discharge from a point source identified on Page 1 of this Permit and describe more fully in the Permittee's application more frequently than required by this Permit; the results of such monitoring shall be included in the calculation and reporting of values on the DMR Form, and the increased frequency shall be indicated on the DMR Form.
- f. In the event no discharge from a point source identified on Page 1 of this Permit and described more fully in the Permittee's application occurs during a monitoring period, the Permittee shall report "No Discharge" for such period on the appropriate DMR Form.
- g. Each DMR Form submitted by the Permittee to the Department in accordance with Part I.D.1. must be legible and bear an original signature or electronic signature. Photo and electronic copies of the signature are not acceptable and shall not satisfy the reporting requirements of this Permit.
- h. All reports and forms required to be submitted by this Permit, the AWPCA, and the Department's rules and regulations, shall be signed by a "responsible official" of the Permittee as defined in ADEM Admin. Code r. 335-6-6-.09 or a "duly authorized representative" of such official as defined in ADEM Admin. Code r. 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 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. All DMRs, reports, and forms required to be submitted by this Permit, the AWPCA and the Department's rules and regulations, shall be submitted through the Department's electronic reporting system, AEPACS, or, if in hardcopy, shall be addressed to:

Alabama Department of Environmental Management
Water Division, Mining and Natural Resource Section
Post Office Box 301463
Montgomery, Alabama 36130-1463

Certified and Registered Mail shall be addressed to:

Alabama Department of Environmental Management
Water Division, Mining and Natural Resource Section
1400 Coliseum Boulevard
Montgomery, Alabama 36110-2059

j. Unless authorized in writing by the Department, approved reporting forms required by this Permit or the Department are not to be altered, and if copied or reproduced, must be consistent in format and identical in content to the ADEM approved form. Unauthorized alteration, falsification, or use of incorrectly reproduced forms constitutes noncompliance with the requirements of this Permit and may significantly delay processing of any request, result in denial of the request, result in permit termination, revocation, suspension, modification, or denial of a permit renewal application, or result in other enforcement action.

k. If this Permit is a reissuance, then the Permittee shall continue to submit DMRs in accordance with the requirements of their previous permit until such time as DMRs are due as discussed in Part I.D.1.

2. Noncompliance Notification

a. The Permittee must notify the Department if, for any reason, the Permittee's discharge:

- (1) Potentially threatens human health or welfare;
- (2) Potentially threatens fish or aquatic life;
- (3) Causes an in-stream water quality criterion to be exceeded;
- (4) Does not comply with an applicable toxic pollutant effluent standard or prohibition established under Section 307(a) of the FWPCA, 33 U.S.C. §1317(a);
- (5) Contains a quantity of a hazardous substance which has been determined may be harmful to the public health or welfare under Section 311(b)(4) of the FWPCA, 33 U.S.C. §1321(b)(4); or
- (6) Exceeds any discharge limitation for an effluent parameter as a result of an unanticipated bypass or upset.

The Permittee shall orally or electronically report any of the above occurrences, describing the circumstances and potential effects 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 or electronic report, the Permittee shall submit to the Director a written report as

provided in Part I.D.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 a written report to the Director as provided in Part I.D.2.c. This report must be submitted with the next Discharge Monitoring Report required to be submitted by Part I.D.1. of this Permit after becoming aware of the occurrence of such noncompliance.
- c. An electronic Noncompliance Notification Form in a Department-approved format must be submitted to the Director in accordance with Parts I.D.2.a. and b. The completed form must document 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.

3. Reduction, Suspension, or Termination of Monitoring and/or Reporting

- a. The Director may, with respect to any point source identified on Page 1 of this Permit and described more fully in the Permittee's application, authorize the Permittee to reduce, suspend, or terminate the monitoring and/or reporting required by this Permit upon the submission of a written request for such reduction, suspension, or termination by the Permittee provided:
 - (1) All mining, processing, or disturbance in the drainage basin(s) associated with the discharge has ceased and site access is adequately restricted or controlled to preclude unpermitted and unauthorized mining, processing, transportation, or associated operations/activity;
 - (2) Permanent, perennial vegetation has been re-established on all areas mined or disturbed for at least one year since mining has ceased in the drainage basin(s) associated with the surface discharge, or all areas have been permanently graded such that all drainage is directed back into the mined pit to preclude all surface discharges;
 - (3) Unless waived in writing by the Department, the Permittee has been granted, in writing, a 100% Bond Release, if applicable, by the Alabama Department of Industrial Relations and, if applicable, by the Surface Mining Commission for all areas mined or disturbed in the drainage basin(s) associated with the discharge;
 - (4) Unless waived in writing by the Department, the Permittee has submitted inspection reports prepared and certified by a Professional Engineer (PE) registered in the State of Alabama or a qualified professional under the PE's direction which certify that the facility has been fully reclaimed or that water quality remediation has been achieved. The first inspection must be conducted approximately one year prior to and the second inspection must be conducted within thirty days of the Permittee's request for termination of monitoring and reporting requirements;

- (5) All surface effects of the mining activity such as fuel or chemical tanks, preparation plants or equipment, old tools or equipment, junk or debris, etc., must be removed and disposed of according to applicable state and federal regulations;
- (6) The Permittee's request for termination of monitoring and reporting requirements contained in this Permit has been supported by monitoring data covering a period of at least six consecutive months or such longer period as is necessary to assure that the data reflect discharges occurring during varying seasonal climatological conditions;
- (7) The Permittee has stated in its request that the samples collected and reported in the monitoring data submitted in support of the Permittee's request for monitoring termination or suspension are representative of the discharge and were collected in accordance with all Permit terms and conditions respecting sampling times (e.g., rainfall events) and methods and were analyzed in accordance with all Permit terms and conditions respecting analytical methods and procedures;
- (8) The Permittee has certified that during the entire period covered by the monitoring data submitted, no chemical treatment of the discharge was provided;
- (9) The Permittee's request has included the certification required by Part I.D.1.e. of this Permit; and
- (10) The Permittee has certified to the Director in writing as part of the request, its compliance with (1) through (9) above.

b. It remains the responsibility of the Permittee to comply with the monitoring and reporting requirements of this Permit until written authorization to reduce, suspend, or terminate such monitoring and/or reporting is received by the Permittee from the Director.

E. 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 on Page 1 of this Permit and described more fully in the Permittee's application have permanently ceased.

3. Updating Information

a. The Permittee shall inform the Director of any change in the Permittee's mailing address or telephone number or in the Permittee's designation of a facility contact or officer(s) having the authority and responsibility to prevent and abate violations of the AWPCA, the AEMA, the Department's rules and regulations, and the terms and conditions of this Permit, in writing, no later than ten (10) days after such change. Upon request of the Director, 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

- a. The Permittee shall furnish to the Director, within a reasonable time, any information which the Director may request to determine whether cause exists for modifying, suspending, terminating, or revoking and reissuing this Permit, in whole or in part, or to determine compliance with this Permit. The Permittee shall also furnish to the Director upon request, copies of records required to be maintained by this Permit.
- b. The Permittee shall furnish to the Director upon request, within a reasonable time, available information (name, phone number, address, and site location) which identifies offsite sources of material or natural resources (mineral, ore, or other material such as iron, coal, coke, dirt, chert, shale, clay, sand, gravel, bauxite, rock, stone, etc.) used in its operation or stored at the facility.

F. SCHEDULE OF COMPLIANCE

The Permittee shall achieve compliance with the discharge limitations specified in Part I.A. of this Permit in accordance with the following schedule:

Compliance must be achieved by the effective date of this Permit.

PART II OTHER REQUIREMENTS, RESPONSIBILITIES, AND DUTIES

A. OPERATIONAL AND MANAGEMENT REQUIREMENTS

1. Facilities Operation and Management

The Permittee shall at all times 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 this 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 this Permit.

2. Pollution Abatement and/or Prevention Plan

a. The Pollution Abatement and/or Prevention (PAP) Plan shall be prepared and certified by a registered Professional Engineer (PE), licensed to practice in the State of Alabama, and shall include at a minimum:

- (1) The information indicated in ADEM Admin Code r. 335-6-9-.03 and ADEM Admin. Code ch. 335-6-9 and its Appendices A and B;
- (2) A description of methods which will be implemented to prevent offsite vehicle tracking onto roadways and/or into ditches at the entrances and/or exits of the Permittee's operations;
- (3) A description of setbacks from waters of the State in units of linear feet on the horizontal plane; a description of the methods taken to visibly delineate setbacks from waters of the State; and a description of any other actions taken to prevent encroachment upon setbacks;
- (4) A description of the methods used to delineate the boundaries of coverage under this Permit such that the boundaries are readily visible during the life of the operation;
- (5) A description of any other Best Management Practices (BMPs) which will be implemented to provide control of all nonpoint source pollution that is or may be associated with the Permittee's operations;

b. The PAP Plan shall become a part of this Permit and all requirements of the PAP Plan shall become requirements of this Permit pursuant to ADEM Admin Code r. 335-6-9-.05(2). The PAP Plan shall be amended if the Department determines that the existing sediment control measures, erosion control measures, or other site management practices are ineffective or do not meet the requirements of this Permit.

c. For existing sources, the PAP Plan shall be updated to include all requirements of this section within 180 days of the effective date of this permit. New sources shall submit the PAP plan with the NPDES Individual Permit application prior to coverage under this Permit.

3. Best Management Practices (BMPs)

- a. Unless otherwise authorized in writing by the Director, the Permittee shall provide a means of subsurface withdrawal for any discharge from each point source identified on Page 1 of this Permit and described more fully in the Permittee's application. Notwithstanding the above provision, a means of subsurface withdrawal need not be provided for any discharge caused by a 24-hour precipitation event greater than a 10-year, 24-hour precipitation event.
- b. Dilution water shall not be added to achieve compliance with discharge limitations except when the Director has granted prior written authorization for dilution to meet water quality requirements.
- c. The Permittee shall minimize the contact of water with overburden, including but not limited to stabilizing disturbed areas through grading, diverting runoff, achieving quick growing stands of temporary vegetation, sealing acid-forming and toxic-forming materials, and maximizing placement of waste materials in back-fill areas.
- d. The Permittee shall prepare, submit to the Department for approval, and implement a Best Management Practices (BMPs) Plan for containment of any or all process liquids or solids, in a manner such that these materials do not present a potential for discharge, if so required by the Director. 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.
- e. Spill Prevention, Control, and Management

The Permittee shall prepare, implement, and maintain a Spill Prevention, Control and Countermeasures (SPCC) Plan acceptable to the Department that is prepared and certified by a Professional Engineer (PE), registered in the State of Alabama, for all onsite petroleum product or other pollutant storage tanks or containers as provided by ADEM Admin. Code r. 335-6-6-08(j)5. The Plan shall describe and the Permittee shall implement appropriate structural and/or non-structural spill prevention, control, and/or management pursuant to ADEM Admin. Code r. 335-6-6-12 (r) sufficient to prevent any spills of pollutants from entering a ground or surface water of the State or a publicly or privately owned treatment works. The Plan shall include at a minimum, the engineering requirements provided in 40 C.F.R. §§112.1. 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. Such containment systems shall be capable of retaining a volume equal to 110 percent of the capacity of the largest tank for which containment is provided. The Plan shall list any materials which the Permittee may utilize to contain and to absorb fuel and chemical spills and leaks. The Permittee shall maintain sufficient amounts of such materials onsite or have sufficient amounts of such materials readily available to contain and/or absorb fuel and chemical spills and leaks. Soil contaminated by chemical spills, oil spills, etc., must be immediately cleaned up or be removed and disposed of in a manner consistent with all State and federal regulations.

- f. All surface drainage and storm water runoff which originate within or enters the Permittee's premises and which contains any pollutants or other wastes shall be discharged, if at all, from a point source identified on Page 1 of this Permit and described more fully in the Permittee's application.
- g. The Permittee shall take all reasonable precautions to prevent any surface drainage or storm water runoff which originates outside the Permittee's premises and which contains any pollutants or other wastes from entering the Permittee's premises. At no time shall the Permittee discharge any such surface drainage or storm water runoff which enters the Permittee's premises if, either alone or in combination with the Permittee's effluent, the discharge would exceed any applicable discharge limitation specified in Part I.A. of this Permit.

4. Biocide Additives

- a. The Permittee shall notify the Director in writing not later than sixty (60) days prior to instituting the use of any biocide corrosion inhibitor or chemical additive in any cooling or boiler system(s) regulated by this Permit. Notification is not 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:
 - (a) Name and general composition of biocide or chemical;
 - (b) 96-hour median tolerance limit data for organisms representative of the biota of the water(s) which the discharge(s) enter(s);
 - (c) Quantities to be used;
 - (d) Frequencies of use;
 - (e) Proposed discharge concentrations; and
 - (f) EPA registration number, if applicable.
- b. The use of any biocide or chemical additive containing tributyl tin, tributyl tin oxide, zinc, chromium, or related compounds in any cooling or boiler system(s) regulated by the Permit 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.

5. Facility Identification

The Permittee shall clearly display prior to commencement of any regulated activity and until permit coverage is properly terminated, the name of the Permittee, entire NPDES permit number, facility or site name, and other descriptive information deemed appropriate by the Permittee at an easily accessible location(s) to adequately identify the site, unless approved otherwise in writing by the Department. The Permittee shall repair or replace the sign(s) as necessary upon becoming aware that the identification is missing or is unreadable due to age, vandalism, theft, weather, or other reason.

6. Removed Substances

Solids, sludges, filter backwash, or any other pollutants or other wastes removed in the course of treatment or control of wastewaters shall be disposed of in a manner that complies with all applicable Department rules and regulations.

7. Loss or Failure of Treatment Facilities

Upon the loss or failure of any treatment facility, 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 Part I.A. of this Permit or any other terms or conditions of this Permit, cease, reduce, or otherwise control production and/or discharges until treatment is restored.

8. Duty to Mitigate

The Permittee shall promptly take all reasonable steps to minimize or prevent any violation of this Permit or to mitigate and minimize any adverse impact to waters resulting from noncompliance with any discharge limitation specified in Part I.A. of this Permit, including such accelerated or additional monitoring of the discharge and/or the receiving waterbody as is necessary to determine the nature and impact of the noncomplying discharge.

B. BYPASS AND UPSET

1. Bypass

- a. Any bypass is prohibited except as provided in Parts II.B.1.b. and c.
- b. A bypass is not prohibited if:
 - (1) It does not cause any applicable discharge limitation specified in Part I.A. of this Permit to be exceeded;
 - (2) The discharge resulting from such bypass enters the same receiving water as the discharge from the permitted outfall;
 - (3) It is necessary for essential maintenance of a treatment or control facility or system to assure efficient operation of such facility or system; and
 - (4) The Permittee monitors the discharge resulting from such bypass at a frequency, at least daily, sufficient to prove compliance with the discharge limitations specified in Part I.A. of this Permit.
- c. A bypass is not prohibited and need not meet the discharge limitations specified in Part 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 the Permittee could have installed adequate backup equipment 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, if possible, prior to the anticipated bypass or within 24 hours of an unanticipated bypass, the Permittee is granted such authorization, and Permittee complies with any conditions imposed by the Director to minimize any adverse impact to waters resulting from the bypass.

d. The Permittee has the burden of establishing that each of the conditions of Parts II.B.1.b. or c. have been met to qualify for an exception to the general prohibition against bypassing contained in Part II.B.1.a. and an exemption, where applicable, from the discharge limitations specified in Part I.A. of this Permit.

2. Upset

a. The Permittee may seek to demonstrate that noncompliance with technology-based effluent limits occurred as a result of an upset if the conditions of Part II.B.2.b are met and if the Permittee complies with the conditions provided in Part II.B.2.c.

b. If the Permittee wishes to establish the affirmative defense of an upset for technology-based effluent limit noncompliance, the Permittee must demonstrate through properly signed, contemporaneous operating logs, or other relevant evidence that:

- (1) An upset occurred and that the Permittee can identify the specific cause(s) of the upset;
- (2) The wastewater treatment facility was at the time being properly operated in accordance with Part II.B.d.
- (3) The Permittee submitted notice of the noncompliance during the upset as required by Part II.B.2.c; and
- (4) The Permittee complied with any remedial measures required under Part II.A.7. of this Permit.

c. If the Permittee wishes to establish the affirmative defense of an upset for technology-based effluent limit noncompliance, the Permittee shall:

- (1) No later than 24-hours after becoming aware of the occurrence of the upset, orally report the occurrence and circumstances of the upset to the Director in accordance with Part I.G.2.; and
- (2) No later than five (5) days after becoming aware of the occurrence of the upset, furnish the Director with evidence, including properly signed, contemporaneous operating logs, design drawings, construction certification, maintenance records, weir flow measurements, dated photographs, rain gauge measurements, 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 treatment 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 to waters resulting from the upset.

d. A discharge which is an overflow from a treatment facility or system, or an excess discharge from a point source associated with a treatment facility or system and which results from a 24-hour precipitation event larger than a 10-year, 24-hour precipitation event is not eligible to be considered as a result of an upset unless:

- (1) The treatment facility or system is designed, constructed, and maintained to contain the maximum volume of wastewater which would be generated by the facility during a 24-hour period without an increase in volume from precipitation and the maximum volume of wastewater resulting from a 10-year, 24-hour precipitation event or to treat the maximum flow associated with these volumes. In computing the maximum volume of wastewater which would result from a 10-year, 24-hour precipitation event, the volume which would result from all areas contributing runoff to the individual treatment facility must be included (i.e., all runoff that is not diverted from the mining area and runoff which is not diverted from the preparation plant area); and
- (2) The Permittee takes all reasonable steps to maintain treatment of the wastewater and minimize the amount of overflow or excess discharge.

e. The Permittee has the burden of proof in defense of any enforcement action as a result of noncompliance of technology-based effluent limits the Permittee proposes to attribute to an upset.

C. PERMIT CONDITIONS AND RESTRICTIONS

1. Prohibition against Discharge from Facilities Not Certified

- a. Notwithstanding any other provisions of this Permit, if the permitted facility has not obtained or is not required to obtain a permit from the Alabama Surface Mining Commission, any discharge(s) from any point or nonpoint source(s) from the permitted facility which was not certified to the Department on a form approved by the Department by a professional engineer, registered in the State of Alabama, as being designed, constructed, and in accordance with plans and specifications reviewed by the Department is prohibited; or
- b. Notwithstanding any other provisions of this Permit, if the permitted facility has obtained or is required to obtain a permit from the Alabama Surface Mining Commission, any discharge(s) from any point or nonpoint source(s) from the permitted facility which is associated with a treatment facility which was not constructed and certified to the Alabama Surface Mining Commission pursuant to applicable provisions of said Commission's regulations, is prohibited until the Permittee submits to the Alabama Surface Mining Commission, certification by a professional engineer, registered in the State of Alabama, certifying that such facility has been constructed in accordance with plans and specifications approved by the Alabama Surface Mining Commission. This requirement shall not apply to pumped discharges from the underground works of underground coal mines where no surface structure is required by the Alabama Surface Mining Commission, provided the Department is notified in writing of the completion or installation of such facilities, and the pumped discharges will meet permit effluent limits without treatment.

2. Permit Modification, Suspension, Termination, and Revocation

- a. This Permit may be modified, suspended, terminated, or revoked and reissued, in whole or in part, during its term for cause, including but not limited to, the following:
 - (1) The violation of any term or condition of this Permit;

- (2) The obtaining of this Permit by misrepresentation or the failure to disclose fully all relevant facts;
- (3) The submission of materially false or inaccurate statements or information in the permit application or reports required by the Permit;
- (4) The need for a change in any condition that requires either a temporary or permanent reduction or elimination of the permitted discharge;
- (5) The existence of any typographical or clerical errors or of any errors in the calculation of discharge limitations;
- (6) The existence of 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;
- (7) The threat of the Permittee's discharge on human health or welfare; or
- (8) Any other cause allowed by ADEM Admin. Code ch. 335-6-6.

b. The filing of a request by the Permittee for modification, suspension, termination, or revocation and reissuance of this Permit, in whole or in part, does not stay any Permit term or condition of this Permit.

3. Requirements for Metals, Cyanide, and Phenols Monitoring and Reporting

- a. For all outfalls, the Permittee shall collect a sample of the discharge to be analyzed for antimony, arsenic, beryllium, cadmium, chromium, copper, lead, mercury, nickel, selenium, silver, thallium, zinc, cyanide, and phenols no later than six months following the effective date of the Permit. The analyses shall be submitted on EPA Form 2C and received by the Department no later than 28 days following six months after the effective date of the Permit.
- b. For all outfalls, should a discharge not occur within the first six months following the effective date of this Permit, the Permittee shall collect a sample of the discharge to be analyzed for antimony, arsenic, beryllium, cadmium, chromium, copper, lead, mercury, nickel, selenium, silver, thallium, zinc, cyanide, and phenols no later than six months following the date of the first discharge. The analyses shall be submitted on EPA Form 2C and received by the Department no later than 28 days following six months after the first discharge.
- c. Parts II.C.3.a. and b. do not apply for any outfall that is represented by analyses conducted at a substantially similar outfall as indicated on EPA Form 2C or 2D.
- d. The Permit shall be reopened, if required, to address any new information resulting from the completion and submittal of the data referenced in Parts II.C.3.a. and b.

4. Automatic Expiration of Permits for New or Increased Discharges

- a. Except as provided by ADEM Admin. Code r. 335-6-6-02(h) and 335-6-6-05, if this Permit was issued for a new discharger or new source, it shall expire eighteen months after the issuance date if construction has not begun during that eighteen month period.

- b. Except as provided by ADEM Admin. Code r. 335-6-6-02(h) and 335-6-6-05, if any portion of this Permit was issued or modified to authorize the discharge of increased quantities of pollutants to accommodate the modification of an existing facility, that portion of this Permit shall expire eighteen months after this Permit's issuance if construction of the modification has not begun within eighteen month period.
- c. Construction has begun when the owner or operator has:
 - (1) Begun, or caused to begin as part of a continuous on-site construction program:
 - (i) Any placement, assembly, or installation of facilities or equipment; or
 - (ii) 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
 - (2) 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.
- d. The automatic expiration of this Permit for new or increased discharges if construction has not begun within the eighteen month period after the issuance of this Permit may be tolled by administrative or judicial stay.

5. 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 this 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.

6. Groundwater

Unless authorized on page 1 of this Permit, this Permit does not authorize any discharge 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.

7. 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. RESPONSIBILITIES

1. Duty to Comply

- a. The Permittee must comply with all terms and conditions of this Permit. Any permit noncompliance constitutes a violation of the AWPCA, AEMA, 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 Permittee shall comply with effluent standards or prohibitions established under Section 307(a) of the FWPCA for toxic pollutants within the time provided in the regulations that establish these standards or prohibitions, even if this Permit has not yet been modified to incorporate the effluent standard, prohibition or requirement.
- c. For any violation(s) of this Permit, the Permittee is subject to a civil penalty as authorized by the AWPCA, the AEMA, the FWPCA, and Code of Alabama 1975, §§22-22A-1 et. seq., as amended, and/or a criminal penalty as authorized by Code of Alabama 1975, §22-22-1 et. seq., as amended.
- d. The necessity to halt or reduce production or other activities in order to maintain compliance with the conditions of this Permit shall not be a defense for a Permittee in an enforcement action.
- e. Nothing in this Permit shall be construed to preclude or 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.
- f. 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.
- g. 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.

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, increase the quantity of a discharged pollutant, or that could result in an additional discharge point. This requirement also applies to pollutants 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 knows or has reason to believe that it has begun or expects to begin to discharge any pollutant listed as a toxic pollutant pursuant to Section 307(a) of the FWPCA, 33 U.S.C. §1317(a), any substance designated as a hazardous substance pursuant to Section 311(b)(2) of the FWPCA, 33 U.S.C. §1321(b)(2), any waste listed as a hazardous waste pursuant to Code of Alabama 1975, §22-30-10, or any other pollutants or other wastes which is not subject to any discharge limitations

specified in Part I.A. of this Permit and was not reported in the Permittee's application, was reported in the Permittee's application in concentrations or mass rates lower than that which the Permittee expects to begin to be discharged, or has reason to believe has begun to be discharged.

3. Compliance with Toxic or Other Pollutant Effluent 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 Sections 301(b)(2)(C),(D),(E) and (F) of the FWPCA, 33 U.S.C. §1311(b)(2)(C),(D),(E), and (F); 304(b)(2) of the FWPCA, 33 U.S.C. §1314(b)(2); or 307(a) of the FWPCA, 33 U.S.C. §1317(a), for a toxic or other pollutant discharged by the Permittee, and such standard or prohibition is more stringent than any discharge limitation on the pollutant specified in Part I.A. of this Permit or controls a pollutant not limited in Part I.A. of this Permit, this Permit shall be modified to conform to the toxic or other 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 or other pollutant effluent standard or prohibition before the effective date of such standard or prohibition, the authorization to discharge in this Permit shall be void to the extent that any discharge limitation on such pollutant in Part I.A. of this Permit exceeds or is inconsistent with the established toxic or other pollutant effluent standard or prohibition.

4. Compliance with Water Quality Standards and Other Provisions

- a. 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 will assure compliance with applicable water quality standards. However, this Permit does not relieve the Permittee from compliance with applicable State water quality standards established in ADEM Admin. Code ch. 335-6-10, and does not preclude the Department from taking action as appropriate to address the potential for contravention of applicable State water quality standards which could result from discharges of pollutants from the permitted facility.
- b. Compliance with Permit terms and conditions notwithstanding, if the Permittee's discharge(s) from point source(s) identified on Page 1 of this Permit cause(s) or contribute(s) to a condition in contravention of State water quality standards, the Department may require abatement action to be taken by the Permittee, modify the Permit pursuant to the Department's rules and regulations, or both.
- c. If the Department determines, on the basis of a notice provided pursuant to Part II.C.2. of 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 noticed act until the Permit has been modified.

5. Compliance with Statutes and Rules

- a. This Permit has been issued under ADEM Admin. Code div. 335-6. All provisions of this division, that are applicable to this Permit, are hereby made a part of this Permit. A copy of this division may be obtained for a small charge from the Office of General Counsel, Alabama Department of Environmental Management, 1400 Coliseum Blvd., Montgomery, AL 36110-2059.

- 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.

6. Right of Entry and Inspection

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

- a. Enter upon the Permittee's premises where a regulated facility or activity 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 this Permit;
- c. Inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this Permit; and
- d. Sample or monitor at reasonable times, for the purposes of assuring Permit compliance or as otherwise authorized by the AWPCA, any substances or parameters at any location.

7. 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 with the Department a complete permit application for reissuance of this Permit at least 180 days prior to its expiration. Applications must be submitted electronically via the Department's current electronic permitting system. The Department's current online permitting system, Alabama Environmental Permitting and Compliance System (AEPACS), can be found online at <https://aepacs.adem.alabama.gov/nviro/ncore/external/home>.
- b. If the Permittee does not desire to continue the discharge(s) allowed by this Permit, the Permittee shall notify the Department at least 180 days prior to expiration of this Permit of the Permittee's intention not to request reissuance of this Permit. This notification must include the information required in Part I.D.4.a. and be signed by an individual meeting the signatory requirements for a permit application as set forth in ADEM Admin. Code r. 335-6-6-09.
- c. Failure of the Permittee to submit to the Department a complete application for reissuance of this Permit at least 180 days prior to the expiration date of this Permit will void the automatic continuation of this Permit provided by ADEM Admin. Code r. 335-6-6-06; and should this Permit not be reissued for any reason, any discharge after the expiration of this Permit will be an unpermitted discharge.

PART III ADDITIONAL REQUIREMENTS, CONDITIONS, AND LIMITATIONS

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 this Permit shall, upon conviction, be subject to penalties and/or imprisonment as provided by the AWPCA and/or the AEMA.

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 punished as provided by applicable State and Federal law.

3. Permit Enforcement

This NPDES Permit is a Permit for the purpose of the AWPCA, the AEMA, and the FWPCA, and as such all terms, conditions, or limitations of this Permit are enforceable under State and Federal law.

4. Relief From Liability

Except as provided in Part II.B.1. (Bypass) and Part II.B.2. (Upset), nothing in this Permit shall be construed to relieve the Permittee of civil or criminal liability under the AWPCA, AEMA, 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 to under Section 311 of the FWPCA, 33 U.S.C. §1321.

C. AVAILABILITY OF REPORTS

Except for data determined to be confidential under Code of Alabama 1975, §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. Knowingly making any false statement in any such report may result in the imposition of criminal penalties as provided for in Section 309 of the FWPCA, 33 U.S.C. §1319, and Code of Alabama 1975, §22-22-14.

D. DEFINITIONS

1. Alabama Environmental Management Act (AEMA) - means Code of Alabama 1975, §§22-22A-1 et. seq., as amended.
2. Alabama Water Pollution Control Act (AWPCA) - means Code of Alabama 1975, §§22-22-1 et. seq., as amended.
3. 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).

4. Arithmetic Mean - means the summation of the individual values of any set of values divided by the number of individual values.
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. Controlled Surface Mine Drainage – means any surface mine drainage that is pumped or siphoned from the active mining area.
9. 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.
10. Daily maximum - means the highest value of any individual sample result obtained during a day.
11. Daily minimum - means the lowest value of any individual sample result obtained during a day.
12. Day - means any consecutive 24-hour period.
13. Department - means the Alabama Department of Environmental Management.
14. Director - means the Director of the Department or his authorized representative or designee.
15. Discharge - means "[t]he addition, introduction, leaking, spilling or emitting of any sewage, industrial waste, pollutant or other waste into waters of the state." Code of Alabama 1975, §22-22-1(b)(8).
16. Discharge monitoring report (DMR) - means the form approved by the Director to accomplish monitoring report requirements of an NPDES Permit.
17. DO - means dissolved oxygen.
18. E. coli – means the pollutant parameter Escherichia coli.
19. 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.
20. EPA - means the United States Environmental Protection Agency.

21. Federal Water Pollution Control Act (FWPCA) - means 33 U.S.C. §§1251 *et. seq.*, as amended.
22. Flow – means the total volume of discharge in a 24-hour period.
23. 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).
24. 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.
25. 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.
26. 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.
27. mg/L - means milligrams per liter of discharge.
28. MGD - means million gallons per day.
29. Monthly Average - means, other than for E. coli bacteria, the arithmetic mean of all the composite or grab samples taken for the daily discharges collected in one month period. The monthly average for E. coli 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. (Zero discharges shall not be included in the calculation of monthly averages.)
30. 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. From which the discharge of pollutants did not commence 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.
31. New Source - means:
 - a. A new source as defined for coal mines by 40 CFR Part 434.11 (1994); and
 - b. Any building, structure, facility, or installation from which there is or may be a discharge of pollutants, the construction of which commenced:
 - (1) After promulgation of standards of performance under Section 306 of FWPCA which are applicable to such source; or
 - (2) After proposal of standards of performance in accordance with Section 306 of the FWPCA which are applicable to such source, but only if the standards are promulgated in accordance with Section 206 within 120 days of their proposal.
32. NH₃-N - means the pollutant parameter ammonia, measured as nitrogen.

33. 1-year, 24-hour precipitation event - means the maximum 24-hour precipitation event with a probable recurrence interval of once in one year as defined by the National Weather Service and Technical Paper No. 40, "Rainfall Frequency Atlas of the U.S.," May 1961, or equivalent regional or rainfall probability information developed therefrom.
34. Permit application - means forms and additional information that are required by ADEM Admin. Code r. 335-6-6-.08 and applicable permit fees.
35. 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. §1362(14).
36. Pollutant - includes for purposes of this Permit, but is not limited to, those pollutants specified in Code of Alabama 1975, §22-22-1(b)(3) and those effluent characteristics, excluding flow, specified in Part I.A. of this Permit.
37. Pollutant of Concern - means those pollutants for which a water body is listed as impaired or which contribute to the listed impairment.
38. Pollution Abatement and/or Prevention Plan (PAP Plan) – mining operations plan developed to minimize impacts on water quality to avoid a contravention of the applicable water quality standards as defined in ADEM Admin. Code r. 335-6-9-.03
39. Preparation, Dry - means a dry preparation facility within which the mineral/material is cleaned, separated, or otherwise processed without use of water or chemical additives before it is shipped to the customer or otherwise utilized. A dry preparation plant includes all ancillary operations and structures necessary to clean, separate, or otherwise process the mineral/material, such as storage areas and loading facilities. Dry preparation also includes minor water spray(s) used solely for dust suppression on equipment and roads to minimize dust emissions.
40. Preparation, Wet - means a wet preparation facility within which the mineral/material is cleaned, separated, or otherwise processed using water or chemical additives before it is shipped to the customer or otherwise utilized. A wet preparation plant includes all ancillary operations and structures necessary to clean, separate, or otherwise process the mineral/material, such as storage areas and loading facilities. Wet preparation also includes mineral extraction/processing by dredging, slurry pumping, etc.
41. 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".
42. Publicly Owned Treatment Works (POTW) - 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.
43. Receiving Stream - means the "waters" receiving a "discharge" from a "point source".
44. 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.
45. 10-year, 24-hour precipitation event - means that amount of precipitation which occurs during the maximum 24-hour precipitation event with a probable recurrence interval of once in ten years as

defined by the National Weather Service and Technical Paper No. 40, "Rainfall Frequency Atlas of the U.S.," May 1961, or equivalent regional or rainfall probability information developed therefrom.

- 46. TKN - means the pollutant parameter Total Kjeldahl Nitrogen.
- 47. TON - means the pollutant parameter Total Organic Nitrogen.
- 48. TRC - means Total Residual Chlorine.
- 49. TSS – means the pollutant parameter Total Suspended Solids
- 50. Treatment facility and treatment system - means all structures which contain, convey, and as necessary, chemically or physically treat mine and/or associated preparation plant drainage, which remove pollutants limited by this Permit from such drainage or wastewater. This includes all pipes, channels, ponds, tanks, and all other equipment serving such structures.
- 51. 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.
- 52. 24-hour precipitation event - means that amount of precipitation which occurs within any 24-hour period.
- 53. 2-year, 24-hour precipitation event - means the maximum 24-hour precipitation event with a probable recurrence interval of once in two years as defined by the National Weather Service and Technical Paper No. 40, "Rainfall Frequency Atlas of the U.S.," May 1961, or equivalent regional or rainfall probability information developed therefrom.
- 54. 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 control of the Permittee. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate facilities, lack of preventive maintenance, or careless or improper operation.
- 55. 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, §22-22-1(b)(2). "Waters" include all "navigable waters" as defined in §502(7) of the FWPCA, 33 U.S.C. §1362(7), which are within the State of Alabama.
- 56. Week - means the period beginning at twelve midnight Saturday and ending at twelve midnight the following Saturday.
- 57. 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.

E. 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.

F. PROHIBITIONS AND ACTIVIES NOT AUTHORIZED

1. Discharges from disposal or landfill activities as described in ADEM Admin. Code div. 335-13 are not authorized by this Permit unless specifically approved by the Department.
2. Relocation, diversion, or other alteration of a water of the State is not authorized by this Permit unless specifically approved by the Department.
3. Lime or cement manufacturing or production and discharge of process waters from such manufacturing or production is not authorized by this Permit unless specifically approved by the Department.
4. Concrete or asphalt manufacturing or production and discharge of process waters from such manufacturing or production is not authorized by this Permit unless specifically approved by the Department.
5. 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.

G. DISCHARGES TO IMPAIRED WATERS

1. This Permit does not authorize new sources or new discharges of pollutants of concern to impaired waters unless consistent with an EPA-approved or EPA-established Total Maximum Daily Load (TMDL) and applicable State law, or unless compliance with the limitations and requirements of the Permit ensure that the discharge will not contribute to further degradation of the receiving stream. Impaired waters are those that do not meet applicable water quality standards and are identified on the State of Alabama's §303(d) list or on an EPA-approved or EPA-established TMDL. Pollutants of concern are those pollutants for which the receiving water is listed as impaired or contribute to the listed impairment.
2. Facilities that discharge into a receiving stream which is listed on the State of Alabama's §303(d) list of impaired waters, and with discharges that contain the pollutant(s) for which the waters are impaired, must within six (6) months of the Final §303(d) list approval, document in its BMP plan how the BMPs will control the discharge of the pollutant(s) of concern, and must ensure that there will be no increase of the pollutants of concern. A monitoring plan to assess the effectiveness of the BMPs in achieving the allocations must also be included in the BMP plan.
3. If the facility discharges to impaired waters as described above, it must determine whether a TMDL has been developed and approved or established by EPA for the listed waters. If a TMDL is approved or established during this Permit cycle by EPA for any waters into which the facility discharges, the facility must review the applicable TMDL to see if it includes requirements for control of any water discharged by the Permittee. Within six (6) months of the date of TMDL approval or establishment, the facility must notify the Department on how it will modify its BMP plan to include best management practices specifically targeted to achieve the allocations prescribed

by the TMDL, if necessary. Any revised BMP plans must be submitted to the Department for review. The facility must include in the BMP plan a monitoring component to assess the effectiveness of the BMPs in achieving the allocations.

ALABAMA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
WATER DIVISION

NPDES INDIVIDUAL PERMIT RATIONALE

Company Name: Rogers Group, Inc.

Facility Name: West Huntsville Quarry

County: Limestone

Permit Number: AL0083089

Prepared by: Robert Glover

Date: December 18, 2025

Receiving Waters: Martin Branch

Permit Coverage: Limestone Quarry, Wet Preparation Plant, Transportation and Storage, and Associated Areas

SIC Code: 1422

The Department has made a tentative determination that the available information is adequate to support the reissuance with modification of this permit. The modification includes changes to the permit boundary to more accurately reflect site conditions. No new outfalls or relocation of current outfalls is being proposed at this time.

This proposed permit covers wet preparation limestone quarry, transportation and storage, and associated areas which discharge to surface waters of the state.

The proposed permit authorizes treated discharges into Martin Branch classified as Fish & Wildlife (F&W) per ADEM Admin. Code ch. 335-6-11. If the requirements of the proposed permit are fully implemented, the facility will not discharge pollutants at levels that will cause or contribute to a violation of the Fish & Wildlife (F&W) classification.

Full compliance with the proposed permit terms and conditions is expected to be protective of instream water quality and ensure consistency with applicable instream State water quality standards (WQS) for the receiving stream.

Technology Based Effluent Limits (TBELs) for crushed stone mining facilities can be found in 40 CFR 436.22(1) and (2) for facilities that recycle waste water for use in processing and mine dewatering, respectively. The TBELs were promulgated for existing dischargers using the Best Practicable Control Technology Available (BPT). New Source Performance Standards (NSPS) have not yet been developed by the EPA for the Crushed Stone Subcategory.

Information provided in the Permittee's application indicated that both Outfalls 001-1 and 002-1 could discharge chronically when the discharge/stream flow ratio may be high; therefore, discharge limitations for pH of 6.0 – 8.5 s.u. are proposed for both Outfall 001 -1 and 002-1 per ADEM Admin Code r. 335-6-10-09.

The TBELs for 40 CFR 436 Subpart B do not include limitations for Total Suspended Solids (TSS). TSS is classified as a conventional pollutant in 40 CFR 401.16 and is expected to be discharged from this type of facility. Therefore, monthly average and daily maximum effluent limitations for TSS are those proposed by the EPA for crushed stone mine drainage in the *Development Document for Effluent Limitations Guidelines and New Source Performance Standards for the Mineral Mining and Processing Point Source Category* (July 1979).

The applicant has requested, in accordance with 40 CFR Part 122.21 and their NPDES permit application, a waiver from testing for the Part A, B, and C pollutants listed in the EPA Form 2C and 2D that are not addressed in their application. They have also certified that due to the processes involved in their mining activity these pollutants are believed to be not present in the waste stream.

The Pollution Abatement/Prevention (PAP) plan for this facility has been prepared by a professional engineer (PE) registered in the State of Alabama and is designed to ensure reduction of pollutants in the waste stream to a level that, if operated properly, the discharge will not contribute to or cause a violation of applicable State WQS. The proposed permit terms and conditions are predicated on the basis of ensuring a reduction of pollutants in the discharge to a level that reduces the potential of contributing to or causing a violation of applicable State WQS.

In accordance with ADEM Admin. Code r. 335-6-3-.07 the design PE, as evidenced by their seal and/or signature on the application, has accepted full responsibility for the effectiveness of the waste treatment facility to treat the Permittee's effluent to meet NPDES permit limitations and requirements, and to fully comply with Alabama's WQS, when such treatment facilities are properly operated.

If there is a reasonable potential that a pollutant present in the treated discharges from a facility could cause or contribute to a contravention of applicable State WQS above numeric or narrative criteria, 40 CFR Part 122 requires the Department to establish effluent limits using calculated water quality criterion, establish effluent limits on a case-by-case basis using criteria established by EPA, or establish effluent limits based on an indicator parameter. Based on available information, potential pollutants discharged from this facility, if discharged within the concentrations allowed by this permit, would not have a reasonable potential to cause or contribute to a contravention of applicable State WQS.

Pursuant to ADEM Admin. Code r. 335-6-6-.12(r) this permit requires the Permittee to design and implement a Spill Prevention Control and Countermeasures (SPCC) plan for all stored chemicals, fuels and/or stored pollutants that have the potential to discharge to a water of the State. This plan must meet the minimum engineering requirements as defined in 40 CFR Part 112 and must provide for secondary containment adequate to control a potential spill.

The applicant is not proposing discharges of pollutants to a water of the State with an approved Total Maximum Daily Load (TMDL).

The applicant is not proposing discharges into a stream segment or other State water that is included on Alabama's current CWA §303(d) list.

The applicant is not proposing new discharges of pollutant(s) to an ADEM identified Tier I water.

The proposed permit does not authorize new or increased discharges of pollutants to a Tier II water. Therefore, the Antidegradation Policy (ADEM Admin. Code 335-6-10-.04) does not apply to this permit.

NPDES Individual Permit - Modification/Reissuance - Mining (Form 315)

version 4.8

(Submission #: HQ9-WQHV-WHYCD, version 1)

Digitally signed by:
AEPACS
Date: 2025.02.19 14:18:59 -06:00
Reason: Submission Data
Location: State of Alabama

Details

Submission ID HQ9-WQHV-WHYCD

Form Input

General Instructions

NPDES Individual Application - Mining and Coalbed Methane Operations - Mod/Reissuance (Form 315/549)

PLEASE CONTACT YOUR ASSIGNED PERMIT CONTACT TO DISCUSS THE TYPE OF MODIFICATION YOU SHOULD APPLY FOR BEFORE COMPLETING THIS FORM.

This form should be used to submit the following permit requests for individually permitted Mining and Coalbed Methane Operations:

Modifications/Reissuances that include Permit Transfers and/or Permittee/Facility Name Changes

Minor Modifications

Major Modifications

Reissuances

Reissuance of a permit on or after the current permit's expiration date

Revocation and Reissuance before the current permit's expiration date

Please complete all questions and attach all necessary documentation as prompted throughout the application process. Incomplete or incorrect information will delay processing.

Applicable Fees:

Minor Modifications

\$3,400 (Mineral/Resource Extraction Mining, Storage Transloading, Dry Processing)

\$3,940 (Wet Preparation, Processing, Beneficiation)

\$3,940 (Coalbed Methane Operations)

Major Modifications

\$5,820 (Mineral/Resource Extraction Mining, Storage Transloading, Dry Processing)

\$6,860 (Wet Preparation, Processing, Beneficiation)

\$6,860 (Coalbed Methane Operations)

Reissuances

\$5,820 (Mineral/Resource Extraction Mining, Storage Transloading, Dry Processing)

\$6,860 (Wet Preparation, Processing, Beneficiation)

\$6,860 (Coalbed Methane Operations)

Potential Add-on Fees for Major Modifications and Reissuances

\$1,015 (Biomonitoring & Toxicity Limits)

\$2,705 (Review of Model Performed by Others)

\$4,855 (Modeling  desktop)

[For assistance, please click here to determine the permit staff responsible for the site or call \(334\) 394-4372.](#)

Processing Information

Purpose of Application

Reissuance and Modification of Permit Due to Approaching Expiration

Please indicate if the Permittee is applying for a permit transfer and/or name change in addition to permit modification or reissuance:

None

Action Type

Reissuance with Modification

Briefly describe any planned changes at the facility that are included in this reissuance application:

Renewal of permit with modification of permit boundary to more accurately reflect site conditions. No new outfalls or relocation of current outfalls being proposed at this time.

Is this a coalbed methane operation?

No

Permit Information

Permit Number

AL0083089

Current Permittee Name

Rogers Group, Inc.

Permittee

Permittee Name

Rogers Group, Inc.

Mailing Address

421 Great Circle Road
Nashville, TN 37228

Responsible Official

Prefix

Mr.

First Name Last Name

Anthony Russo

Title

Manager of Environmental Services

Organization Name

Rogers Group, Inc.

Phone Type Number Extension

Mobile 6153476683

Email

tony.russo@rogersgroupinc.com

Mailing Address

421 GREAT CIRCLE RD
NASHVILLE, TN 37228

Existing Permit Contacts

Affiliation Type	Contact Information	Remove?
Responsible Official,Notification Recipient	Anthony Garcia	Remove
Permittee	Rogers Group, Inc.	Keep

Facility/Operations Information

Facility/Operations Name

West Huntsville Quarry

Permittee Organization Type

Corporation

Parent Corporation and Subsidiary Corporations of Applicant, if any:

NONE PROVIDED

Landowner(s) Name, Address and Phone Number:

Limestone Management Consultants, Mahaffey Family Partnership, LTD

Sub-contractor(s)/Operator(s), if known:

NONE PROVIDED

Is the ~~Company/Permittee~~ properly registered and in good standing with the Alabama Secretary of State's office?

Yes

Facility/Operations Address or Location Description

26024 NEWBY RD

MADISON, AL 35756

Facility/Operations County (Front Gate)

Limestone

Do the operations span multiple counties?

No

Detailed Directions to the Facility/Operations

Take Exit 347 off Interstate I-65 N onto Huntsville Brownsferry Road in Athens. Follow Huntsville Brownsferry Road east for approximately 5 miles before turning left onto Gray Road. After approximately 1 mile turn right onto Newby Road. The entrance to the quarry is approximately 1/4-mile down Newby Road to the right.

Please refer to the link below for Lat/Long map instruction help:

[Map Instruction Help](#)

Facility/Operations Front Gate Latitude and Longitude

34.74293760711536,-86.85358034000309

Gray Road, Madison, AL

Township(s), Range(s), Section(s) (Note: If you are submitting multiple TRSs, please separate each TRS by a semicolon.

Example: T19S,R1E,S15; T20S,R2E,S16)

T3S, R3W, 33

SIC Code(s) [Please select your primary SIC code first]:

1422-Crushed and Broken Limestone

NAICS Code(s) [Please select your primary NAICS code first]:

212312-Crushed and Broken Limestone Mining and Quarrying

Facility/Operations Contact**Prefix**

Mr.

First Name Last Name

Oliver Dash

Title

Plant Manager

Organization Name

Rigers Group, Inc.

Phone Type Number Extension

Business 2563034288

Email

oliver.dash@rogersgroupinc.com

Member Information

Identify the name, title/position, and unless waived in writing by the Department, the resident address of every officer (a PO Box is not acceptable), general partner, LLP partner, LLC member, investor, director, or person performing a function similar to a director, of the applicant, and each person who is the record or beneficial owner of 10 percent or more of any class of voting stock of the applicant, or any other responsible official(s) of the applicant with legal or decision making responsibility or authority for the facility/operations (if this does not apply, then enter N/A after selecting "Manually Enter in Table"):

List of Names/Titles/Addresses will be entered by:

Manually Entering in Table

Name	Title/Position	Physical Address of Residence
Richard Rechter	Owner	890 Woodcrest Dr., Bloomington, IN
Sam Rechter	Owner	1906 Decatur, Louisville, KY
Ben R. Rechter	Owner	540 Jackson Blvd., Nashville, TN

Other than the ♦Company/Permittee", identify the name of each corporation, partnership, association, and single proprietorship for which any individual identified above is or was an officer, general partner, LLP partner, LLC member, investor, director, or individual performing a function similar to a director, or principal (10% or more) stockholder, that had an Alabama NPDES permit at any time during the five year (60 month) period immediately preceding the date on which this form is signed (if this does not apply, then enter N/A after selecting "Manually Enter in Table"):

List of Corporations/Partnerships/etc, Names and Titles will be entered by:

Manually Entering in Table

Name of Corporation, Partnership, Association, or Single Proprietorship	Name of Individual	Title/Position in Corporation, Partnership, Association, or Single Proprietorship
N/A	N/A	N/A

Additional Contacts (1 of 3)

ADDITIONAL CONTACTS: DMR Contact

Contact Type

DMR Contact

Contact

First Name Last Name

Anthony Russo

Title

Manager of Environmental Services

Organization Name

Rogers Group, Inc.

Phone Type Number Extension

Mobile 6153476683

Email

tony.russo@rogersgroupinc.com

Address

421 GREAT CIRCLE RD
NASHVILLE, TN 37228

Additional Contacts (2 of 3)

ADDITIONAL CONTACTS: Environmental Contact

Contact Type

Environmental Contact

Contact**First Name Last Name**

Anthony Russo

Title

Manager of Environmental Services

Organization Name

Rogers Group, Inc.

Phone Type Number Extension

Mobile 6153476683

Email

tony.russo@rogersgroupinc.com

Address

421 GREAT CIRCLE RD

NASHVILLE, TN 37228

Additional Contacts (3 of 3)**ADDITIONAL CONTACTS: Environmental Contact****Contact Type**

Environmental Contact

Contact**First Name Last Name**

Erik Knowles

Title

Director of Environmental Services

Organization Name

Rogers Group, Inc.

Phone Type Number Extension

Mobile 6154189474

Email

erik.knowles@rogersgroupinc.com

Address

421 GREAT CIRCLE RD

NASHVILLE, TN 37228

Compliance History**Has the applicant ever had any of the following:**

Event	Apply?
An Alabama NPDES, SID, or UIC permit suspended or terminated	No
An Alabama or federal environmental permit suspended/terminated	No
An Alabama State Oil Gas Board permit or other approval suspended or terminated	No
An Alabama or federal performance/environmental bond, or similar security deposited in lieu of a bond, or portion thereof, forfeited	No

Has the applicant, parent corporation, subsidiary, general partner, LLP partner, or LLC Member had any Warning Letters, Notice of Violations (NOVs), Administrative Actions, or litigation filed by ADEM or EPA during the three year (36 month) period preceding the date on which this form is signed?

Yes

Identify every Warning Letter, Notice of Violation (NOV), Administrative Action, or litigation issued to the applicant, parent corporation, subsidiary, general partner, LLP partner, or LLC Member and filed by ADEM or EPA during the three year (36 month) period preceding the date on which this form is signed.

Date of Issuance	Type of Action	Briefly describe alleged violations:	Date of Final Resolution
11/13/2024	Consent Order	Hollywood Quarry Plant visible emission exceedance	11/13/2024

For this facility, list any other NPDES or other environmental permits (including permit numbers), authorizations, or certifications that have been applied for or issued within the State by ADEM, EPA, Alabama Department of Labor (ADOL), US Army Corp of Engineers (USACE), or other agency, to the applicant, parent corporation, subsidiary, or LLC member whether presently effective, expired, suspended, revoked, or terminated:

City of Huntsville Air Permit 7-09-P364-Z001

Extraction Permit EP001-TR03

For other facilities, list any other NPDES or other ADEM permits (including permit numbers), authorizations, or certifications that have been applied for or issued within the State by ADEM, EPA, ASMC, ADOL, or USACE, to the applicant, parent corporation, subsidiary, or LLC member whether presently effective, expired, suspended, revoked, or terminated:

Athens Asphalt - ALG020031, 708-0006-X004;

Hollywood Asphalt - ALG020228, 705-0056-X005;

Hollywood Quarry - AL0083071, 705-0056-X001, 705-0056-X002, 705-0056-X003, 705-0056-X004, 705-0056-X006, 705-0056-X007;

Huntsville Asphalt - ALG020180, 709-0106-X001;

Huntsville Shop - ALG140968, SC20000-054535;

Lacey's Spring Asphalt - ALG020227, 712-0103-X002;

Limestone County Quarry - AL0072338;

Madison Asphalt - ALG020233, 7-09-P399-Z001;

Moulton Quarry - AL0066991, 707-0008-X012, 707-0008-X013, 707-0008-X016, 707-0008-X017, 707-0008-X018, 707-0008-X021, 707-0008-X022;

Red Bay - AL0083631, 704-0025-X004, 704-0025-X005;

Russellville Asphalt - ALG020185, 704-0024-X002;

Tanner Asphalt - ALG020236, 708-0031-X001;

Tanner Quarry - AL0079146, LRN-2007-02162, 708-0028-X001, 708-0028-X002, 708-0028-X005;

Tuscumbia Asphalt - ALG020156, 701-0019-X002, 701-0019-X004;

Tuscumbia Quarry - AL0024384, 701-0024-X001, 701-0024-X002, 701-0024-X003, 701-0024-X004;

Anti-Degradation Evaluation

Pursuant to ADEM Admin. Code ch. 335-6-10-12(9), responses to the following questions must be provided by the applicant requesting NPDES permit coverage for new or expanded discharges of pollutant(s) to Tier 2 waters (except discharges eligible for coverage under general permits). As part of the permit application review process, the Department is required to consider, based on the applicant's demonstration, whether the proposed new or increased discharge to Tier 2 waters is necessary for important economic or social development in the area in which the waters are located. Does this modification/reissuance include new or expanded discharges to Tier II water(s)?

No

Activity Description & Information

Narrative description of activity(s):

This facility will mine, process, and stockpile crushed limestone for sale.

Total Facility/Operations Area (acres)

486.30

Total Disturbed Area (acres)

255.50

Anticipated Commencement Date

08/23/2025

Anticipated Completion Date

08/23/2030

Please identify which of the following apply to this operation:

Activity/Condition	Appy?
An existing facility/operation which currently results in discharges to State waters?	Yes
A proposed facility/operation which will result in a discharge to State waters?	No
Be located within any 100-year flood plain?	Yes
Discharge to Municipal Separate Storm Sewer?	No
Discharge to waters of or be located in the Coastal Zone?	No
Need/have ADEM UIC permit coverage?	No
Be located on Indian/historically significant lands?	No
Need/have ADEM SID permit coverage?	No
Need/have ASMC permit coverage?	No
Need/have State Oil & Gas Board permit coverage?	No
Need/have ADOL permit coverage?	No
Generate, treat, store, or dispose of hazardous or toxic waste?	No
Be located in or discharge to a Public Water Supply (PWS) watershed or be located within $\frac{1}{2}$ mile of any PWS well?	No
Incised pit	Yes

Does your facility/operation use cooling water?

No

Material to be Removed, Processed, or Transloaded**Material To Be Removed, Processed, Or Transloaded (Note: Sum must equal 100.)**

Mineral(s)/Mineral product(s)	%
Limestone, crushed limestone and dolomite	100
	Sum: 100

Proposed Activity To Be Conducted**Type(s) of activity presently conducted at applicant's existing facility or proposed to be conducted at facility (Select Yes or No):**

Activity	Apply?
Adjacent/associated asphalt/concrete plant(s)	No
Alternative fuels operation	No
Auger mining	No
Cement production	No
Chemical processing or leaching	No
Chemicals used in process or wastewater treatment (coagulant, biocide, etc.)	No
Construction related temporary borrow pits/areas	No
Creek/stream crossings	No
Dredging	No
Excavation	Yes
Grading, clearing, grubbing, etc.	Yes
Hydraulic mining	No
Hydraulic mining, dredging, instream or between stream-bank mining	No
Lime production	No
Low volume sewage treatment package plant	No

Activity	Apply?
Mineral dry processing (crushing & screening)	Yes
Mineral loading	Yes
Mineral storing	Yes
Mineral transportation	Yes
Mineral wet preparation	Yes
Onsite construction debris or equipment storage/disposal	Yes
Onsite mining debris or equipment storage/disposal	Yes
Other beneficiation & manufacturing operations	No
Pre-construction ponded water removal	No
Pre-mining logging or land clearing	Yes
Preparation plant waste recovery	No
Quarrying	Yes
Reclamation of disturbed areas	Yes
Solution mining	No
Surface mining	Yes
Synthetic fuel production	No
Underground mining	No
Waterbody relocation or other alteration	No
Within-bank mining	No

If the operation will include activities other than those listed above, please describe them below:

NONE PROVIDED

If the type of activity presently conducted or proposed is Mineral Transportation, please indicate which of the following apply:

Barge	Apply?
Barge	No
Rail	No
Truck	Yes

Fuel - Chemical Handling, Storage, & Spill Prevention Control & Countermeasures (SPCC) Plan

Will fuels, chemicals, compounds, or liquid waste be used or stored onsite?

Yes

Please identify the fuel, chemicals, compounds, or liquid waste and indicate the volume of each:

Volume (gallons)	Contents
10.000	Diesel
55	Various 55-Gallon Oil Drums

SPCC Plan

[West Huntsville SWPPP & SPCC Plan.pdf - 02/06/2025 04:45 PM](#)

Comment

NONE PROVIDED

ASMC Regulated Entities

Is this a coal mining operation regulated by ASMC?

No

Topographic Map Submittal

Topographic Map

Attach to this application a 7.5 minute series U.S.G.S. topographic map(s) or equivalent map(s) no larger than, or folded to a size of 8.5 by 11 inches (several pages may be necessary), of the area extending to at least one mile beyond property boundaries. The topographic or equivalent map(s) must include a caption indicating the name of the topographic map, name of the applicant, facility name, county, and township, range, & section(s) where the facility are located. Unless approved in advance by the Department, the topographic or equivalent map(s), at a minimum, must show: a) An accurate outline of the area to be covered by the permit (b) An outline of the facility (c) All existing and proposed disturbed areas (d) Location of intake and discharge areas (e) Proposed and existing discharge points (f) Perennial, intermittent, and ephemeral streams (g) Lakes, springs, water wells, wetlands (h) All known facility dirt/improved access/haul roads (i) All surrounding unimproved/improved roads (j) High-tension power lines and railroad tracks (k) Contour lines, township-range-section lines (l) Drainage patterns, swales, washes (m) All drainage conveyance/treatment structures (ditches, berms, etc.) (n) Any other pertinent or significant feature.

Topographic Map

2025 West Huntsville USGS Map.pdf - 02/04/2025 12:05 PM

Comment

NONE PROVIDED

Detailed Facility Map Submittal

Detailed Facility Map

2025 West Huntsville NPDES Permit Map.pdf - 02/04/2025 12:05 PM

Comment

NONE PROVIDED

Outfalls (1 of 2)

Outfall Identifier: 001

Feature Type

Outfall (External)

Outfall Identifier

001

Outfall Status

Existing

Please be aware that you should only mark an outfall status as existing if (1) the Department has been previously notified that it was constructed as proposed or (2) it began discharge prior to this application. A proposed outfall is one that is being newly added to the permit OR one that has never discharged or has never been authorized by the Department to discharge. Should you have any questions about which status to select, please contact the Department's permit engineer for this site.

Permit Action

Reissue

Receiving Water

Martin Branch

Check below if the discharge enters the receiving water via an unnamed tributary.

NONE PROVIDED

Location of Outfall

34.73805600000000, -86.84937200000000

Are the location coordinates above still correct for this outfall?

Yes

Distance to Receiving Water (ft)

750

Disturbed Area (acres)

160.1

Drainage Area (acres)

160.1

303(d) Segment?

No

TMDL Segment?

No

Please do not add a new outfall unless you are requesting a modification that includes a new outfall. All of the currently permitted outfalls are already included in this form. If you add an outfall in error, please choose  under  for the outfall. If you have any questions, please contact your permit engineer BEFORE proceeding.

Outfalls (2 of 2)

Outfall Identifier: 002**Feature Type**

Outfall (External)

Outfall Identifier

002

Outfall Status

Existing

Please be aware that you should only mark an outfall status as existing if (1) the Department has been previously notified that it was constructed as proposed or (2) it began discharge prior to this application. A proposed outfall is one that is being newly added to the permit OR one that has never discharged or has never been authorized by the Department to discharge. Should you have any questions about which status to select, please contact the Department's permit engineer for this site.

Permit Action

Reissue

Receiving Water

Martin Branch

Check below if the discharge enters the receiving water via an unnamed tributary.

NONE PROVIDED

Location of Outfall

34.73859200000000, -86.84320700000001

Are the location coordinates above still correct for this outfall?

No

New/Corrected Lat/Long Coordinates

34.733749, -86.850651

Distance to Receiving Water (ft)

450

Disturbed Area (acres)

99.4

Drainage Area (acres)

99.4

303(d) Segment?

No

TMDL Segment?

No

Please do not add a new outfall unless you are requesting a modification that includes a new outfall. All of the currently permitted outfalls are already included in this form. If you add an outfall in error, please choose **Delete** under **Permit Action** for the outfall. If you have any questions, please contact your permit engineer BEFORE proceeding.

Discharge Characterization

EPA Form 2C, EPA Form 2D, and/or ADEM Form 567 Submittal

Yes, pursuant to 40 CFR 122.21, the applicant requests a waiver for completion of EPA Form 2C, EPA Form 2D, and ADEM Form 567 and certifies that the operating facility will discharge treated stormwater only; that chemical/compound additives are not used (unless waived in writing by the Department on a programmatic, categorical, or individual compound/chemical basis); that there are no process, manufacturing, or other industrial operations or wastewaters, including but not limited to lime or cement production and synfuel operations; and that coal and coal products are not mined nor stored onsite.

Please download the following Excel file to enter your information. Once complete, please attach to the below control.

[Download spreadsheet here.](#)

Required attachment:

Form315TableB.xlsx - 01/27/2025 12:32 PM

Comment

NONE PROVIDED

Please download the following Excel file to enter your information. Once complete, please attach to the below control.

[Download spreadsheet here.](#)

Required attachment:

Form315TableC.xlsx - 01/27/2025 12:35 PM

Comment

NONE PROVIDED

Discharge Structure Description & Pollutant Source

Please download the following Excel file to enter your information. Once complete, please attach to the below control.

[Download spreadsheet here.](#)

Required attachment:

Form315DischargeStructure.xlsx - 01/27/2025 12:38 PM

Comment

NONE PROVIDED

Variance Request

Do you intend to request or renew one or more of the CWA technology variances authorized at 40 CFR 122.21(m)?

No

Pollution Abatement & Prevention (PAP) Plan Summary (1 of 1)

Outfall(s):
001 and 002

Outfall Questions:	Please select one:
Runoff from all areas of disturbance is controlled	Yes
Drainage from pit area, stockpiles, and spoil areas directed to a sedimentation pond	Yes
Sedimentation basin at least 0.25 acre/feet for every acre of disturbed drainage	Yes
Sedimentation basin cleaned out when sediment accumulation is 60% of design capacity	Yes
Trees, boulders, and other obstructions removed from pond during initial construction	Yes
Width of top of dam greater than 12'	Yes
Side slopes of dam no steeper than 3:1	Yes
Cutoff trench at least 8' wide	N/A
Side slopes of cutoff trench no less than 1:1	N/A
Cutoff trench located along the centerline of the dam	N/A
Cutoff trench extends at least 2' into bedrock or impervious soil	N/A
Cutoff trench filled with impervious material	N/A
Embankments and cutoff trench 95% compaction standard proctor ASTM	N/A
Embankment free of roots, tree debris, stones >6" diameter, etc.	N/A
Embankment constructed in lifts no greater than 12"	N/A
Spillpipe sized to carry peak flow from a one year storm event	N/A
Spillpipe will not chemically react with effluent	N/A
Subsurface withdrawal	N/A
Anti-seep collars extend radially at least 2' from each joint in spillpipe	N/A
Splashpad at the end of the spillpipe	Yes
Emergency Spillway sized for peak flow from 25-yr 24-hr event if discharge not into PWS classified stream	Yes
Emergency spillway sized for peak flow from 50-yr 24-hr event if discharge is into PWS classified stream	N/A
Emergency overflow at least 20' long	Yes
Side slopes of emergency spillway no steeper than 2:1	Yes
Emergency spillway lined with riprap or concrete	Yes
Minimum of 1.5' of freeboard between normal overflow and emergency overflow	Yes
Minimum of 1.5' of freeboard between max. design flow of emergency spillway and top of dam	Yes
All emergency overflows are sized to handle entire drainage area for ponds in series	N/A
Dam stabilized with permanent vegetation	N/A
Sustained grade of haul road <10%	Yes
Maximum grade of haul road <15% for no more than 300'	Yes
Outer slopes of haul road no steeper than 2:1	Yes
Outer slopes of haul road vegetated or otherwise stabilized	Yes
Detail drawings supplied for all stream crossings	N/A
Short-Term Stabilization/Grading And Temporary Vegetative Cover Plans	Yes
Long-Term Stabilization/Grading And Permanent Reclamation or Water Quality Remediation Plans	Yes

Identify and provide detailed explanation for any **N/A or **Yes** response(s):**

All water is directed to Pond 1 and/or the quarry pit sumps for treatment prior to being discharged. Pond 1 and each quarry pit sump is designed to treat a 10-year, 24-hour (or more) rainfall event. Rainfall that exceeds a 10-year-, 24-hour event would overflow into the lower level of the quarry pit floor. Water is only capable of being discharged from the quarry pits via pump. When necessary, water is pumped and discharged via pipe through outfalls. A splash pad is installed at each outlet of both pit pump discharge pipes to dissipate the energy from discharged water and prevent scouring.

Pollution Abatement & Prevention (PAP) Plan Review Checklist

General Information:		Please select one:
PE Seal with License #		Yes
Name and Address of Operator		Yes
Legal Description of Facility		Yes
Name of Company		Yes
Number of Employees		Yes
Products to be Mined		Yes
Hours of Operation		Yes
Water Supply and Disposition		Yes

Maps:	Please select one:
Topographic Map including Information from Part XIII (a) (o) of this Application	Yes
1 500 or Equivalent Facility Map including Information from Part XIV of this Application	Yes

Detailed Design Diagrams:	Please select one:
Plan Views	Yes
Cross-section Views	Yes
Method of Diverting Runoff to Treatment Basins	Yes
Line Drawing of Water Flow through Facility with Water Balance or Pictorial Description of Water Flow	Yes

Narrative of Operations:	Please select one:
Raw Materials Defined	Yes
Processes Defined	Yes
Products Defined	Yes

Schematic Diagram:	Please select one:
Points of Waste Origin	Yes
Collection System	Yes
Disposal System	Yes

Post Treatment Quantity and Quality of Effluent:	Please select one:
Flow	Yes
Suspended Solids	Yes
Iron Concentration	N/A
pH	Yes

Identify and provide detailed explanation for any N or N/A response(s):

Permit requires only TSS and pH be analyzed for non-coal limestone surface mining

Description of Waste Treatment Facility:	Please select one:
Pre-Treatment Measures	N/A
Recovery System	N/A
Expected Life of Treatment Basin	N/A
Measures for Ensuring Access to All Treatment Structures and Related Appurtenances including Outfall Locations	N/A
Schedule of Cleaning and/or Abandonment	N/A

Identify and provide detailed explanation for any N or N/A response(s):

This facility is only a non-coal limestone surface mining

Other:	Please select one:
Precipitation/Volume Calculations/Diagram Attached	Yes
BMP Plan for Haul Roads	Yes
Measures for Minimizing Impacts to Adjacent Stream (e.g., Buffer Strips, Berms)	Yes
Measures for Ensuring Appropriate Setbacks are Maintained at All Times	Yes
Methods for Minimizing Nonpoint Source Discharges	Yes
If Chemical Treatment Used, Methods for Ensuring Appropriate Dosage	N/A
Facility Closure Plans	Yes
PE Rationale(s) For Alternate Standards, Designs or Plans	N/A

Identify and provide detailed explanation for any **♦N♦ or **♦N/A♦** response(s):**

No chemical treatment and/or alternative standards are being proposed at this facility.

Pollution Abatement & Prevention (PAP) Plan

Is this a coal mining operation regulated by ASMC?

No

PAP Plan (non-coal mining facilities)

2025 West Huntsville Pollution Abatement Plan (signed).pdf - 02/19/2025 09:52 AM

Comment

NONE PROVIDED

Professional Engineer (PE)

Registration License Number

21235

Professional Engineer

Prefix

Mr.

First Name Last Name

David Leeds

Title

Engineer

Organization Name

West Huntsville Quarry

Phone Type Number Extension

Business 2562756629

Email

leeds720@gmail.com

Address

26024 NEWBY RD

MADISON, AL 35756

Information for the Applicant

Please read the following information and acknowledge below:

Contact the Department prior to submittal with any questions or to request acceptable alternate content/format.

Be advised that you are not authorized to commence regulated activity until this application can be processed, publicly noticed, and approval to proceed is received in writing from the Department.

EPA Form(s) 1 and 2F need not be submitted unless specifically required by the Department. EPA Form(s) 2C and/or 2D are required to be submitted unless the

applicant is eligible for a waiver and the Department grants a waiver, or unless the relevant information required by EPA Form(s) 2C and/or 2D are submitted to the Department in an alternative format acceptable to the Department.

Planned/proposed mining sites that are greater than 5 acres, that mine/process coal or metallic mineral/ore, or that have wet or chemical processing, must apply for and obtain coverage under an Individual or General NPDES Permit prior to commencement of any land disturbance. Such Individual NPDES Permit coverage may be requested via this ADEM Form 315.

The applicant is advised to contact:

- (1) The Alabama Surface Mining Commission (ASMC) if coal, coal fines, coal refuse, or other coal related materials are mined, transloaded, processed, etc.;
- (2) The Alabama Department of Labor (ADOL) if conducting non-coal mining operations;
- (3) The Alabama Historical Commission for requirements related to any potential historic or culturally significant sites;
- (4) The Alabama Department of Conservation and Natural Resources (ADCNR) for requirements related to potential presence of threatened/endangered species;
- (5) The US Army Corps of Engineers, Mobile or Nashville Districts, if this project could cause fill to be placed in federal waters or could interfere with navigation.

The Department must be in receipt of a completed version of this form, including any supporting documentation, and the appropriate processing fee [including Greenfield Fee and Biomonitoring & Toxicity Limits fee(s), if applicable], prior to development of a draft NPDES permit.

Acknowledgement

I acknowledge I have read and understand the information above.

Additional Attachments

Additional Attachments

[2025 West Huntsville Site Drainage & Treatment Calculations.pdf - 02/04/2025 12:06 PM](#)

[2025 West Huntsville Water Flow Schematic.pdf - 02/04/2025 12:06 PM](#)

[2025 West Huntsville Site Details.pdf - 02/04/2025 12:06 PM](#)

Comment

NONE PROVIDED

Application Preparer

Application Preparer

Prefix

Mr.

First Name Last Name

Anthony Russo

Title

NONE PROVIDED

Organization Name

Rogers Group, Inc.

Phone Type Number Extension

Business 6153476683

Email

tony.russo@rogersgroupinc.com

Address

421 GREAT CIRCLE RD

NASHVILLE, TN 37228

Fees Assessed

The following itemized fees have been assessed in accordance with Fee Schedule D and 335-1-6-.04(a) of ADEM Admin. Code Division 1 regulations based on the information provided in this application.

If the correct fees are not displayed, please contact your permit engineer PRIOR to submitting the form. Do NOT answer questions erroneously in order to have the correct fee assessed.

Wet Preparation, Processing, Beneficiation:

6860

Fee

Fee

6860

Agreements and Signature(s)

SUBMISSION AGREEMENTS

- I am the owner of the account used to perform the electronic submission and signature.
- I have the authority to submit the data on behalf of the facility I am representing.
- I agree that providing the account credentials to sign the submission document constitutes an electronic signature equivalent to my written signature.
- I have reviewed the electronic form being submitted in its entirety, and agree to the validity and accuracy of the information contained within it to the best of my knowledge.

Professional Engineer (PE)

A detailed, comprehensive Pollution Abatement & Prevention (PAP) Plan must be prepared, signed, and certified by a professional engineer (PE), registered in the State of Alabama, and the PE must certify as follows: *I certify under penalty of law that the technical information and data contained in this application, and a comprehensive Pollution Abatement & Prevention (PAP) Plan, including any attached SPCC plan, maps, engineering designs, etc. acceptable to ADEM, for the prevention and minimization of all sources of pollution in stormwater and authorized related process wastewater runoff has been prepared under my supervision for this facility utilizing effective, good engineering and pollution control practices and in accordance with the provisions of this Permit, and ADEM Admin. Code Division 335-6, including Chapter 335-6-9 and Appendices A & B. If the PAP Plan is properly implemented and maintained by the Permittee, discharges of pollutants can reasonably be expected to be effectively minimized to the maximum extent practicable and according to permit discharge limitations and other permit requirements. The applicant has been advised that appropriate pollution abatement/prevention facilities and structural & nonstructural management practices or Department approved equivalent management practices as detailed in the PAP Plan must be fully implemented and regularly maintained as needed at the facility in accordance with good sediment, erosion, and other pollution control practices, permit requirements, and other ADEM requirements to ensure protection of groundwater and surface water quality.*

Signed By William Leeds on 02/19/2025 at 2:14 PM

Responsible Official

This application must be signed and initialed by a Responsible Official of the applicant pursuant to ADEM Admin. Code Rule 335-6-6-.09 who has overall responsibility for the operation of the facility. I certify under penalty of law that this document, including technical information and data, the PAP Plan, including any SPCC plan, maps, engineering designs, and all other attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the PE and other person or persons under my supervision 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 or imprisonment for knowing violations. A comprehensive PAP Plan to prevent and minimize discharges of pollution to the maximum extent practicable has been prepared at my direction by a PE for this facility utilizing effective, good engineering and pollution control practices and in accordance with the provisions of ADEM Admin. Code Division 335-6, including Chapter 335-6-9 and Appendices A & B, and information contained in this application, including any attachments. I understand that regular inspections must be performed by, or under the direct supervision of, a PE and all appropriate pollution abatement/prevention facilities and structural & nonstructural management practices or Department approved equivalent management practices identified by the PE must be fully implemented prior to and concurrent with commencement of regulated activities and regularly maintained as needed at the facility in accordance with good sediment, erosion, and other pollution control practices and ADEM requirements. I understand that the PAP Plan must be fully implemented and regularly maintained so that discharges of pollutants can reasonably be expected to be effectively minimized to the maximum extent practicable and according to permit discharge limitations and other requirements to ensure protection of groundwater and surface water quality. I understand that failure to fully implement and regularly maintain required management practices for the protection of groundwater and surface water quality may subject the Permittee to appropriate enforcement action. *I certify that this form has not been altered, and if copied or reproduced, is consistent in format and identical in content to the ADEM approved form. I further certify that the discharges described in this application have been tested or evaluated for the presence of non-stormwater discharges and any non-mining associated beneficiation/process pollutants and wastewaters have been fully identified. I acknowledge my understanding that I may be required to obtain a permit from the ADOL. I acknowledge my understanding that if the proposed activities will be conducted in or potentially impact waters of the state or waters of the US (including wetlands), that I may be required to obtain a permit from the USACE.*

Signed By Erik Knowles on 02/19/2025 at 9:53 AM

The applicant is required to supply outfall number(s) as it appears on the map(s) required by this application [if this application is for a modification to an existing permit do not change the numbering sequence of the permitted outfalls], describe each, (e.g., pipe, spillway, channel, tunnel, conduit, well, discrete fissure, or container), and identify the origin of pollutants. The response must be precise for each outfall. If the discharge of pollutants from any outfall is the result of commingling of waste streams from different origins, each origin must be completely described.

Description of Origin of Pollutants – typical examples: (1) Discharge of drainage from the underground workings of an underground coal mine, (2) Discharge of drainage from a coal surface mine, (3) Discharge of drainage from a coal preparation plant and associated areas, (4) Discharge of process wastewater from a gravel-washing plant, (5) Discharge of wastewater from an existing source coal preparation plant, (6) Discharge of drainage from a sand and gravel pit, (7) Pumped discharge from a limestone quarry, (8) Controlled surface mine drainage (pumped or siphoned), (9) Discharge of drainage from mine reclamation, (10) Other (please describe):

Outfall	Discharge structure Description	Description of Origin of pollutants	Surface Discharge	Groundwater Discharge	Wet Prep -Other Production Plant	Pumped or Controlled Discharge	Low Volume STP
001E	Spillway / Pipe Outlet	(7), (8), and (9)	X			X	
002E	Pipe Outlet	(7), (8), and (9)	X			X	

The applicant is required to supply the following information separately for every proposed (P) or existing (E) outfall. List expected average daily discharge flow rate in cfs and gpd; frequency of discharge in hours per day and days per month; average summer and winter temperature of discharge(s) in degrees centigrade; average pH in standard units; and average daily discharges in pounds per day of BOD5, Total Suspended Solids, Total Iron, Total Manganese, and Total Aluminum (if bauxite or bauxitic clay or if otherwise believed present):

Outfall E/P	Information Source - # of Samples	Flow (cfs)	Flow (gpd)	Frequency (hours/day)	Frequency (days/month)	Sum/Win Temp, (°C)	pH (s.u.)	BOD5 (lbs/day)	TSS (lbs/day)	Tot Fe (lbs/day)	Tot Mn (lbs/day)	Tot Al (lbs/day)
001E	23	0.131	84,705.88	Varies	Varies	21 / 10	7.33	N/A	8.003E-06	N/A	N/A	N/A
002E	None / No Data	TBD	TBD	TBD	TBD	21 / 10	TBD	N/A	TBD	N/A	N/A	N/A

The applicant is required to supply the following information separately for every proposed or existing outfall. Identify and list expected average daily discharge of any other pollutant(s) listed in EPA Form 2C Tables A, B, C, D, and E that are not referenced in Part XVI.B. or otherwise submitted elsewhere, that you know is present or have reason to believe could be present in the discharge(s) at levels of concern:

TABLE 1-1
Runoff and Storage Calculations
Drainage Area 1 - Pond 1 & Quarry Pit Sump 1

		ft²	Acres	
Total Runoff Area		1,489,742	34.2	
Distrubed Acreage	Gravel	1,489,742	34.2	
	Overburden	0	0.0	
	Brush / Woods	0	0.0	
Cover Description	Soil Type (A, B, C, or D)	CN (TDOT Table)	% of Area	Area
Gravel	B	85	100%	34.2 acres
Overburden	B	85	0%	0.0 acres
Brush / Woods	B	56	0%	0.0 acres
STORM EVENT TYPE	Rainfall Amount (NOAA Atlas 14 PF Data)			
P = 10 YEAR - 24 HOUR	5.69 in			
Item	Equation		Value	
CN_{weighted} = Weighted Curve Number	$CN_{weighted} = \frac{\sum (CN * Area)}{\sum (Area)}$		85.0	
S = Potential Maximum Retention	$S = \frac{1000}{CN} - 10$		1.76 in	
Q = Storm Runoff	$Q = \frac{[P - (0.2S)]^2}{P + 0.8S}$		4.01 in	
V = Storm Runoff Volume	$V = Q * Area * \frac{1'}{12''}$		11.43 ac-ft	
V_{sed} = Sediment Storage	$V_{sed} = 0.05' * distributed acreage$		1.7 ac-ft	
V_{total} = Total Volume	$V_{total} = (V + V_{sed}) * \frac{43,560'}{1 ac}$		572,416 ft ³	
V_{credit} = Credit for Multiple Ponds	$V_{credit} = 20\% * V_{total}$		0 ft ³	
V_{required} = Volume Required	$V_{required} = V_{total} - V_{credit}$		572,416 ft ³	
	Stage (ft)	Area (ft²)	Pond Storage (ft³)	
			Incremental	Cumulative
Approximate Pond 3 Storage	0	29,141	0	0
	2	32,996	66,045	66,045
	4	36,904	32,996	99,041
	6	40,865	36,904	135,945
	8	44,881	40,865	176,810
	10	48,950	44,881	221,691
Approximate Quarry Pit Sump 1 Storage & Pit Floor	(From Area 2 Drainage Calculations)			12,044,207
Approximate Total Pond Storage				12,265,898

TABLE 2-1
Pond Outfall Calculations
Drainage Area 1 - Pond 1 Discharge

	ft²	Acres
Runoff Area	1,489,742	34.2
Cover Description	Runoff Coeff. (TDOT Tables)	% of Area
Gravel	0.5	100%
Overburden	0.5	0%
Forest / Brush	0.2	0%
Duration (min)	25-Year Rainfall Intensity (NOAA Rainfall IDF)	
5	9.97	
10	7.30	
Item	Equation	Value
Tc = Time of Concentration	Calculated on Table 3-7	5.00 minutes
i ₂₅ = Rainfall Intensity	Interpolated from NOAA Rainfall IDF	9.97 in/hr
C = Runoff Coefficient	$C_{weighted} = \frac{\Sigma (C * Area)}{\Sigma (Area)}$	0.50
Q = Peak Flow (Rational Method)	$Q = CiA$	170.5 cfs

Spillway Design

	Spillway + Pipe Capacity	Source
Maximum Discharge Capacity	197.59 cfs	See calculations below

***Water discharged to quarry pit sump or through Outfall 001 via pipe. Pond spillway overflow would be contained in quarry pit sump and lower level of quarry pit.**

Flow Calculations
$$Q = \frac{1.49}{n} * A * R^{\frac{2}{3}} * S^{1/2}$$

Item	Value	
Flow - Trapezoidal Channel (Spillway)		
n = Manning Coefficent	0.25	(TDOT Table)
A = Cross Sectional Area	152.00	ft ²
P = Wetted Perimeter	47.89	ft
R = Hydraulic Radius	3.17	ft
S = Channel Slope	0.01	ft/ft
Q = Channel Flow	195.66	cfs
Flow - Pipe (If Applicable)		
n = Manning Coefficent	0.024	(TDOT Table)
A = Cross Sectional Area	0.79	ft ²
P = Wetted Perimeter	3.14	ft
R = Hydraulic Radius	0.25	ft
S = Pipe Slope	0.01	ft/ft
Q = Pipe Flow	1.94	cfs

Trapezoid (assuming full flow)

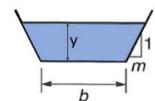
b = width = 30 ft

y = depth = 4 ft

m = slope = 2

A = 152 ft²

P = 47.88854 ft



Pipe (assuming full flow)

Pipe diam. = 12 in

1 ft

r = radius 0.5 ft

A = 0.79 ft²

P = 3.141593 ft

TABLE 3-1
Time of Concentration Calculations
Drainage Area A - Pond 1 Discharge
From TDOT Design Division Drainage Manual

Sheet Flow		
Segment ID		N/A
Item	Reference	Value
1. Surface description	<i>TDOT Table</i>	Graveled Surface
2. n = Manning's avg. roughness coeff	<i>TDOT Table</i>	0.012
3. L = flow length	<i>Total</i>	300 <i>ft</i>
4. P₂ = 2 year, 24-hour rainfall	<i>NOAA Atlas 14 PF Data</i>	4.01 <i>in</i>
5. Land Slope (S)		
Min Elevation =		621 <i>ft</i>
Max Elevation =		682 <i>ft</i>
S =		0.20 <i>ft/ft</i>
6. Compute NRCS version t_t =	$t_t = \frac{0.007(nL)^{0.8}}{P_2^{0.5}S^{0.4}}$	0.018 <i>hr</i>
Shallow Concentrated Flow		
Segment ID		N/A
Item	Reference	Value
1. Surface description		Graveled Surface
2. L = flow length	<i>Longest distance</i>	300 <i>ft</i>
3. s = watercourse slope		
Min Elevation =		621 <i>ft</i>
Max Elevation =		682 <i>ft</i>
S =		0.20 <i>ft/ft</i>
4. V = average velocity	<i>Formula 4-7 or 4-8</i>	7.28 <i>ft/s</i>
5. Compute t_t =	$t_t = \frac{L}{3600V}$	0.011 <i>hr</i>
Channel Flow (Drainage Ditch to Pond)		
Segment ID		N/A
Item	Reference	Value
1. a = cross sectional flow area		-- <i>ft²</i>
2. P_w = wetted perimeter		-- <i>ft</i>
3. r = hydraulic radius	$R = \frac{A}{P_w}$	-- <i>ft</i>
4. s = channel slope		
Min Elevation =		-- <i>ft</i>
Max Elevation =		-- <i>ft</i>
S =		-- <i>ft/ft</i>
5. n = Manning's roughness coeff	<i>TDOT Table</i>	
6. Compute V	$V = 1.49 r^{2/3} S^{1/2} / n$	-- <i>ft/s</i>
7. L = flow length		-- <i>ft</i>
8. Compute t_t =	$t_t = \frac{L}{3600V}$	0.000 <i>hr</i>
Sub-area Tc = *		0.030 <i>hr</i>
		1.79 <i>min</i>

*if calculated to be < 5min, a minimum value of 5min should be used

TABLE 1-2
Runnoff and Storage Calculations
Drainage Area 2 - Quarry Pit Sump 1

	ft ²	Acres		
Total Runoff Area	3,783,334	86.9		
Distrubed Acreage	Gravel	2,238,540		
	Overburden	373,545		
	Brush / Woods	1,171,250		
Cover Description	Soil Type (A, B, C, or D)	CN (TDOT Table)	% of Area	Area
Gravel	A	76	59%	51.4 acres
Overburden	A	76	10%	8.6 acres
Brush / Woods	A	35	31%	26.9 acres
STORM EVENT TYPE	Rainfall Amount (NOAA Atlas 14 PF Data)			
P = 10 YEAR - 24 HOUR	5.69 in			
Item	Equation		Value	
CN_{weighted} = Weighted Curve Number	$CN_{weighted} = \frac{\sum (CN * Area)}{\sum (Area)}$		63.3	
S = Potential Maximum Retention	$S = \frac{1000}{CN} - 10$		5.80	in
Q = Storm Runoff	$Q = \frac{[P - (0.2S)]^2}{P + 0.8S}$		1.99	in
V = Storm Runoff Volume	$V = Q * Area * \frac{1'}{12''}$		14.39	ac-ft
V_{sed} = Sediment Storage	$V_{sed} = 0.05' * distributed acreage$		2.6	ac-ft
V_{total} = Total Volume	$V_{total} = (V + V_{sed}) * \frac{43,560'}{1 ac}$		738,653	ft ³
V_{credit} = Credit for Multiple Ponds	$V_{credit} = 20\% * V_{total}$		147,731	ft ³
V_{required} = Volume Required	$V_{required} = V_{total} - V_{credit}$		590,922	ft³
	Stage (ft)	Area (ft²)	Pond Storage (ft³)	
			Incremental	Cumulative
Approximate Quarry Pit Sump Storage	30	21,201	636,031	636,031
Approximate Lower Quarry Floor Storage	30	380,273	11,408,176	11,408,176
Approximate Total Pond Storage				12,044,207

TABLE 2-2
Pond Outfall Calculations
Drainage Area 2- Outfall 001

	ft²	Acres		
Runoff Area	3,783,334	86.9		
Cover Description	Runoff Coeff. (TDOT Tables)	% of Area		Area
Gravel	0.5	59%	51.4	acres
Overburden	0.5	10%	8.6	acres
Forest / Brush	0.2	31%	26.9	acres
Duration (min)	25-Year Rainfall Intensity (NOAA Rainfall IDF)			
5	9.97			
10	7.30			
Item	Equation			Value
Tc = Time of Concentration	Calculated on Table 3-7			5.00 minutes
i ₂₅ = Rainfall Intensity	Interpolated from NOAA Rainfall IDF			9.97 in/hr
C = Runoff Coefficient	$C_{weighted} = \frac{\sum (C * Area)}{\sum(Area)}$			0.41
Q = Peak Flow (Rational Method)	$Q = CiA$			352.5 cfs

Spillway Design

	Spillway + Pipe Capacity		Source
Maximum Discharge Capacity	4.17	cfs	See calculations below

*No spillway. Pit pump discharge only. Water will be contained in pit until discharged.

Flow Calculations
$$Q = \frac{1.49}{n} * A * R^{\frac{2}{3}} * S^{1/2}$$

Item	Value	
Flow - Trapezoidal Channel (Spillway)		
n = Manning Coefficent	0	(TDOT Table)
A = Cross Sectional Area	0.00	ft ²
P = Wetted Perimeter	0.00	ft
R = Hydraulic Radius	0	ft
S = Channel Slope	0	ft/ft
Q = Channel Flow	0	cfs
Flow - Pipe (If Applicable)		
n = Manning Coefficent	0.024	(TDOT Table)
A = Cross Sectional Area	1.40	ft ²
P = Wetted Perimeter	4.19	ft
R = Hydraulic Radius	0.33	ft
S = Pipe Slope	0.01	ft/ft
Q = Pipe Flow	4.17	cfs

Trapezoid (assuming full flow)

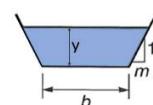
b = width = 0 ft

y = depth = 0 ft

m = slope = 0

A = 0 ft²

P = 0 ft



Pipe (assuming full flow)

Pipe diam. = 16 in

1.333333 ft

r = radius 0.666667 ft

A = 1.40 ft²

P = 4.18879 ft

TABLE 3-2
Time of Concentration Calculations
Drainage Area 2 - Outfall 001
From TDOT Design Division Drainage Manual

Sheet Flow		
Segment ID		N/A
Item	Reference	Value
1. Surface description	<i>TDOT Table</i>	Graveled Surface
2. n = Manning's avg. roughness coeff	<i>TDOT Table</i>	0.012
3. L = flow length	<i>Total</i>	300 <i>ft</i>
4. P₂ = 2 year, 24-hour rainfall	<i>NOAA Atlas 14 PF Data</i>	4.01 <i>in</i>
5. Land Slope (S)		
Min Elevation =		551 <i>ft</i>
Max Elevation =		627 <i>ft</i>
S =		0.25 <i>ft/ft</i>
6. Compute NRCS version t_t =	$t_t = \frac{0.007(nL)^{0.8}}{P_2^{0.5}S^{0.4}}$	0.017 <i>hr</i>
Shallow Concentrated Flow		
Segment ID		N/A
Item	Reference	Value
1. Surface description		Graveled Surface
2. L = flow length	<i>Longest distance</i>	300 <i>ft</i>
3. s = watercourse slope		
Min Elevation =		551 <i>ft</i>
Max Elevation =		627 <i>ft</i>
S =		0.25 <i>ft/ft</i>
4. V = average velocity	<i>Formula 4-7 or 4-8</i>	8.12 <i>ft/s</i>
5. Compute t_t =	$t_t = \frac{L}{3600 V}$	0.010 <i>hr</i>
Channel Flow (Drainage Ditch to Pond)		
Segment ID		N/A
Item	Reference	Value
1. a = cross sectional flow area		-- <i>ft²</i>
2. P_w = wetted perimeter		-- <i>ft</i>
3. r = hydraulic radius	$R = \frac{A}{P_w}$	-- <i>ft</i>
4. s = channel slope		
Min Elevation =		-- <i>ft</i>
Max Elevation =		-- <i>ft</i>
S =		-- <i>ft/ft</i>
5. n = Manning's roughness coeff	<i>TDOT Table</i>	
6. Compute V	$V = 1.49 r^{2/3} S^{1/2} / n$	-- <i>ft/s</i>
7. L = flow length		-- <i>ft</i>
8. Compute t_t =	$t_t = \frac{L}{3600 V}$	0.000 <i>hr</i>
Sub-area Tc = *		0.027 <i>hr</i>
		1.63 <i>min</i>

*if calculated to be < 5min, a minimum value of 5min should be used

TABLE 1-3
Runnoff and Storage Calculations
Drainage Area 3 - Quarry Pit Sump 2

	ft ²	Acres
Total Runoff Area	4,984,336	114.4
Distrubed Acreage	Gravel	989,495
	Overburden	842,463
	Brush / Woods	3,152,378
Cover Description	Soil Type (A, B, C, or D)	CN (TDOT Table)
Gravel	A	76
Overburden	A	76
Brush / Woods	A	35
STORM EVENT TYPE	Rainfall Amount (NOAA Atlas 14 PF Data)	
P = 10 YEAR - 24 HOUR	5.69 in	
Item	Equation	Value
CN_{weighted} = Weighted Curve Number	$CN_{weighted} = \frac{\sum (CN * Area)}{\sum (Area)}$	50.1
S = Potential Maximum Retention	$S = \frac{1000}{CN} - 10$	9.97 in
Q = Storm Runoff	$Q = \frac{[P - (0.2S)]^2}{P + 0.8S}$	1.00 in
V = Storm Runoff Volume	$V = Q * Area * \frac{1'}{12''}$	9.53 ac-ft
V_{sed} = Sediment Storage	$V_{sed} = 0.05' * distributed acreage$	1.1 ac-ft
V_{total} = Total Volume	$V_{total} = (V + V_{sed}) * \frac{43,560'}{1 ac}$	464,505 ft ³
V_{credit} = Credit for Multiple Ponds	$V_{credit} = 20\% * V_{total}$	0 ft ³
V_{required} = Volume Required	$V_{required} = V_{total} - V_{credit}$	464,505 ft³

	Stage (ft)	Area (ft ²)	Pond Storage (ft³)	
			Incremental	Cumulative
Approximate Quarry Pit Sump Storage	30	31,914	957,410	957,410
Approximate Lower Quarry Floor Storage	30	264,813	7,944,396	7,944,396
Approximate Total Pond Storage				8,901,806

TABLE 2-3
Pond Outfall Calculations
Drainage Area 3 - Outfall 002

	ft²	Acres	
Runoff Area	4,984,336	114.4	
Cover Description	Runoff Coeff. (TDOT Tables)	% of Area	Area
Gravel	0.5	20%	22.7 acres
Overburden	0.5	17%	19.3 acres
Forest / Brush	0.2	63%	72.4 acres
Duration (min)	25-Year Rainfall Intensity (NOAA Rainfall IDF)		
5	9.97		
10	7.30		
Item	Equation		Value
Tc = Time of Concentration	Calculated on Table 3-7		5.00 minutes
i ₂₅ = Rainfall Intensity	Interpolated from NOAA Rainfall IDF		9.97 in/hr
C = Runoff Coefficient	$C_{weighted} = \frac{\sum (C * Area)}{\sum(Area)}$		0.31
Q = Peak Flow (Rational Method)	$Q = CiA$		354.0 cfs

Spillway Design

	Spillway + Pipe Capacity		Source
Maximum Discharge Capacity	4.17	cfs	See calculations below

*No spillway. Pit pump discharge only. Water will be contained in pit until discharged.

Flow Calculations
$$Q = \frac{1.49}{n} * A * R^{\frac{2}{3}} * S^{1/2}$$

Item	Value	
Flow - Trapezoidal Channel (Spillway)		
n = Manning Coefficient	0	(TDOT Table)
A = Cross Sectional Area	0.00	ft ²
P = Wetted Perimeter	0.00	ft
R = Hydraulic Radius	0	ft
S = Channel Slope	0	ft/ft
Q = Channel Flow	0	cfs
Flow - Pipe (If Applicable)		
n = Manning Coefficient	0.024	(TDOT Table)
A = Cross Sectional Area	1.40	ft ²
P = Wetted Perimeter	4.19	ft
R = Hydraulic Radius	0.33	ft
S = Pipe Slope	0.01	ft/ft
Q = Pipe Flow	4.17	cfs

Trapezoid (assuming full flow)

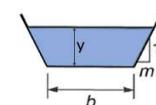
b = width = 0 ft

y = depth = 0 ft

m = slope = 0

A = 0 ft²

P = 0 ft



Pipe (assuming full flow)

Pipe diam. = 16 in

1.333333 ft

r = radius 0.666667 ft

A = 1.40 ft²

P = 4.18879 ft

TABLE 3-3
Time of Concentration Calculations
Drainage Area 3 - Outfall 002
From TDOT Design Division Drainage Manual

Sheet Flow		
Segment ID		N/A
Item	Reference	Value
1. Surface description	<i>TDOT Table</i>	Graveled Surface
2. n = Manning's avg. roughness coeff	<i>TDOT Table</i>	0.012
3. L = flow length	<i>Total</i>	300 <i>ft</i>
4. P₂ = 2 year, 24-hour rainfall	<i>NOAA Atlas 14 PF Data</i>	4.01 <i>in</i>
5. Land Slope (S)		
Min Elevation =		565 <i>ft</i>
Max Elevation =		638 <i>ft</i>
S =		0.24 <i>ft/ft</i>
6. Compute NRCS version t_t =	$t_t = \frac{0.007(nL)^{0.8}}{P_2^{0.5}S^{0.4}}$	0.017 <i>hr</i>
Shallow Concentrated Flow		
Segment ID		N/A
Item	Reference	Value
1. Surface description		Graveled Surface
2. L = flow length	<i>Longest distance</i>	300 <i>ft</i>
3. s = watercourse slope		
Min Elevation =		565 <i>ft</i>
Max Elevation =		638 <i>ft</i>
S =		0.24 <i>ft/ft</i>
4. V = average velocity	<i>Formula 4-7 or 4-8</i>	7.96 <i>ft/s</i>
5. Compute t_t =	$t_t = \frac{L}{3600V}$	0.010 <i>hr</i>
Channel Flow (Drainage Ditch to Pond)		
Segment ID		N/A
Item	Reference	Value
1. a = cross sectional flow area		-- <i>ft²</i>
2. P_w = wetted perimeter		-- <i>ft</i>
3. r = hydraulic radius	$R = \frac{A}{P_w}$	-- <i>ft</i>
4. s = channel slope		
Min Elevation =		-- <i>ft</i>
Max Elevation =		-- <i>ft</i>
S =		-- <i>ft/ft</i>
5. n = Manning's roughness coeff	<i>TDOT Table</i>	
6. Compute V	$V = 1.49 r^{2/3} S^{1/2} / n$	-- <i>ft/s</i>
7. L = flow length		-- <i>ft</i>
8. Compute t_t =	$t_t = \frac{L}{3600V}$	0.000 <i>hr</i>
Sub-area Tc = *		0.028 <i>hr</i>
		1.66 <i>min</i>

*if calculated to be < 5min, a minimum value of 5min should be used



NOAA Atlas 14, Volume 9, Version 2
Location name: Madison, Alabama, USA*
Latitude: 34.7444°, Longitude: -86.8597°
Elevation: 668 ft**
 * source: ESRI Maps
 ** source: USGS



POINT PRECIPITATION FREQUENCY ESTIMATES

Sanja Perica, Deborah Martin, Sandra Pavlovic, Ishani Roy, Michael St. Laurent, Carl Trypaluk, Dale Unruh, Michael Yekta, Geoffrey Bonnin

NOAA, National Weather Service, Silver Spring, Maryland

[PF tabular](#) | [PF graphical](#) | [Maps & aerials](#)

PF tabular

Duration	Average recurrence interval (years)									
	1	2	5	10	25	50	100	200	500	1000
5-min	0.398 (0.317-0.508)	0.466 (0.371-0.596)	0.583 (0.462-0.747)	0.684 (0.538-0.882)	0.831 (0.632-1.12)	0.949 (0.703-1.31)	1.07 (0.764-1.52)	1.20 (0.818-1.77)	1.38 (0.900-2.11)	1.52 (0.962-2.36)
10-min	0.583 (0.464-0.744)	0.683 (0.543-0.872)	0.854 (0.676-1.09)	1.00 (0.788-1.29)	1.22 (0.926-1.65)	1.39 (1.03-1.91)	1.57 (1.12-2.23)	1.76 (1.20-2.59)	2.02 (1.32-3.08)	2.23 (1.41-3.46)
15-min	0.711 (0.566-0.907)	0.833 (0.662-1.06)	1.04 (0.824-1.33)	1.22 (0.962-1.58)	1.48 (1.13-2.01)	1.69 (1.26-2.33)	1.91 (1.36-2.72)	2.14 (1.46-3.16)	2.46 (1.61-3.76)	2.72 (1.72-4.22)
30-min	1.03 (0.820-1.32)	1.21 (0.960-1.54)	1.51 (1.20-1.94)	1.77 (1.40-2.29)	2.15 (1.64-2.91)	2.46 (1.82-3.38)	2.77 (1.98-3.94)	3.11 (2.12-4.58)	3.57 (2.33-5.44)	3.93 (2.49-6.10)
60-min	1.40 (1.11-1.78)	1.62 (1.29-2.07)	2.01 (1.59-2.57)	2.34 (1.84-3.01)	2.81 (2.14-3.80)	3.19 (2.36-4.39)	3.59 (2.56-5.10)	4.00 (2.73-5.89)	4.57 (2.98-6.98)	5.02 (3.18-7.79)
2-hr	1.76 (1.42-2.22)	2.04 (1.64-2.57)	2.50 (2.00-3.17)	2.90 (2.31-3.69)	3.47 (2.67-4.63)	3.93 (2.94-5.34)	4.40 (3.17-6.17)	4.90 (3.37-7.11)	5.58 (3.68-8.39)	6.11 (3.91-9.36)
3-hr	2.02 (1.64-2.53)	2.33 (1.88-2.91)	2.83 (2.28-3.56)	3.27 (2.62-4.13)	3.89 (3.01-5.15)	4.39 (3.31-5.91)	4.90 (3.56-6.82)	5.44 (3.77-7.83)	6.17 (4.09-9.21)	6.75 (4.34-10.3)
6-hr	2.48 (2.03-3.06)	2.84 (2.32-3.52)	3.46 (2.81-4.29)	3.98 (3.22-4.97)	4.73 (3.70-6.17)	5.33 (4.05-7.07)	5.94 (4.35-8.14)	6.58 (4.60-9.34)	7.45 (4.99-11.0)	8.13 (5.29-12.2)
12-hr	2.95 (2.44-3.60)	3.40 (2.81-4.15)	4.16 (3.42-5.10)	4.81 (3.94-5.93)	5.74 (4.53-7.39)	6.48 (4.98-8.49)	7.24 (5.36-9.79)	8.03 (5.68-11.2)	9.11 (6.17-13.2)	9.95 (6.55-14.7)
24-hr	3.47 (2.90-4.18)	4.01 (3.35-4.83)	4.92 (4.09-5.94)	5.69 (4.70-6.92)	6.78 (5.41-8.61)	7.65 (5.95-9.90)	8.55 (6.40-11.4)	9.48 (6.78-13.1)	10.7 (7.36-15.4)	11.7 (7.80-17.1)
2-day	4.09 (3.46-4.86)	4.69 (3.96-5.58)	5.69 (4.78-6.79)	6.53 (5.46-7.84)	7.73 (6.23-9.66)	8.67 (6.81-11.0)	9.63 (7.29-12.7)	10.6 (7.68-14.5)	12.0 (8.30-16.9)	13.0 (8.76-18.7)
3-day	4.50 (3.83-5.30)	5.12 (4.35-6.05)	6.16 (5.22-7.30)	7.04 (5.92-8.38)	8.28 (6.71-10.3)	9.25 (7.31-11.7)	10.2 (7.79-13.3)	11.3 (8.18-15.2)	12.6 (8.80-17.6)	13.7 (9.27-19.5)
4-day	4.84 (4.13-5.67)	5.48 (4.68-6.44)	6.55 (5.57-7.72)	7.45 (6.30-8.83)	8.71 (7.10-10.7)	9.70 (7.71-12.2)	10.7 (8.19-13.9)	11.7 (8.57-15.7)	13.1 (9.18-18.2)	14.2 (9.65-20.1)
7-day	5.74 (4.95-6.65)	6.43 (5.54-7.47)	7.57 (6.50-8.82)	8.52 (7.27-9.98)	9.83 (8.08-11.9)	10.8 (8.69-13.4)	11.9 (9.16-15.2)	12.9 (9.51-17.1)	14.3 (10.1-19.5)	15.3 (10.5-21.4)
10-day	6.54 (5.68-7.54)	7.28 (6.30-8.39)	8.47 (7.31-9.80)	9.45 (8.11-11.0)	10.8 (8.92-13.0)	11.8 (9.54-14.5)	12.9 (9.98-16.3)	13.9 (10.3-18.2)	15.3 (10.8-20.7)	16.3 (11.2-22.6)
20-day	8.89 (7.80-10.1)	9.73 (8.53-11.1)	11.1 (9.68-12.7)	12.2 (10.6-14.0)	13.6 (11.4-16.1)	14.7 (12.0-17.8)	15.8 (12.4-19.6)	16.8 (12.6-21.7)	18.1 (13.0-24.2)	19.1 (13.3-26.1)
30-day	11.0 (9.68-12.3)	11.9 (10.5-13.5)	13.5 (11.8-15.2)	14.7 (12.8-16.7)	16.2 (13.6-19.0)	17.4 (14.3-20.8)	18.5 (14.6-22.7)	19.5 (14.7-24.9)	20.8 (15.0-27.4)	21.7 (15.3-29.4)
45-day	13.7 (12.2-15.3)	14.9 (13.2-16.7)	16.7 (14.8-18.7)	18.1 (15.9-20.4)	19.9 (16.8-23.0)	21.1 (17.4-24.9)	22.2 (17.6-27.0)	23.2 (17.7-29.3)	24.4 (17.8-31.9)	25.2 (17.9-33.8)
60-day	16.2 (14.4-18.0)	17.5 (15.7-19.5)	19.6 (17.5-21.9)	21.2 (18.8-23.8)	23.2 (19.6-26.6)	24.5 (20.3-28.7)	25.7 (20.5-31.0)	26.7 (20.6-33.3)	27.8 (20.7-35.9)	28.4 (20.8-37.9)

¹ Precipitation frequency (PF) estimates in this table are based on frequency analysis of partial duration series (PDS).

Numbers in parenthesis are PF estimates at lower and upper bounds of the 90% confidence interval. The probability that precipitation frequency estimates (for a given duration and average recurrence interval) will be greater than the upper bound (or less than the lower bound) is 5%. Estimates at upper bounds are not checked against probable maximum precipitation (PMP) estimates and may be higher than currently valid PMP values.

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PF graphical



NOAA Atlas 14, Volume 9, Version 2
Location name: Madison, Alabama, USA*
Latitude: 34.7444°, Longitude: -86.8597°
Elevation: 668 ft**

* source: ESRI Maps

** source: USGS



POINT PRECIPITATION FREQUENCY ESTIMATES

Sanja Perica, Deborah Martin, Sandra Pavlovic, Ishani Roy, Michael St. Laurent, Carl Trypaluk, Dale Unruh, Michael Yekta, Geoffrey Bonnin

NOAA, National Weather Service, Silver Spring, Maryland

[PF tabular](#) | [PF graphical](#) | [Maps & aerials](#)

PF tabular

Duration	Average recurrence interval (years)									
	1	2	5	10	25	50	100	200	500	1000
5-min	4.78 (3.80-6.10)	5.59 (4.45-7.15)	7.00 (5.54-8.96)	8.21 (6.46-10.6)	9.97 (7.58-13.5)	11.4 (8.44-15.7)	12.9 (9.17-18.3)	14.4 (9.82-21.2)	16.6 (10.8-25.3)	18.3 (11.5-28.3)
10-min	3.50 (2.78-4.46)	4.10 (3.26-5.23)	5.12 (4.06-6.56)	6.01 (4.73-7.75)	7.30 (5.56-9.88)	8.33 (6.17-11.5)	9.41 (6.71-13.4)	10.6 (7.19-15.6)	12.1 (7.91-18.5)	13.4 (8.45-20.7)
15-min	2.84 (2.26-3.63)	3.33 (2.65-4.26)	4.16 (3.30-5.34)	4.89 (3.85-6.30)	5.93 (4.52-8.03)	6.78 (5.02-9.33)	7.66 (5.46-10.9)	8.58 (5.84-12.6)	9.86 (6.43-15.0)	10.9 (6.88-16.9)
30-min	2.06 (1.64-2.63)	2.42 (1.92-3.09)	3.02 (2.39-3.87)	3.55 (2.79-4.57)	4.30 (3.27-5.82)	4.91 (3.64-6.76)	5.55 (3.95-7.89)	6.21 (4.23-9.15)	7.13 (4.65-10.9)	7.86 (4.97-12.2)
60-min	1.40 (1.11-1.78)	1.62 (1.29-2.07)	2.01 (1.59-2.57)	2.34 (1.84-3.01)	2.81 (2.14-3.80)	3.19 (2.36-4.39)	3.59 (2.56-5.10)	4.00 (2.73-5.89)	4.57 (2.98-6.98)	5.02 (3.18-7.79)
2-hr	0.882 (0.709-1.11)	1.02 (0.819-1.29)	1.25 (1.00-1.58)	1.45 (1.15-1.85)	1.74 (1.33-2.31)	1.97 (1.47-2.67)	2.20 (1.59-3.09)	2.45 (1.68-3.56)	2.79 (1.84-4.20)	3.06 (1.95-4.68)
3-hr	0.673 (0.545-0.843)	0.774 (0.625-0.969)	0.943 (0.759-1.18)	1.09 (0.871-1.38)	1.30 (1.00-1.71)	1.46 (1.10-1.97)	1.63 (1.18-2.27)	1.81 (1.25-2.61)	2.06 (1.36-3.07)	2.25 (1.44-3.41)
6-hr	0.414 (0.338-0.511)	0.475 (0.388-0.587)	0.577 (0.469-0.716)	0.665 (0.538-0.830)	0.790 (0.617-1.03)	0.889 (0.676-1.18)	0.991 (0.726-1.36)	1.10 (0.768-1.56)	1.24 (0.833-1.83)	1.36 (0.882-2.03)
12-hr	0.244 (0.202-0.298)	0.282 (0.233-0.344)	0.345 (0.284-0.423)	0.399 (0.326-0.492)	0.476 (0.376-0.613)	0.537 (0.413-0.704)	0.600 (0.444-0.812)	0.666 (0.471-0.933)	0.756 (0.512-1.10)	0.825 (0.543-1.22)
24-hr	0.144 (0.120-0.174)	0.167 (0.139-0.201)	0.204 (0.170-0.247)	0.236 (0.195-0.288)	0.282 (0.225-0.358)	0.318 (0.247-0.412)	0.356 (0.266-0.475)	0.394 (0.282-0.545)	0.447 (0.306-0.640)	0.488 (0.325-0.712)
2-day	0.085 (0.072-0.101)	0.097 (0.082-0.116)	0.118 (0.099-0.141)	0.136 (0.113-0.163)	0.160 (0.129-0.201)	0.180 (0.141-0.230)	0.200 (0.151-0.263)	0.221 (0.160-0.301)	0.249 (0.172-0.351)	0.271 (0.182-0.389)
3-day	0.062 (0.053-0.073)	0.071 (0.060-0.083)	0.085 (0.072-0.101)	0.097 (0.082-0.116)	0.114 (0.093-0.142)	0.128 (0.101-0.162)	0.142 (0.108-0.185)	0.156 (0.113-0.210)	0.175 (0.122-0.244)	0.190 (0.128-0.270)
4-day	0.050 (0.043-0.059)	0.057 (0.048-0.067)	0.068 (0.058-0.080)	0.077 (0.065-0.091)	0.090 (0.073-0.111)	0.101 (0.080-0.126)	0.111 (0.085-0.144)	0.122 (0.089-0.163)	0.136 (0.095-0.189)	0.147 (0.100-0.209)
7-day	0.034 (0.029-0.039)	0.038 (0.032-0.044)	0.045 (0.038-0.052)	0.050 (0.043-0.059)	0.058 (0.048-0.071)	0.064 (0.051-0.079)	0.070 (0.054-0.090)	0.076 (0.056-0.101)	0.084 (0.060-0.116)	0.091 (0.062-0.127)
10-day	0.027 (0.023-0.031)	0.030 (0.026-0.034)	0.035 (0.030-0.040)	0.039 (0.033-0.045)	0.045 (0.037-0.054)	0.049 (0.039-0.060)	0.053 (0.041-0.067)	0.057 (0.042-0.075)	0.063 (0.045-0.086)	0.067 (0.046-0.094)
20-day	0.018 (0.016-0.021)	0.020 (0.017-0.023)	0.023 (0.020-0.026)	0.025 (0.022-0.029)	0.028 (0.023-0.033)	0.030 (0.024-0.037)	0.032 (0.025-0.040)	0.035 (0.026-0.045)	0.037 (0.027-0.050)	0.039 (0.027-0.054)
30-day	0.015 (0.013-0.017)	0.016 (0.014-0.018)	0.018 (0.016-0.021)	0.020 (0.017-0.023)	0.022 (0.018-0.026)	0.024 (0.019-0.028)	0.025 (0.020-0.031)	0.027 (0.020-0.034)	0.028 (0.020-0.038)	0.030 (0.021-0.040)
45-day	0.012 (0.011-0.014)	0.013 (0.012-0.015)	0.015 (0.013-0.017)	0.016 (0.014-0.018)	0.018 (0.015-0.021)	0.019 (0.016-0.023)	0.020 (0.016-0.025)	0.021 (0.016-0.027)	0.022 (0.016-0.029)	0.023 (0.016-0.031)
60-day	0.011 (0.010-0.012)	0.012 (0.010-0.013)	0.013 (0.012-0.015)	0.014 (0.013-0.016)	0.016 (0.013-0.018)	0.017 (0.014-0.019)	0.017 (0.014-0.021)	0.018 (0.014-0.023)	0.019 (0.014-0.024)	0.019 (0.014-0.026)

¹ Precipitation frequency (PF) estimates in this table are based on frequency analysis of partial duration series (PDS).

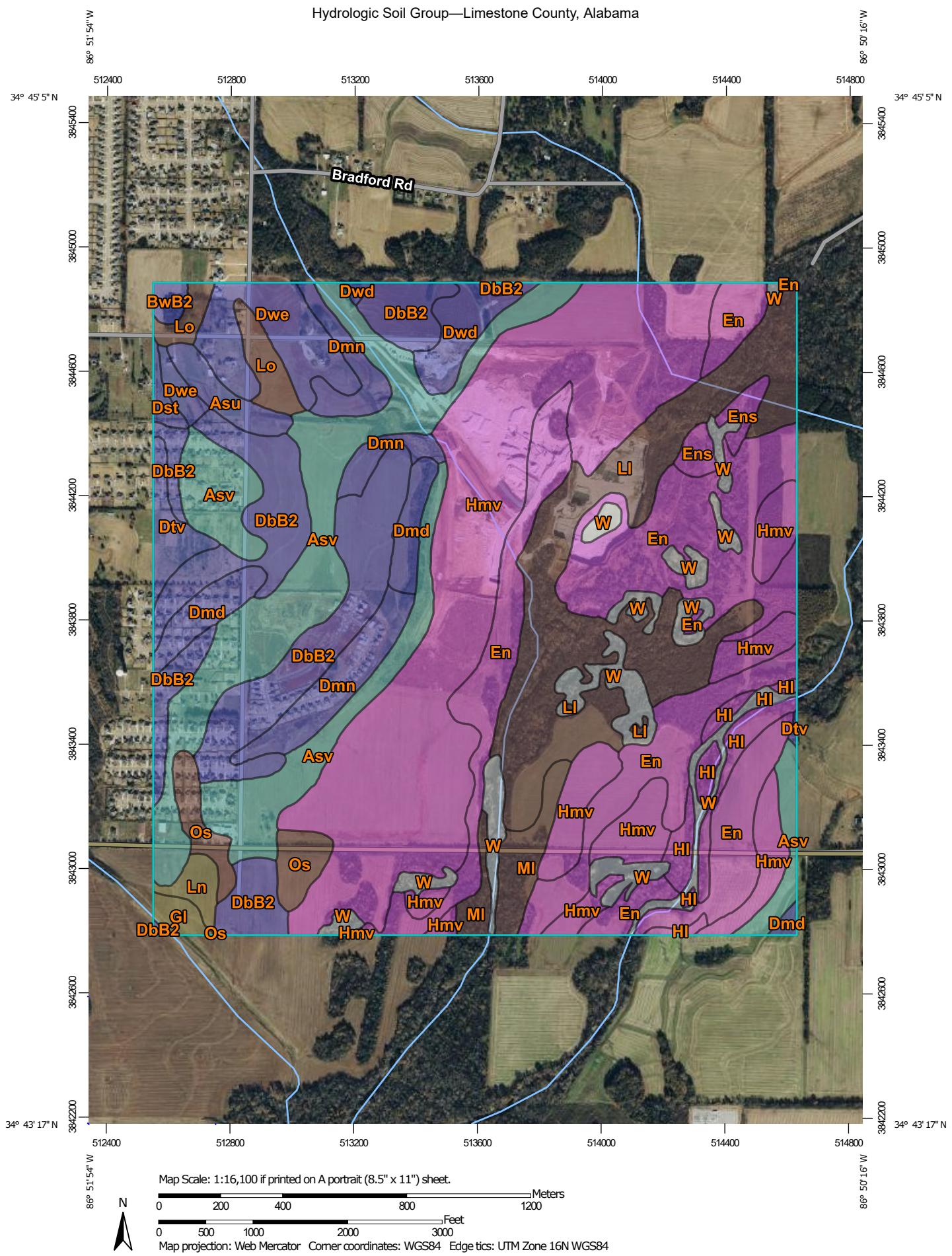
Numbers in parenthesis are PF estimates at lower and upper bounds of the 90% confidence interval. The probability that precipitation frequency estimates (for a given duration and average recurrence interval) will be greater than the upper bound (or less than the lower bound) is 5%. Estimates at upper bounds are not checked against probable maximum precipitation (PMP) estimates and may be higher than currently valid PMP values.

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PF graphical

Hydrologic Soil Group—Limestone County, Alabama



Map Scale: 1:16,100 if printed on A portrait (8.5" x 11") sheet.

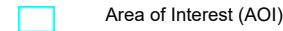
Meters

86

Natural Resources Conservation Service

Web Soil Survey
National Cooperative Soil Survey

1/30/2025
Page 1 of 4

MAP LEGEND**Area of Interest (AOI)****Soils****Soil Rating Polygons**

	A
	A/D
	B
	B/D
	C
	C/D
	D
	Not rated or not available

Soil Rating Lines

	A
	A/D
	B
	B/D
	C
	C/D
	D
	Not rated or not available

Soil Rating Points

	A
	A/D
	B
	B/D

	C
	C/D
	D
	Not rated or not available

Water Features

Streams and Canals

Transportation

Rails



Interstate Highways



US Routes



Major Roads



Local Roads

Background

Aerial Photography

MAP INFORMATION

The soil surveys that comprise your AOI were mapped at 1:20,000.

Please rely on the bar scale on each map sheet for map measurements.

Source of Map: Natural Resources Conservation Service

Web Soil Survey URL:

Coordinate System: Web Mercator (EPSG:3857)

Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts distance and area. A projection that preserves area, such as the Albers equal-area conic projection, should be used if more accurate calculations of distance or area are required.

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

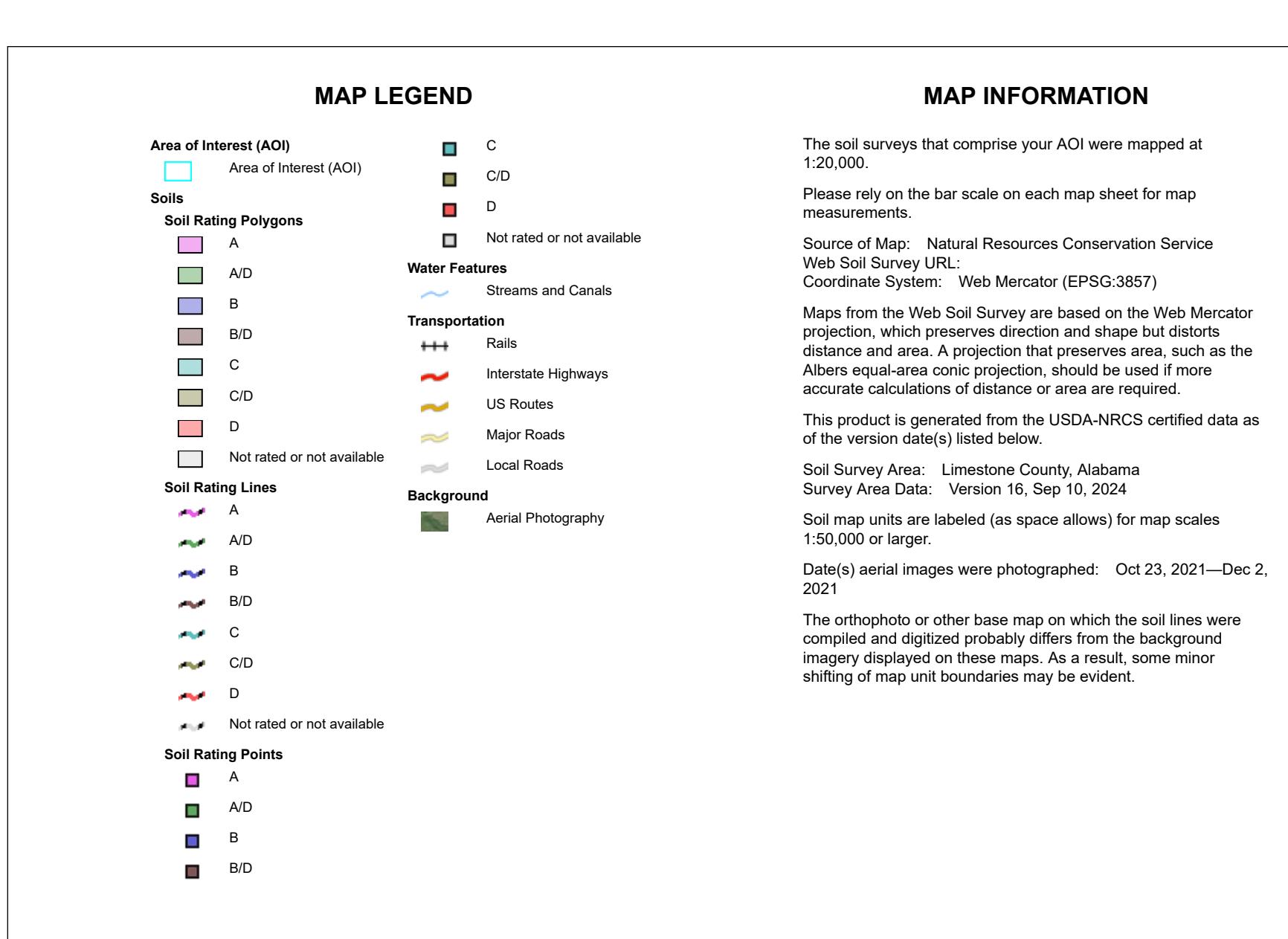
Soil Survey Area: Limestone County, Alabama

Survey Area Data: Version 16, Sep 10, 2024

Soil map units are labeled (as space allows) for map scales 1:50,000 or larger.

Date(s) aerial images were photographed: Oct 23, 2021—Dec 2, 2021

The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.



Hydrologic Soil Group

Map unit symbol	Map unit name	Rating	Acres in AOI	Percent of AOI
Asu	Emory-Abernathy silt loams, 0 to 6 percent slopes	B	10.0	0.9%
Asv	Abernathy-Emory silt loams, 0 to 2 percent slopes	C	143.5	13.2%
BwB2	Bewleyville silt loam, 2 to 5 percent slopes, moderately eroded	B	3.3	0.3%
DbB2	Decatur silty clay loam, 2 to 6 percent slopes, eroded	B	114.6	10.6%
Dmd	Decatur silty clay loam, 6 to 10 percent slopes, severely eroded	B	20.9	1.9%
Dmn	Decatur silty clay loam eroded rolling phase	B	37.9	3.5%
Dst	Dewey silt loam slightly eroded undulating phase	B	3.1	0.3%
Dtv	Decatur silt loam, 0 to 2 percent slopes	B	10.4	1.0%
Dwd	Dewey silty clay loam severely eroded rolling phase	B	14.8	1.4%
Dwe	Dewey silty clay loam, 2 to 6 percent slopes, eroded	B	32.7	3.0%
En	Ennis silt loam	A	175.7	16.2%
Ens	Ennis silt loam shallow phase	A	8.2	0.8%
Gl	Guthrie silt loam, 0 to 2 percent slopes, occasionally flooded	C/D	4.5	0.4%
Hl	Huntington silt loam	A	20.3	1.9%
Hmv	Humphreys silt loam level phase	A	262.3	24.2%
Li	Lindside silt loam	B/D	115.3	10.6%
Ln	Lawrence silt loam	C/D	6.0	0.6%
Lo	Lobelville silt loam, 0 to 3 percent slopes, occasionally flooded	B/D	13.6	1.3%
MI	Melvin silt loam	B/D	18.3	1.7%

Map unit symbol	Map unit name	Rating	Acres in AOI	Percent of AOI
Os	Ooltewah silt loam	B/D	17.4	1.6%
W	Water		51.0	4.7%
Totals for Area of Interest			1,083.9	100.0%

Description

Hydrologic soil groups are based on estimates of runoff potential. Soils are assigned to one of four groups according to the rate of water infiltration when the soils are not protected by vegetation, are thoroughly wet, and receive precipitation from long-duration storms.

The soils in the United States are assigned to four groups (A, B, C, and D) and three dual classes (A/D, B/D, and C/D). The groups are defined as follows:

Group A. Soils having a high infiltration rate (low runoff potential) when thoroughly wet. These consist mainly of deep, well drained to excessively drained sands or gravelly sands. These soils have a high rate of water transmission.

Group B. Soils having a moderate infiltration rate when thoroughly wet. These consist chiefly of moderately deep or deep, moderately well drained or well drained soils that have moderately fine texture to moderately coarse texture. These soils have a moderate rate of water transmission.

Group C. Soils having a slow infiltration rate when thoroughly wet. These consist chiefly of soils having a layer that impedes the downward movement of water or soils of moderately fine texture or fine texture. These soils have a slow rate of water transmission.

Group D. Soils having a very slow infiltration rate (high runoff potential) when thoroughly wet. These consist chiefly of clays that have a high shrink-swell potential, soils that have a high water table, soils that have a claypan or clay layer at or near the surface, and soils that are shallow over nearly impervious material. These soils have a very slow rate of water transmission.

If a soil is assigned to a dual hydrologic group (A/D, B/D, or C/D), the first letter is for drained areas and the second is for undrained areas. Only the soils that in their natural condition are in group D are assigned to dual classes.

Rating Options

Aggregation Method: Dominant Condition

Component Percent Cutoff: None Specified

Tie-break Rule: Higher

Table 2-2a Runoff curve numbers for urban areas^{1/}

Cover type and hydrologic condition	Cover description	Curve numbers for hydrologic soil group				
		A	B	C	D	
Fully developed urban areas (vegetation established)						
Open space (lawns, parks, golf courses, cemeteries, etc.) ^{3/} :						
Poor condition (grass cover < 50%)		68	79	86	89	
Fair condition (grass cover 50% to 75%)		49	69	79	84	
Good condition (grass cover > 75%)		39	61	74	80	
Impervious areas:						
Paved parking lots, roofs, driveways, etc. (excluding right-of-way)		98	98	98	98	
Streets and roads:						
Paved; curbs and storm sewers (excluding right-of-way)		98	98	98	98	
Paved; open ditches (including right-of-way)		83	89	92	93	
Gravel (including right-of-way)		76	85	89	91	
Dirt (including right-of-way)		72	82	87	89	
Western desert urban areas:						
Natural desert landscaping (pervious areas only) ^{4/}		63	77	85	88	
Artificial desert landscaping (impervious weed barrier, desert shrub with 1- to 2-inch sand or gravel mulch and basin borders)		96	96	96	96	
Urban districts:						
Commercial and business		85	89	92	94	
Industrial		72	81	88	91	
Residential districts by average lot size:						
1/8 acre or less (town houses)		65	77	85	90	
1/4 acre		38	61	75	83	
1/3 acre		30	57	72	81	
1/2 acre		25	54	70	80	
1 acre		20	51	68	79	
2 acres		12	46	65	77	
Developing urban areas						
Newly graded areas (pervious areas only, no vegetation) ^{5/}						
		77	86	91	94	
Idle lands (CN's are determined using cover types similar to those in table 2-2c).						

¹ Average runoff condition, and $I_a = 0.2S$.² The average percent impervious area shown was used to develop the composite CN's. Other assumptions are as follows: impervious areas are directly connected to the drainage system, impervious areas have a CN of 98, and pervious areas are considered equivalent to open space in good hydrologic condition. CN's for other combinations of conditions may be computed using figure 2-3 or 2-4.³ CN's shown are equivalent to those of pasture. Composite CN's may be computed for other combinations of open space cover type.⁴ Composite CN's for natural desert landscaping should be computed using figures 2-3 or 2-4 based on the impervious area percentage (CN = 98) and the pervious area CN. The pervious area CN's are assumed equivalent to desert shrub in poor hydrologic condition.⁵ Composite CN's to use for the design of temporary measures during grading and construction should be computed using figure 2-3 or 2-4 based on the degree of development (impervious area percentage) and the CN's for the newly graded pervious areas.

Table 2-2b Runoff curve numbers for cultivated agricultural lands ^{1/}

Cover type	Treatment ^{2/}	Cover description	Hydrologic condition ^{3/}	Curve numbers for hydrologic soil group			
				A	B	C	D
Fallow	Bare soil		—	77	86	91	94
	Crop residue cover (CR)		Poor	76	85	90	93
			Good	74	83	88	90
Row crops	Straight row (SR)		Poor	72	81	88	91
			Good	67	78	85	89
	SR + CR		Poor	71	80	87	90
			Good	64	75	82	85
	Contoured (C)		Poor	70	79	84	88
			Good	65	75	82	86
	C + CR		Poor	69	78	83	87
			Good	64	74	81	85
	Contoured & terraced (C&T)		Poor	66	74	80	82
			Good	62	71	78	81
Small grain	C&T+ CR		Poor	65	73	79	81
			Good	61	70	77	80
	SR		Poor	65	76	84	88
			Good	63	75	83	87
	SR + CR		Poor	64	75	83	86
			Good	60	72	80	84
	C		Poor	63	74	82	85
			Good	61	73	81	84
	C + CR		Poor	62	73	81	84
			Good	60	72	80	83
Close-seeded or broadcast legumes or rotation meadow	C&T		Poor	61	72	79	82
			Good	59	70	78	81
	C&T+ CR		Poor	60	71	78	81
			Good	58	69	77	80
	SR		Poor	66	77	85	89
			Good	58	72	81	85
C			Poor	64	75	83	85
			Good	55	69	78	83
C&T			Poor	63	73	80	83
			Good	51	67	76	80

^{1/} Average runoff condition, and $I_a=0.2S$ ^{2/} Crop residue cover applies only if residue is on at least 5% of the surface throughout the year.^{3/} Hydraulic condition is based on combination factors that affect infiltration and runoff, including (a) density and canopy of vegetative areas, (b) amount of year-round cover, (c) amount of grass or close-seeded legumes, (d) percent of residue cover on the land surface (good $\geq 20\%$), and (e) degree of surface roughness.

Poor: Factors impair infiltration and tend to increase runoff.

Good: Factors encourage average and better than average infiltration and tend to decrease runoff.

Table 2-2c Runoff curve numbers for other agricultural lands ^{1/}

Cover type	Cover description	Hydrologic condition	Curve numbers for hydrologic soil group			
			A	B	C	D
Pasture, grassland, or range—continuous forage for grazing. ^{2/}	Poor	68	79	86	89	
	Fair	49	69	79	84	
	Good	39	61	74	80	
Meadow—continuous grass, protected from grazing and generally mowed for hay.	—	30	58	71	78	
Brush—brush-weed-grass mixture with brush the major element. ^{3/}	Poor	48	67	77	83	
	Fair	35	56	70	77	
	Good	30 ^{4/}	48	65	73	
Woods—grass combination (orchard or tree farm). ^{5/}	Poor	57	73	82	86	
	Fair	43	65	76	82	
	Good	32	58	72	79	
Woods. ^{6/}	Poor	45	66	77	83	
	Fair	36	60	73	79	
	Good	30 ^{4/}	55	70	77	
Farmsteads—buildings, lanes, driveways, and surrounding lots.	—	59	74	82	86	

¹ Average runoff condition, and $I_a = 0.2S$.

² *Poor*: <50% ground cover or heavily grazed with no mulch.

Fair: 50 to 75% ground cover and not heavily grazed.

Good: >75% ground cover and lightly or only occasionally grazed.

³ *Poor*: <50% ground cover.

Fair: 50 to 75% ground cover.

Good: >75% ground cover.

⁴ Actual curve number is less than 30; use CN = 30 for runoff computations.

⁵ CN's shown were computed for areas with 50% woods and 50% grass (pasture) cover. Other combinations of conditions may be computed from the CN's for woods and pasture.

⁶ *Poor*: Forest litter, small trees, and brush are destroyed by heavy grazing or regular burning.

Fair: Woods are grazed but not burned, and some forest litter covers the soil.

Good: Woods are protected from grazing, and litter and brush adequately cover the soil.

Surface Type and Condition ^{1,2}	Runoff Coefficient (C)
Rural Areas	
Concrete or sheet asphalt pavement _____	0.8 - 0.9
Asphalt macadam pavement _____	0.6 - 0.8
Gravel roadways or shoulders _____	0.4 - 0.6
Bare earth _____	0.2 - 0.9
Steep grassed areas (2H:1V) _____	0.5 - 0.7
Turf meadows _____	0.1 - 0.4
Forested areas _____	0.1 - 0.3
Cultivated fields _____	0.2 - 0.4
Urban Areas	
Flat residential, with about 30 percent of area impervious _____	0.40
Flat residential, with about 60 percent of area impervious _____	0.55
Moderately steep residential, with about 50 percent of area impervious _____	0.65
Moderately steep developed area, with about 70 percent of area impervious _____	0.80
Flat commercial/industrial, with about 90 percent of area impervious _____	0.80

¹For flat slopes and/or permeable soil, use the lower values. For steep slopes and/or impermeable soil, use the higher values.

²For areas where there is a shallow bedrock surface, use the higher values.

Table 4-2
Runoff Coefficients (C) for Use in the Rational Method
 Reference: USDOT, FHWA, HDS-4 (2001)

4.04.1.2 INTENSITY

Rainfall intensity (I) is the average rainfall rate (in/hr) for a duration equal to the time of concentration for a selected return period. Once a particular return period has been selected for design, and the time of concentration calculated for the drainage area, the rainfall intensity can be determined from Rainfall Intensity Duration Frequency (IDF) Curves. To view the IDF curves and the rainfall intensity data, navigate to the following link and follow the [IDF Curve Guide](#):

<https://hdsc.nws.noaa.gov/hdsc/pfds/>

on mowing practices and channel lining material for when the greatest likelihood of heavy rainfall would occur. For areas that are or will be infrequently mowed, tall grass should be considered.

Surface Type	Minimum	Normal	Maximum
Concrete	0.010	0.011	0.013
Asphalt	0.010	0.012	0.015
Bare Soil	0.010	0.011	0.030
Bare Sand	0.010	0.010	0.016
Graveled Surface	0.011	0.012	0.030
Bare Clay-Loam (eroded)	0.012	0.020	0.033
Packed Clay		0.030	
Fallow (no residue)	0.006	0.050	0.160
Cultivated (till) (residue \leq 20%)	0.006	0.060	0.120
Cultivated (till) (residue > 20%)	0.070	0.170	0.470
No Till (no residue)	0.030	0.040	0.100
No Till (20% - 40% residue)	0.010	0.070	0.170
No Till (>60% residue)	0.016	0.300	0.470
Plow (fall)	0.020	0.020	0.100
Range (natural)	0.100	0.130	0.320
Pasture	0.300	0.350	0.400
Pasture (sparse vegetation)	0.053	0.070	0.130
Grass (bluegrass sod)	0.390	0.450	0.630
Grass (Bermuda)	0.300	0.410	0.480
Lawns	0.200	0.250	0.300
Woods and Shrubbery	0.400	0.400	0.800

Table 4-3
Manning's n Values for Overland Flow

Table References:

American Society of Civil Engineers and Water Environment Federation. *Design and Construction of Urban Stormwater Management Systems*. ASCE Manuals and Reports of Engineering Practice No. 77 and WEF Manual of Practice FD-20. New York, New York and Alexandria, Virginia. 1992.

Indiana Department of Transportation. Indiana Design Manual Part IV Volume I. Indianapolis, IN. 1999.

Kentucky Transportation Cabinet, Drainage Guidance Manual - Proposed Revisions. Frankfort, KY. September 29, 2000.

Metropolitan Government of Nashville and Davidson County Department of Public Works Engineering Division. *Stormwater Management Manual*. Nashville, Tennessee. Sept. 1999.

United States Department of Agriculture. Soil Conservation Service. Engineering Division. *Urban Hydrology for Small Watersheds - Technical Release 55*. June 1996.

Virginia Department of Transportation. *Drainage Manual*. Richmond, Virginia. February 1989.

NRCS Runoff Method for Sheet Flow

The NRCS Runoff method for calculating sheet flow is applicable to depths of approximately 0.1 foot (1.2 inches) or less. As with the Kinematic Wave Theory, the Manning's *n* value is taken from Table 4-3 which has been developed for shallow flow depths. Equation 4-6 is used to compute the travel time used in the NRCS runoff method.

$$t_t = \frac{0.007(nL)^{0.8}}{P_{2-24}^{0.5}S^{0.4}} \quad (4-6)$$

Where: t_t = sheet flow travel time, (hr)
n = Manning sheet flow roughness coefficient (see Table 4-3)
L = sheet flow length, (ft)
P₂₋₂₄ = 2-year, 24-hour rainfall, (in) (see Table 4A-5)
S = slope of hydraulic grade line, assumed to be the surface, (ft/ft)

Note: *P₂₋₂₄* should be used in this equation even if the design storm under investigation for determining the peak discharge is for a different return period.

4.04.1.3.1.2 TRAVEL TIME – SHALLOW CONCENTRATED FLOW

After sheet flow, the water usually becomes shallow concentrated flow. The shallow concentrated flow normally has a depth greater than 0.1 feet (1.2 inches). After some distance, the shallow concentrated flow further concentrates to a ditch, gutter, channel, or drainage structure. Once the water has reached a more concentrated flow such as in a gutter, pipe, or channel, the travel time in the channel will be calculated and added to the overland flow travel time. If a shallow concentrated flow time is required, then the nomograph found in the chapter appendix as Figure 4A-1 should be used to approximate this travel time. Alternately, the designer may use the equations represented by this nomograph. Equations 4-7 and 4-8 are based on Manning's equation with assumptions for Manning's roughness coefficient and hydraulic radius which will permit a calculation of an average shallow concentrated flow velocity. The assumptions include, for unpaved areas, a Manning's *n*-value equal to 0.05 and a hydraulic radius equal to 0.4 feet; and for paved areas, a Manning's *n*-value equal to 0.025 and hydraulic radius equal to 0.2 feet. Once the velocity is known, travel time can be calculated using Equation 4-3.

$$V_{unpaved} = 16.1345(S)^{0.5} \quad (4-7)$$

$$V_{paved} = 20.3282(S)^{0.5} \quad (4-8)$$

Where: V = average velocity, (ft/s)
S = slope of hydraulic grade line, assumed to be watercourse slope, (ft/ft)

Type of Channel and Description	Minimum	Normal	Maximum
LINED CHANNELS (Selected Linings)			
a. Concrete			
Trowel Finish	0.011	0.013	0.015
Float Finish	0.013	0.015	0.016
Gunite, good section	0.016	0.019	0.023
b. Asphalt			
Smooth	0.013	0.013	-
Rough	0.016	0.016	-
EXCAVATED OR DREDGED			
a. Earth, straight and uniform			
Clean, recently completed	0.016	0.018	0.020
Clean, after weathering	0.018	0.022	0.025
Gravel, uniform section, clean	0.022	0.025	0.030
With short grass, few weeds	0.022	0.027	0.033
b. Earth, winding and sluggish			
No vegetation	0.023	0.025	0.030
Grass, some weeds	0.025	0.030	0.033
Dense weeds or aquatic plants in deep channels	0.030	0.035	0.040
Earth bottom and rubble sides	0.025	0.030	0.035
Stony bottom and weedy sides	0.025	0.035	0.045
Cobble bottom and clean sides	0.030	0.040	0.050
c. Dragline excavated or dredged			
No vegetation	0.025	0.028	0.033
Light brush on banks	0.035	0.050	0.060
d. Rock Cuts			
Smooth and uniform	0.025	0.035	0.040
Jagged and irregular	0.035	0.040	0.050
e. Channels not maintained, uncut weeds and brush			
Dense weeds as high as flow depth	0.050	0.080	0.120
Clean bottom, brush on sides	0.040	0.050	0.080
Same, highest stage of flow	0.045	0.070	0.110
Dense brush, high stage	0.800	0.100	0.140

NATURAL STREAMS

1. Minor streams (top width at flood stage<100 ft)

a. Streams on Plain			
1. Clean, straight, full stage, no rifts or deep pools	0.025	0.030	0.033
2. Same as above, but more stones and weeds	0.030	0.035	0.040
3. Clean, winding, some pools and shoals	0.033	0.040	0.045
4. Same as above, but some weeds and stones	0.035	0.045	0.050
5. Same as above, lower stages, more ineffective slopes and sections	0.040	0.048	0.055

Table 5A-1
Values of Roughness
Coefficient 'n' (Uniform Flow)
 Reference: Chow, Ven T., *Open Channel Hydraulics* (1959)
Continue on following page

6. Same as 4, but more stones	0.045	0.050	0.060
7. Sluggish reaches, weedy, deep pools	0.050	0.070	0.080
8. Very weedy reaches, deep pools, or floodways with heavy stand of timber and underbrush	0.075	0.100	0.150
b. Mountain streams, no vegetation in channel, banks usually steep, trees and brush along banks submerged at high stages			
1. Bottom: gravels, cobbles and few boulders	0.030	0.040	0.050
2. Bottom: cobbles with large boulders	0.040	0.050	0.070
2. Floodplains			
a. Pasture, no brush			
1. Short grass	0.025	0.030	0.035
2. High grass	0.030	0.035	0.050
b. Cultivated area			
1. No crop	0.020	0.030	0.040
2. Mature row crops	0.025	0.035	0.045
3. Mature field crops	0.030	0.040	0.050
c. Brush			
1. Scattered brush, heavy weeds	0.035	0.050	0.070
2. Light brush and trees, in winter	0.035	0.050	0.060
3. Light brush and trees, in summer	0.040	0.060	0.080
4. Medium to dense brush, in winter	0.045	0.070	0.110
5. Medium to dense brush, in summer	0.070	0.100	0.160
b. Trees			
1. Dense willows, summer, straight	0.110	0.150	0.200
2. Cleared land with tree stumps, no sprouts	0.030	0.040	0.050
3. Same as 2, but with heavy growth of sprouts	0.050	0.060	0.080
4. Heavy stand of timber, a few down trees, little undergrowth, flood stage below branches	0.080	0.100	0.120
5. Same as 4, but with flood stage reaching branches	0.100	0.120	0.160
3. Major Streams (top width at flood stage > 100 ft)			
The n-value is less than that for minor streams of similar description, because banks offer less effective resistance.			
a. Regular section with no boulders or brush	0.025	-	0.060
b. Irregular and rough section	0.035	-	0.100

Table 5A-1 (continued)
 Values of Roughness
 Coefficient 'n' (Uniform Flow)
 Reference: Chow, Ven T., *Open Channel Hydraulics* (1959)

Pipe Material	n-Value
Reinforced Concrete (pipe, elliptical or box)	0.013
HDPE or PP with smooth liner	0.013
HDPE, unlined	0.024
PVC, all types	0.013
Corrugated Metal	0.024
Steel Reinforced Thermoplastic Ribbed	0.013
Spiral Rolled Corrugated Metal	0.024

Table 7-9
Manning's n-Values for Storm Sewer Pipes

7.04.5.2 DISCHARGE COMPUTATIONS FOR PIPE SIZING

Computations to determine design flow rates should be based on the Rational Method as described in Section 4.04.1 of this Manual. Because these computations are performed in tandem with pipe sizing computations, they will proceed from the upstream end of the storm drainage system and continue downstream to the outlet. At each point in the system, the drainage area, A, served by the specific inlet is determined, along with the runoff coefficient, C. These two values are multiplied to determine the parameter "CA" which, is then added to the total "CA" values computed at all of the upstream inlets. The total flow time from the beginning of the system to the point of interest is then computed, and this flow time is used to determine a value of rainfall intensity from either the 10-year or the 50-year IDF curves for that location. This is multiplied by the total of the "CA" values to determine the design discharge for that site.

The specific procedure for determining flow rates will be as follows:

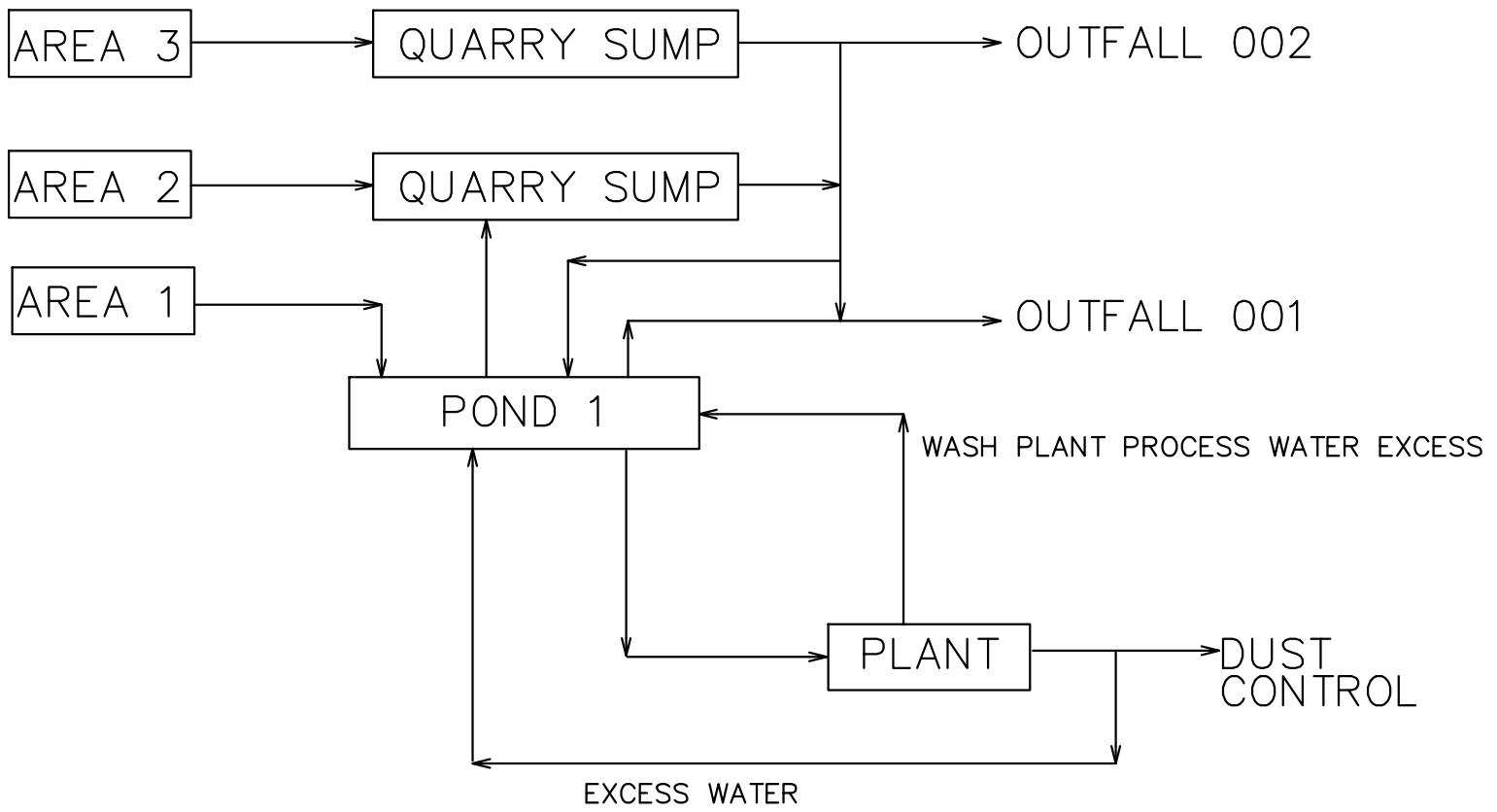
Step 1: For the most upstream catch basin in the system, determine:

- the drainage area, A_r , runoff coefficient, C_r , and time of concentration, T_{Cr} , for the roadway
- the drainage area, A_o , runoff coefficient, C_o , and time of concentration, T_{Co} , for any off-site runoff to that catch basin

Step 2: Compute "Sum CA" for the catch basin as:

$$\Sigma CA = C_r A_r + C_o A_o \quad (7-32)$$

Step 3: Determine the time of concentration, T_c , for the first catch basin as the longest of T_{Cr} , T_{Co} and 5 minutes. Determine the rainfall intensity, i , corresponding to the time of concentration from either the 10-year or the 50-year IDF-curves which apply to the project site.



6/8/18	MODIFICATION	
12/19/19	MODIFICATION	DATE 8/8/18
6/5/20	MODIFICATION	SCALE NTS
9/30/20	MODIFICATION	LOCATION WEST HUNTSVILLE QUARRY, MADISON COUNTY, AL
2/3/25	RENEWAL	DESIGNED
		TITLE WATER FLOW SCHEMATIC
		DRAIN ASR
		REVISION
		DESCRIPTION
		CHECKED
		EMK

ROGERS GROUP, INC.
421 GREAT CIRCLE ROAD, NASHVILLE, TN 37228
WEST HUNTSVILLE QUARRY, MADISON COUNTY, AL
WATER FLOW SCHEMATIC
FILE AL0083089 SHEET NO. 1 OF 1

CO RD 32

GRAY ROAD

CO RD 95

CONCRETE
PLANT

OFFICE
SCALES
FUEL
TANK

YARD AREA

AREA 1

AREA 2

CRUSHING PLANT

ACTIVE MINE

POND 1

AREA 2

AREA 3

SUMP 2

33

ACTIVE MINE

OUTFALL 001

OUTFALL 002

OUTFALL 003

OUTFALL 004

OUTFALL 005

OUTFALL 006

OUTFALL 007

OUTFALL 008

OUTFALL 009

OUTFALL 0010

OUTFALL 0011

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OUTFALL 00397

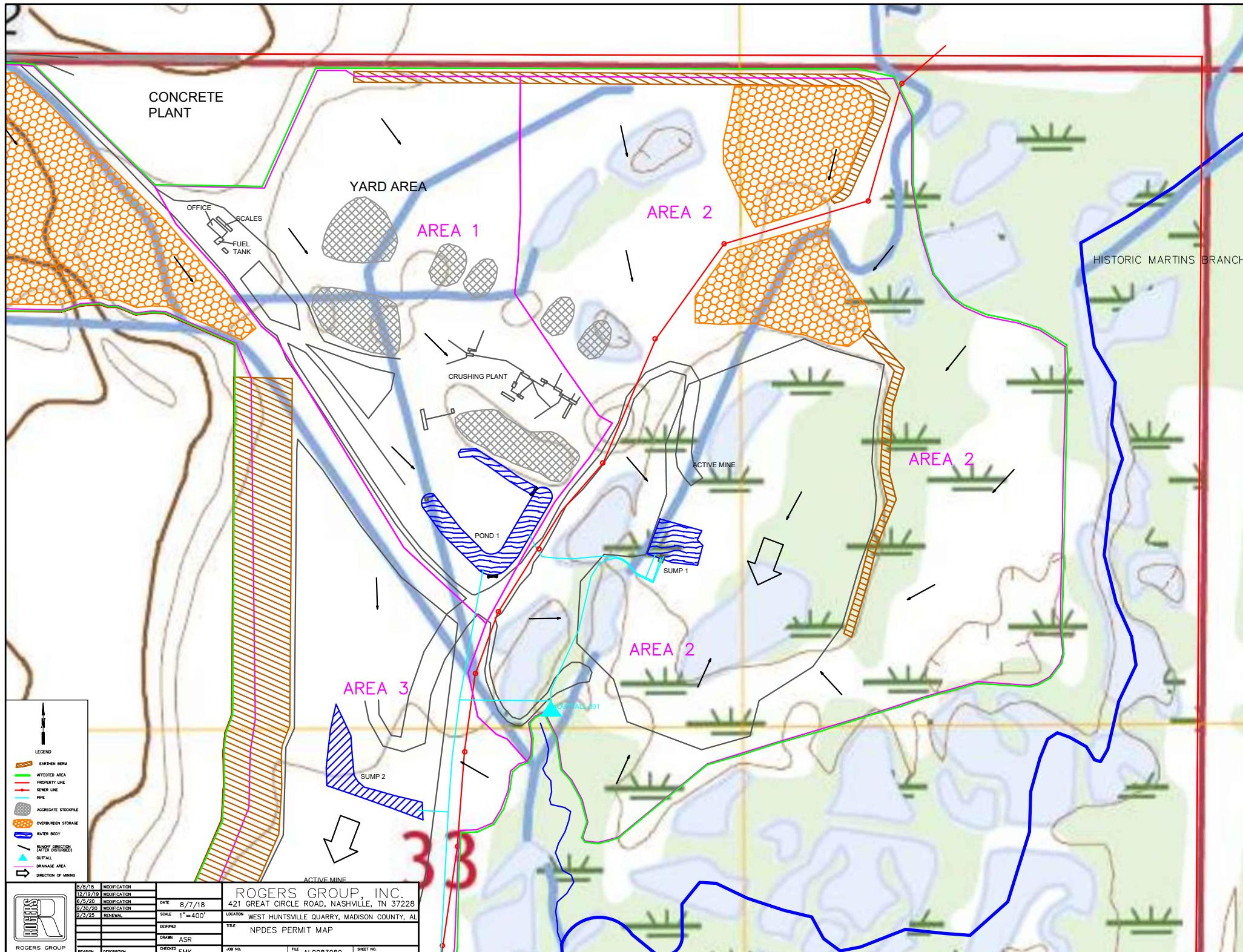
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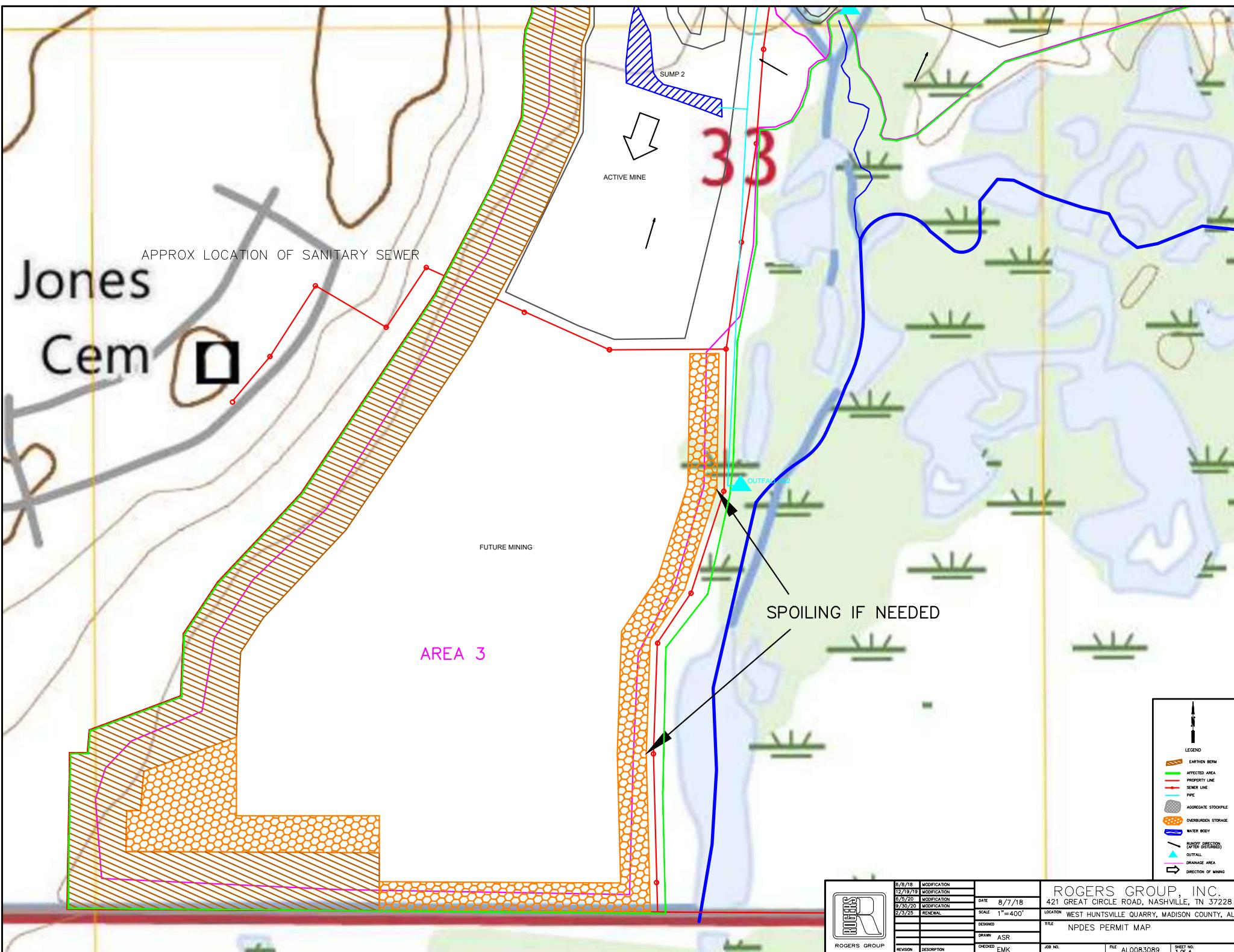
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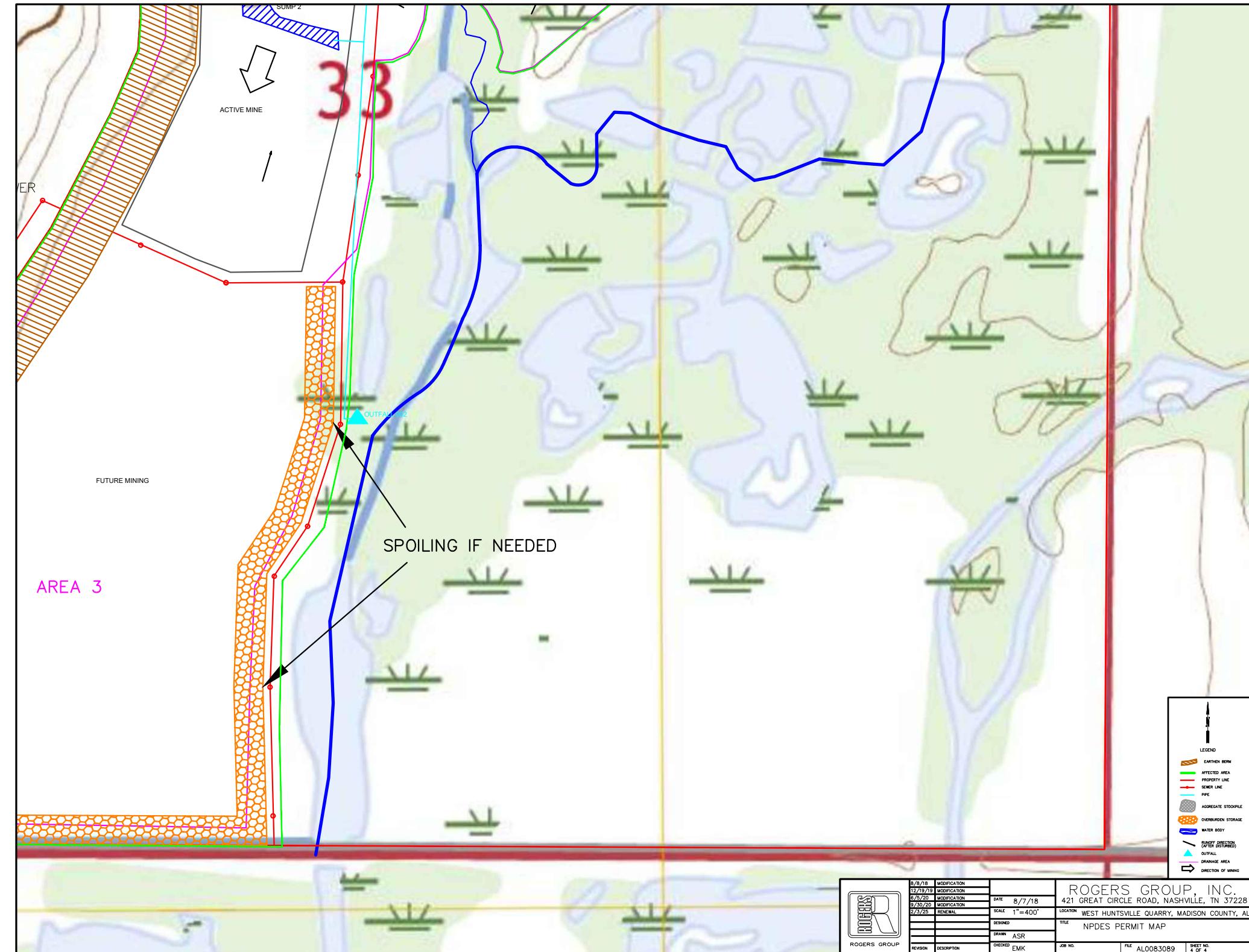
OUTFALL 00403

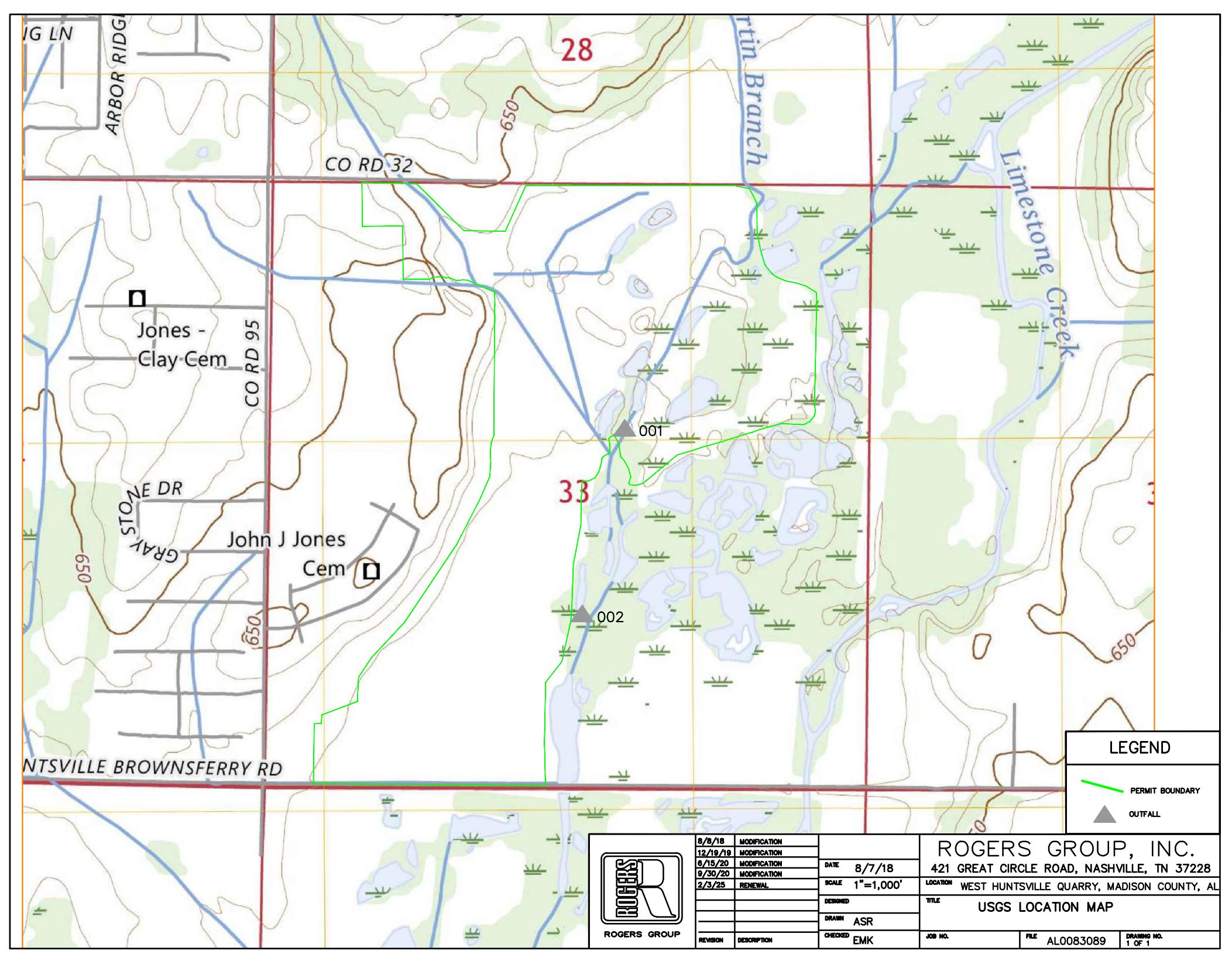
OUTFALL 00405

OUTFALL 0









Storm Water Pollution Prevention / Spill Prevention Control & Countermeasures Plan		
Issue Date: November 2017	Revision No.: N/A	Revision Date: N/A
Prepared By: RGI OSS	Location: Madison, Alabama	Authorized By: Van Medlock

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Prepared By: RGI OSS	Location: Madison, Alabama	Authorized By: Van Medlock

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- 6. Spill Countermeasures**
- 7. Reporting and Notification**
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- 4. Corrective Action**
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VII. WATER PERMIT

VIII. EXTRACTION PERMIT

Storm Water Pollution Prevention / Spill Prevention Control & Countermeasures Plan		
Issue Date: November 2017	Revision No.: 3	Revision Date: September 2019
Prepared By: RGI OSS	Location: Madison, Alabama	Authorized By: Van Medlock

Certification

The management team of Rogers Group, Inc. has reviewed the results of the compliance audit and certifies that this SWPPP/SPCC plan as written has been fully implemented. The measures taken in accordance with this plan provide reasonable safeguards against the accidental spill or discharge of harmful quantities of oil and other pollutants into the navigable waters of the State of Alabama.

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 gathered and evaluated 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:

Name:

Erik Knowles

Title:

Environmental Manager

Date:

Storm Water Pollution Prevention / Spill Prevention Control & Countermeasures Plan		
Issue Date: November 2017	Revision No.: 3	Revision Date: September 2019
Prepared By: RGI OSS	Location: Madison, Alabama	Authorized By: Van Medlock

Non-Storm Discharge Certification

The facilities operated by West Huntsville Quarry, located at Gray Road Madison, Alabama, have been evaluated and the results of the evaluation have been documented. The completed evaluation sheet is filed in the Risk Assessment section of this plan. Piping drawings for the existing system are reasonably accurate and reflect the system as installed. There are no known piping modifications relative to those drawings that would enable the bypassing of process wastewater or sanitary waste into the storm water discharge system.

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 gathered and evaluated 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.

Printed Name: Erik Knowles

Title: Environmental Manager

Signature: _____

Date: _____

Storm Water Pollution Prevention / Spill Prevention Control & Countermeasures Plan		
Issue Date: November 2017	Revision No.: 2	Revision Date: June 2023
Prepared By: RGI OSS	Location: Madison, Alabama	Authorized By: Theron Binford

1 DOCUMENT MANAGEMENT

This section contains basic information about how this SWPP/SPCC Plan is managed.

1.1 Plan Distribution

This plan will be distributed as follows:

<u>Control Number</u>	<u>Recipient</u>	<u>Person</u>
1	Plant Manager	Oliver Dash
2	Area Production Manager	Jacob Hinton
3	Environmental Manager	Tony Russo

If additional copies are issued or if personnel changes are made, this list must be updated.

1.2 Plan Availability

The plant copy of the plan, which is in the main office, will be used to verify plan implementation. This copy will be kept current and must contain completed forms and other records as required by the plan.

Employees, and appropriate government representatives, may review the plan during normal working hours (8:00 AM – 3:00 PM, Monday-Friday). The general public may inspect this copy of the plan only with the approval of the Plant Manager or the Environmental Engineer.

1.3 Plan Structure

The plan is divided into 10 major categories:

- I. Plan Certifications
- II. Document Management
- III. Facility Information
- IV. Procedures
- V. Programs
- VI. Air Permit
- VII. Water Permit
- VIII. Ground Water Protection Plan
- IX. Storm Water Inspection Report

It may become necessary to add information to the plan as part of normal plan maintenance or due to regulatory changes. If new information does not fit into one of the existing tabs, add a new tab as necessary in the appropriate section.

1.4 Plan Maintenance

Storm Water Pollution Prevention / Spill Prevention Control & Countermeasures Plan		
Issue Date: November 2017	Revision No.: 2	Revision Date: June 2023
Prepared By: RGI OSS	Location: Madison, Alabama	Authorized By: Theron Binford

The primary responsibility for maintenance of this plan lies with the Pollution Prevention Team. The plan must be revised as necessary to reflect changes in plant operation and to assure compliance with local, state and federal regulations.

However, any Rogers Group, Inc. employee may request a change in the plan by submitting a Corrective Action Request Form to the Pollution Prevention Team Leader. See Tab IV (Procedures), Section 8 (Plan Revision), for additional information.

If there are facility changes affecting the SWPPP/SPCCP, the Plan will be revised and amended within 14 days of the event. Facility modifications must be completed within twelve weeks of the date of inspection or spill.

The plan will be reviewed, revised as necessary, and reissued every third year from the date of issue.

Storm Water Pollution Prevention / Spill Prevention Control & Countermeasures Plan		
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FACILITY INFORMATION

1 BUSINESS INFORMATION

1.1 Facility Location

The West Huntsville Quarry facility of Rogers Group, Inc. is located at Gray Road, Madison, Alabama. The facility mailing address is:

West Huntsville Quarry
26024 Newby Road
Madison, AL 35756

1.2 Ownership

Rogers Group, Inc. is a privately held company.

The home office mailing address is:

Rogers Group, Inc.
321 Great Circle Road
Nashville, TN 37228

1.3 Industrial Activity

The West Huntsville Quarry facility quarries, crushes, sizes, and stockpiles limestone for sale as construction aggregate.

1.4 SIC Codes

1422 – Crushed & broken limestone

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2 FACILITY DESCRIPTION

2.1 Location

The manufacturing site owned and operated by Rogers Group, Inc. is located in Limestone County, at Gray Road, near Madison, Alabama.

2.2 Site Description

The site layout and drainage map gives the location of important materials, storage tanks, settling ponds, and the crushing plant. This map also indicates drainage over the site.

2.3 Buildings and Structure

Buildings on site include an office, QC Lab, and various storage facilities. Primary structures include the crushing process equipment.

Plot Plan

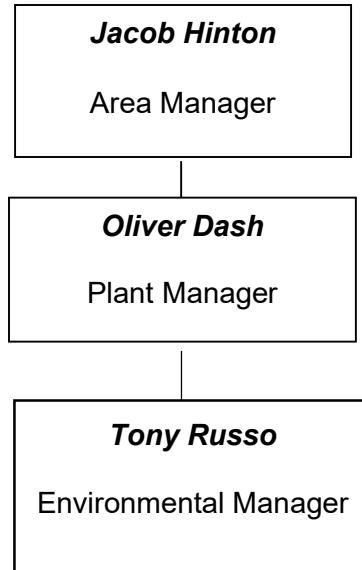
Attached is the current approved permit map showing permitted discharge points and area treatment structures associated with surface operation. The location of storage tanks and shop areas are also designated.

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3 MANAGEMENT STRUCTURE & RESPONSIBILITIES

3.1 West Huntsville Quarry Chain of Command

The following organization chart shows the management structure at the West Huntsville Quarry:



Refer to the facility organizational chart for the current personnel assignments.

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3.2 Storm Water Pollution Prevention Team

West Huntsville Quarry has formed a Storm Water Pollution Prevention Team which is responsible for implementation and maintenance of this plan in addition to other duties that may be assigned. The team is a combination of management and supervisory personnel

The Team Leader serves as the coordinator for the SWPP/SPCC Plan.

Storm Water Pollution Prevention Team members are:

Oliver Dash, <i>Plant Manager</i>	Team Leader
Jacob Hinton, <i>Area Manager</i>	Team Member
Tony Russo, <i>Environmental Specialist</i>	Team Member

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3.3 Responsibilities

3.3.1 Environmental Manager, Rogers Group, Inc.

The responsibilities of the Environmental Manager include:

- Assure that the plan meets the regulatory requirements of the State of Alabama and of the US EPA.
- Management approval of the plan for implementation by the facility.
- Provide technical support as necessary to implement the plan.
- Review and approval of program revisions.

3.3.2 SWPP Team Leader, West Huntsville Quarry

The responsibilities of the SWPP Team Leader include:

- Serving as the SWPP Team Leader.
- Managing approval of the plan for implementation by the facility.
- Allocating of resources to assure successful plan implementation.
- Managing certification of the plan upon implementation.
- Assuring plan maintenance through periodic review of inspection reports, audit results and corrective action records.
- Assuring that the annual comprehensive site compliance evaluation, as described in Tab V (Programs), Section 3, is completed and all records are maintained in accordance with the provisions of this plan.
- Keeping file of monthly inspection reports and corrective actions.
- Keeping file of Rogers Group, Inc. chemical spill reports, which will be completed and maintained in the SWPP/SPCC Plan.
- Keeping file of copies of the audit reports conducted every year.
- Assembling of other team members and chairing team meetings.
- Modifying this plan when required.
- Leading facility inspections.
- Heading reevaluations of program.
- Heading any revisions of the program.
- Initiating employee training and maintaining training records.

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- Assuring compliance with company policies and procedures related to this plan.
- Leading the Storm Water Pollution Prevention Team in spill containment and cleanup efforts.
- Directing team activities when responding to emergency situations.
- Assuring ongoing compliance with housekeeping practices.

3.3.3 Storm Water Pollution Prevention Team Members

The Responsibilities of the Storm Water Pollution Prevention Team Members include:

- Responding to emergency situations as alternate to Team Leader
- Participating and assisting in team meetings
- Participating and assisting in monthly inspections
- Participating and assisting in program reevaluations
- Assisting the Leader with program revisions
- Developing procedures as needed to assure compliance with plan requirements.
- Taking corrective action as necessary to assure compliance with plan requirements.
- Recommending plan modifications as necessary to prevent storm water pollution.
- Notifying Team Leader concerning emergency situations.

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4 RISK ASSESSMENT

4.1 Spill History

There is no record or recollection of a significant or reportable spill at West Huntsville Quarry.

4.2 Site Drainage

Drawing No. RGI-QAWH-NPDES2018, entitled "Site Layout and Drainage Map", details the storm water and process water flow direction for the proposed facility. The entire affected area (121.0) will be divided into three (2) distinct drainage areas. A description of each drainage area runoff pattern and proposed treatment follows.

Tract 1 will consist of 58.9 acres and will be home to the crushing plant, stockpile area, office and the perimeter berms. The crushing plant will be serviced with dust suppression and wash water from Pond 1. Water from the plant will be directed back to Pond 1 for recirculation. Water for Pond 1 will come primarily from the quarry sump with excess water being directed to Martins Branch via Outfall 001P.

Tract 2 consists of 60.7 acres and will be primarily the quarry pit and haulroads for this facility. Overburden material will be excavated and used to construct berms along the perimeter of the disturbed area. These berms will direct storm water runoff to the quarry sump where the water will be used internally or discharged through Outfall 001P. Water used internally will be pumped to Pond 1 where the water will be used in the washing process and/or for dust suppression. Associated with the washing process will be Pond 1 that will treat the recirculated water from the washing process. The berms will be constructed to an approximate height of 15-20 feet. There will be approximately 15.0 acres disturbed initially in the western part of Area B and the remaining portion will be disturbed as the quarry is developed to the southeast. Storm water runoff from this area will be directed to the quarry sump. The berm that is constructed along the eastern edge of the pit will be progressed to the east as the pit is developed.

4.3 Significant Materials Exposed to Storm Water

Diesel Fuel

Diesel fuel is stored at one location. There is a 10,000-gallon tank located near the QC Lab. This tank is self-contained and double-walled. There is no sign of past leaks or spills from this tank and, West Huntsville Quarry personnel report that there is no history of leaks or spills associated with this tank.

Used Oil

Used oil is removed by an outside contractor when service requests are completed. When minor spills associated with the transfer of material from equipment have occurred, they are immediately cleaned up.

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Motor Oil

Outside contractors store and handle motor oil for service requests.

Miscellaneous Oil and Grease

Various grades and quantities of motor oil, gear lube, grease and hydraulic fluid are stored in 55-gallon drums. The total inventory may vary from 10-20 55-gallon drums on site at any time. Secondary containment for most of the drums in these areas is provided.

4.4 Material Hazards

The materials used by West Huntsville Quarry may contain chemicals that are hazardous to the environment when discharged to the surface waters through spills or leaks to the storm water system.

The following materials used by West Huntsville Quarry should be considered as hazardous to the environment if released to the surface waters:

- All oil or petroleum based or petroleum containing products.
- Motor and lubricating oils, new or used.
- Liquid motor and heating fuels; including kerosene, diesel fuel and gasoline.
- Antifreeze (ethylene glycol).
- There is a potential for PCB content in transformers but this is not confirmed.

The specific hazards of each material are shown on the Material Safety Data Sheet for that material. Material suppliers are responsible for revising MSD Sheets as necessary to communicate the hazards of their products. Since MSD Sheets for currently used materials may be revised frequently and since new products may be introduced in the facility, MSD Sheets are not included as a part of this plan.

However, MSD sheets can be found online on the Rockpile. Click the Safety tab on the top left of the page, and under **HazCom-Hazard Communication** there is an MSDSOnline link. This will upload the online database where MSD sheets can be seen at any time for any product. If the product desired is not seen in the list the product can be searched and added to the list.

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4.5 Potential Pollution Sources

The following materials could be potential pollution sources at the West Huntsville Quarry:

Diesel Fuel

Spills could occur due to over filling of the tank, operating error, valve or hose damage, or damage to the tank. Hydrocarbons could also be released while draining water from the containment structure. This tank is double-walled at the quarry operation.

Gasoline

Spills could occur due to over filling of the tank, operating error, valve or hose damage, or damage to the tank.

Used Oil

Spills could occur due to over filling of the tank, handling of materials for disposal, operator error, valve or hose damage, or damage to the tank.

Bulk Hydraulic Fluid

Spills could occur due to over filling of the tank, operating error, valve or hose damage, or damage to the tank.

Motor Oils

Drips and spills from motor oil dispensing, oil changing operations, and from normal equipment operation could result in surface water contamination. The risk is not significant because most material handling takes place in the shop building and is not exposed to rainfall.

Empty Oil Drums

Improper storage of empty drums can lead to discharge of residual material. Proper drum storage is required for empty drums.

Sand, Gravel and Waste Piles, Gravel Roadways, Parking Areas, and Storage Areas

During prolonged rainfall events, particulate matter could enter the storm water system. All of the rain falling in the quarry pit remains in the pit so this area does not represent a risk to surface waters.

4.6 Non-Storm Water Discharges

The West Huntsville Quarry facilities have been evaluated to assure materials not allowed by the Storm Water Permit are not discharged to the surface waters or to storm water systems.

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The certification in Section 1.4 is based on knowledge of the plant piping as installed, wastewater treatment system operating experience, and on site visual inspection of all outfalls conducted by Rogers Group, Inc.

4.7 Site Maps, Drawings & Photographs

The topographical map for this area shows the location of the site and the drainage path.

The drainage patterns for the manufacturing site, the location of exposed materials, and the locations of potential spill sources are shown in site drainage map

Both maps are located at the end of this section.

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5 POLLUTION CONTROL SYSTEMS

5.1 Treatment Systems

No treatment systems have been installed at this facility.

5.2 Sediment and Erosion Control

Areas susceptible to erosion and which threaten the quality of discharged water will be controlled with the use of stone riprap, filter stone, straw bales, filter cloth or other acceptable methods.

5.3 Control Systems

A watershed analysis has been previously conducted predicting volume for a 10-year 24-hour storm event.

5.4 Containment Facilities

Secondary containment designed to hold at least 110% of the volume of the tank and is installed for the following

- 1 - 10,000 gallon diesel tank (Double-Walled)
- 14 - 55 gallon drums

5.5 Spill Response Equipment

West Huntsville Quarry maintains an inventory of absorbent materials for use in the control of spills of oil or other materials that could contaminate surface waters. A barrel of spill control materials is stored in the Office Building.

The planned spill control inventory includes:

- 200 Absorbent Pads
- 10 – 20 Absorbent Pillows
- 20 – 18" Absorbent short booms
- 8 – 10 foot absorbent booms
- 10 – 20 Sand socks
- 10 – 20 Poly soak socks
- 50 # Bag Plus Premium Sorbent
- 200 pounds dry absorbent material (clay absorbent)
- 12 tent stakes and cord (for securing absorbent booms)
- 20 Sand bags (to hold down booms and drain covers)
- Hazardous waste drum

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These inventory levels will be checked during annual inspections and replenished as necessary. Should additional supplies and or equipment be needed contact:

First Response, Inc.
1411 South Dickerson Road
Goodlettsville, TN 37202
Telephone: (615) 868-9110

6 SITE SECURITY

Though the gate at the front of the facility is normally open to allow unrestricted access for suppliers and West Huntsville Quarry employees, it is closed and locked after normal working hours (6:00AM – 8:00Pm, Monday-Friday and 6:00AM – 12:00PM on Saturdays. Offices are also secured after hours. The buildings interior and exterior are adequately illuminated.

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1 EMERGENCY TELEPHONE NUMBERS

This list will be maintained in this section and will be inserted in the back cover of each copy of the SWPP/SPCC Plan. All calls to be placed by the Coordinator or a designated representative on site at the time of a spill emergency.

- **West Huntsville Quarry SWPP Team**

Oliver Dash, <i>Plant Manager</i>	Cell:	(256) 303-4288
Jacob Hinton, <i>Area Manager</i>	Cell:	(615) 487-7012
Tony Russo, <i>Environmental Manager</i>	Cell:	(615) 347-6683

- **City of Madison**

Fire Department	Emergency	911
	Business	(256) 722-3326
Police Department	Emergency	911
	Business	(256) 772-5675

- **Limestone County**

Emergency Management Agency	(256) 232-2631
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- **Alabama Department of Environmental Management** **(334) 271-7700**

- **National Response Center (River Oils)** **(800) 424-8802**

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2 HOUSEKEEPING PRACTICES

Good housekeeping procedures are designed to maintain a clean and orderly facility. A clean and orderly facility will reduce the potential for materials to come in contact with storm water.

The following are the housekeeping practices conducted at West Huntsville Quarry to prevent storm water pollution:

- All work areas that could impact storm water quality are kept clean, orderly and in sanitary condition.
- Wherever possible, materials and wastes are stored inside the buildings at the facility to prevent exposure to precipitation.
- Maintenance and wash areas are kept free of spills of motor oil, hydraulic oil, antifreeze, windshield washer fluid, or any other stored fluids.
- Waste oil drums and drums containing other materials are checked for leakage.
- Equipment is visually checked and maintained.
- Empty drums and chemical totes are promptly disposed of or returned to the manufacturer for recycling.
- Dumpsters are periodically emptied.
- Drip pans or absorbent materials are used under oil dispensing stations.

3 PREVENTIVE MAINTENANCE

Preventive maintenance procedures are established to ensure the proper operation and condition of facility equipment, structures, and the storm water drainage system. Preventive maintenance may involve inspection and testing to discover conditions that could cause breakdowns or failures.

West Huntsville Quarry has selected several preventive maintenance practices, which are described in the following list:

- Perform proper maintenance of tank, valves, piping and containment. Equipment will be visually checked for leaks, corrosion, and damage. Containment facilities and tank foundations will be checked for cracks, unusual settling or weakened areas.
- All oil and fuel handling systems are visually inspected as part of the daily routine and repaired as needed.

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4 SPILL PREVENTION

Truck drivers shall follow correct operating procedures when unloading diesel fuel and are required to stay with equipment at all times during unloading operations.

Transport trucks are required to use equipment on site. In addition, unloading and hose drainage procedures will be reviewed with suppliers.

Loading/Unloading – Containers

Containers of chemicals, petroleum based products, maintenance chemicals, and other materials used at the facility are received from either common carrier trucks or trucks operated by the product supplier. They are normally unloaded with a forklift. The following spill prevention measures are observed:

1. Forklifts are operated in a safe manner.
2. Caution is taken to avoid puncturing containers.
3. Caution is taken to prevent dropping or damaging containers while transferring them within the facility.
4. Containers are placed in designated storage areas upon receipt.

Oil Loading/Unloading – Bulk Deliveries

Bulk oil tankers deliver oil products. Supplier personnel transfer these products into the tanks. The following prevention measures are observed:

1. Facility personnel are always present during the transfer procedure.
2. Facility personnel visually verify that tank valves that could allow outward flow of oil are closed, equipment is in proper working condition and that the tank is prepared for a delivery.
3. Facility personnel assure that the driver follows safety procedures (such as tank grounding) during unloading operations.

Used Oil Transfer

The recycling company's personnel transfer used oil from the used oil storage tank into the used oil bulk tanker. The following prevention measures are observed:

1. Facility personnel are always present during the transfer procedure.
2. Facility personnel visually verify that tank truck drain valves are closed, equipment is in proper working condition and that the tank is prepared for oil removal.
3. Facility personnel assure that the driver follows safety procedures (such as tank grounding) during unloading operations.

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Storage of Empty Containers

Wherever possible, empty containers are stored indoors or in a covered area to prevent contact with storm water. If empty containers are stored outdoors, they are stored upright with bungs in place or with covers to prevent residual material from leaking.

Use of Secondary Containment

Secondary containment is used (i.e.: drip pans) when dispensing oil and other chemicals to maintain a safe work area and to prevent contamination of storm water.

5 SPILL CONTROL

If a spill occurs, the following procedures will be implemented:

1. Report **all** non- incidental spills to the SWPP Team Leader.
2. If the SWPP Team Leader is not available, report the spill to the Alternate SWPP Team Leader, or to a SWPP Team Member, or to a supervisor.
3. A member of the SWPP Team will complete a Spill Incident Report for review by the SWPP Team and by the SWPP Team leader.
4. Isolate the source of the spill to minimize the quantity of material released.
5. Contain the spill as close to the source as possible to minimize the generation of contaminated material. Loader operators shall immediately build a berm around the spill, if possible. Materials from the spill containment kit and other materials available on site can also be used.
6. Place absorbent booms across surface drainage paths to prevent spills from entering pits. Secure the booms with stakes and sandbags as necessary.
7. Use absorbent materials from the spill kit to recover spilled material. Dispose used absorbent materials in appropriate storage containers for disposal.
8. Recover hazardous chemicals and place in appropriate storage containers for disposal.
9. Properly dispose of all wastes and recovered materials.

Refer to the Spill Reporting Procedure for more details regarding spill notification and reporting.

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6 SPILL COUNTERMEASURES

If oil or other hazardous materials enter the storm water drainage system, the facility will implement the following countermeasures:

1. Notify the Team Leader, Alternate, or Team Member who will notify the required local, state, and federal agencies.
2. The Team representative may call the spill containment contractor or the local fire department to provide additional support.
3. Implement control procedures to minimize the quantity released, see section 5.
4. Place absorbent booms across or downstream from the point where contaminated storm water or materials enter the pit. Secure the booms with stakes and cord from the spill containment kit.
5. Utilize additional control supplies and equipment available from the spill containment contractor or other emergency responders.
6. Provide support to emergency response crews.
7. Properly dispose of containment materials.
8. File reports with local, state and federal authorities as required.

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7 REPORTING AND NOTIFICATION

7.1 Determination of Reportable Quantity

Reportable quantities for hazardous substances are set forth in 40 CFR 110, 117 and 302. The reportable quantities for the hundreds of hazardous substances listed range from as little as 1 pound to as much as 5,000 pounds, depending on the substance. Refer to the lists in these regulations to determine the reportable quantity for listed hazardous substances.

Oil, which is released in sufficient quantity to form a film or sheen on, or discoloration of, the surface of the water or the shoreline, or which deposits a sludge beneath the water surface on the shoreline is reportable. "Oil" includes but is not limited to petroleum, fuel oil, sludge, oil refuse, and oil mixed with wastes. A "sheen" is defined as an iridescent appearance on the surface of the water.

The U.S. EPA has defined "significant spills" to include releases within a 24-hour period of hazardous substances in excess of reportable quantities under Section 311 of the Clean Water Act and Section 102 of Comprehensive Environmental Response, Compensation and Liability Act (CERCLA).

Each spill incident must be evaluated by the facility operator to determine if that spill is a "significant" spill and therefore reportable per the above referenced regulations.

7.2 Requirements for Immediate Notification of Authorities

Various governmental authorities must be notified upon discovery of a reportable spill. Immediate notification is provided to the local fire department and to the Local Emergency Planning Coordinator (LEPC). Verbal notification to the National Response Center and Alabama Department of Environmental Management, Permits/Compliance Unit, Mining and Nonpoint Source Section, Field Operations Division within twenty-four (24) hours from the time the permittee becomes aware of the circumstances.

7.3 Content of Verbal Notification

The verbal notice should include as much of the information listed below as is known at the time of notification. Do not delay corrective action in order to research missing information.

- The location and source of the release.
- The chemical name or identity of any substance involved in the release and whether the substance is a hazardous substance; i.e., CAS #.
- An estimate of the quantity of any substance released into the environment.
- The time of the release.
- The date of the release.
- The duration of the release.
- The environmental medium or media into which the substance was released.
- Proper precautions to take as a result of the release, including evacuation and other proposed response action.

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- Any known anticipated or chronic health risks associated with the release and, if known to the informant, advice regarding medical attention necessary for individuals exposed to the substance released.
- The name and telephone numbers of the person or persons to be contacted for further information.
- What countermeasures are being implemented.
- Such other information as may be required.

7.4 Content of Written Reports

Written reports must be submitted to the following agencies in the event of a spill.

U.S. EPA Report for Spills
(address will be on notification letter from U.S. EPA)

Alabama Department of Environmental Management
Director, Permits Compliance Unit

Local Emergency Planning Committee

This report must be submitted as soon as possible, but not later than five days after the spill and addressed to the Director of the ADEM Division of Permits and Compliance. The report should include:

- A written copy of the verbal notification and updated listing of all the information provided in it.
- The actual time, date and duration of the release or discharge.
- The actual time and date of discovery of the release or discharge.
- Actions taken to respond to and contain the release or discharge.
- The ADEM spill number and the National Response Center case number on submitted information.
- The name of the facility.
- The name(s) of the owner or operator of the facility.
- The location of the facility.
- The location of the release or discharge (street, county, township, or city).
- The longitude and latitude, if known, or distance and direction from the nearest intersection of streets.
- The date and year of initial facility operation.
- The maximum storage or handling capacity of the facility and normal daily throughput.
- A description of the facility, including maps, flow diagrams and topographical maps.
- A complete copy of the SWPP Plan with Amendments
- The cause(s) of such spill, including a failure analysis of system or sub-system in which the failure occurred.
- The corrective actions and/or circumstances taken, including an adequate description of equipment repairs and/or replacements.
- Additional preventive measures taken or contemplated to minimize the possibility of recurrence.

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- Other pertinent information as may be required.

7.5 Reporting Thresholds

Discharges Less Than Reportable Quantity

The SWPP Team Leader will document all significant spills of less than reportable quantities. This information will be used internally to evaluate the effectiveness of the SWPPP. Reporting to local, state, or federal agencies is not required for spills less than reportable quantity.

Discharges Greater Than Reportable Quantity - Controlled Within A Containment Facility

The State Emergency Response Commission (SERC) does not require the reporting of releases of hazardous materials in amounts in excess of the published threshold quantity provided that the material is controlled within a containment facility. The containment facility could be a building or a curbed-in area with an impermeable floor.

Discharges Greater Than Reportable Quantity - Released to the Environment

It is required that written reports are submitted to the Moulton Emergency Coordinator, ADEM and the US EPA for all releases of hazardous or extremely hazardous material in excess of threshold quantity which are released to the environment. The release may be to the land, air, or surface waters. If the spill affects surface water quality, the effectiveness of the SWPPP/SPCCP may be questioned and the written report should include the above specified content in addition to that required by SERC.

Discharges Of Oil to Surface Water

Provide written notification to ADEM and to the Moulton Emergency Coordinator for all discharges of oil or oil-containing material to the tributaries of navigable rivers or streams. The reportable quantity for oil is an amount sufficient to cause a "sheen" or film on the water.

Discharges Of Oil To Surface Water - Greater Than 1000 Gallons

A written report must be submitted within 60 days to Region V of the US EPA for all oil spills in excess of 1000 gallons in any single incident. A written report is also required in a facility has two reportable spills of less than 1000 gallons each within a year. This reporting is in addition to the required state and local reporting.

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7.6 Rogers Group, Inc. Spill Incident Report

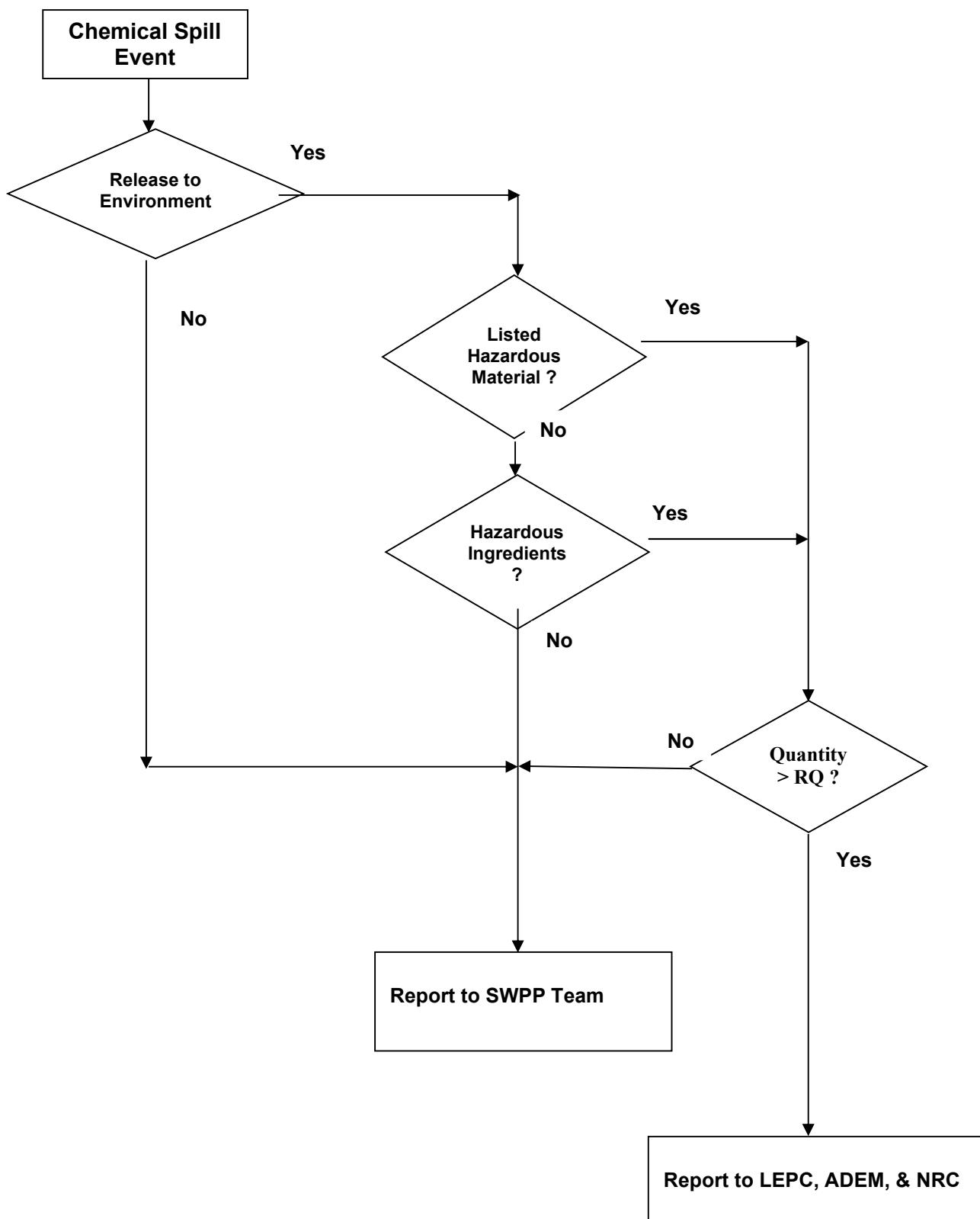
Records of all significant spill incidents must be submitted to the Pollution Prevention Team Leader. The Spill Incident Report Form is included at the end of this section. This internal report must be submitted to the Pollution Prevention Team Leader within 24 hours for ANY significant spill of hazardous or extremely hazardous material, whether or not the spill migrated off the property. The Pollution Prevention Team Leader will retain copies of the report in the Records section of this SWPP/SPCC Plan.

7.7 Regulatory References

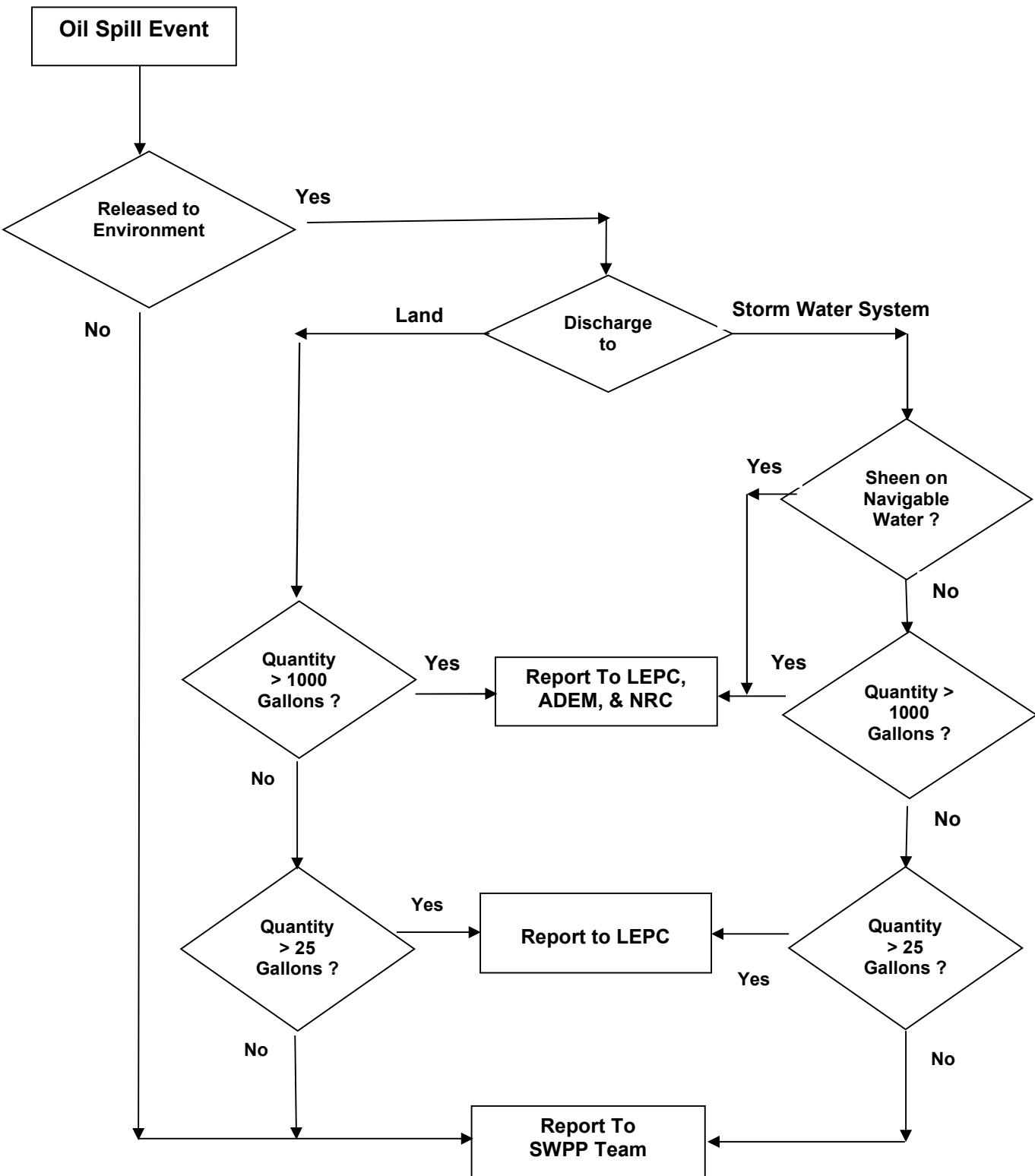
Additional information can be found in the following regulatory sources:

- Harmful quantities defined in 40 CFR 110.3.
- NRC notification requirements defined in 40 CFR 110.10 for oil spills.
- NRC notification requirements defined in 40 CFR 300.125 for hazardous substances.
- NRC notification required at 40 CFR 300.405 (National Oil and Hazardous Substances Pollution Contingency Plan) under the Comprehensive Environmental Response, Compensation and Liability Act for any spill of oil or hazardous substance that gets outside the facility, whether or not it reaches the River.
- ADEM and LEPC notification is required by Regulations 3750-25-01, 05, 10, 12, 13, 15, 20, and 25, for any oil or hazardous substance or extremely hazardous spill which cannot be contained on site.
- ADEM reports required by 40 CFR 122.41(1)(6).
- U.S. EPA and ADEM reports required by 40 CFR 112.4(a).
- CEPAC reports required by 40 CFR 300.215(f).

Storm Water Pollution Prevention / Spill Prevention Control & Countermeasures Plan		
Issue Date: November 2017	Revision No.: 3	Revision Date: June 2023
Prepared By: RGI OSS	Location: Madison, Alabama	Authorized By: Theron Binford



Storm Water Pollution Prevention / Spill Prevention Control & Countermeasures Plan		
Issue Date: November 2017	Revision No.: 3	Revision Date: June 2023
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8 PLAN MAINTENANCE AND REVISION

The general requirements and procedures for plan revision are defined in this section.

8.1 Revision Requirements

This SWPP/SPCC Plan must be revised under the following circumstances:

- If violations of the discharge permit terms are identified; facility modifications must be implemented as quickly as possible and the plan must be revised to reflect those modifications within 14 days.
- If a facility change is made which adversely affect the ability of the facility to comply with the provisions of the discharge permit; the plan revision must be revised within 14 days.
- If a facility change is made which creates risk or increases the risk of oil spills or hazardous materials, the plan must be revised within 14 days.
- Plan deficiencies identified through inspections or internal audits should be corrected within 14 days.
- Facility modifications should be completed within 12 weeks.
- If facility changes are requested or recommended as a result of the continuous improvement efforts or employee participation programs and the change does not fall within one of the above categories; the plan should be revised within 30 days of implementation of the change.
- The plan must be thoroughly reviewed, revised as necessary, and reissued every three years.
- PE certification of the plan is require every three years as part of the reissue process and is recommended whenever there is a significant change in the facility and in the plan.

8.2 Revision Procedure

1. Any employee may request a plan revision by submitting a written request or a corrective action request to the Pollution Prevention Team Leader.
2. A corrective action request will be submitted to the SWPP Team Leader whenever plan or facility deficiencies identified through routine inspections, management audit, or monitoring programs.
3. The SWPP Team Leader will review the request; discuss it with the team and other employees as necessary; and develop a recommendation for consideration by the Engineering Manager, Rogers Group, Inc.
4. The Engineering Manager will review the recommendation and authorize facility and plan changes.
5. The SWPP Team Leader will implement the authorized changes and submit a plan revision to the President for approval.
6. The SWPP Team Leader will replace the appropriate pages in the controlled copies of the plan. The distribution list for controlled copies is in the Document Management section of the plan.

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7. The communication of significant plan changes to affected employees will be made through communication in plant training meetings, through postings on the plant bulletin board, or by other means as appropriate.
8. The SWPP Team Leader will then sign off on the corrective action request as "Complete" and return one copy to the Environmental Engineer, one to the submitting employee, and one to the plant Corrective Action Request Coordinator, see the "Corrective Action" section for additional information.

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Issue Date: November 2017	Revision No.: 1	Revision Date: November 2018
Prepared By: RGI OSS	Location: Madison, Alabama	Authorized By: Van Medlock

1 PERSONNEL TRAINING

1.1 Responsibility

Rogers Group, Inc. has implemented a training program that addresses the overall training requirements for all company personnel. The SWPP Team Leader will assure that the training requirements of this plan are integrated into the training program for West Huntsville Quarry. Management will review compliance with training program requirement through the annual Management Audit.

1.2 Affected Employees

Employees must receive SWPP training as follows:

- All new employees shall be trained as part of the New Employee Orientation Program.
- Employees will be retrained as necessary to maintain competency upon reassignment to a new department or job function.
- All supervisory and management employees must be thoroughly trained on all aspects of this plan.
- Refresher training will be presented annually to all production employees.

1.3 Program Content

The SWPP Training program will include the following minimum content:

- Function of the Storm Water Pollution Prevention Plan.
- Purpose of the SWPP Plan.
- The potential pollution sources at Rogers Group, Inc..
- Preventative measures including “Good Housekeeping” practices, preventative maintenance, materials management practices, use of secondary containment, inspection programs, management audit program.
- Location and use of spill response equipment and supplies.
- Spill Control procedures.
- Spill emergency Response Procedures
- Reporting requirements.
 - Proper disposal of waste and contaminated materials.
 - A review of spill events, as appropriate.

1.4 Record Keeping

Records will be maintained to document training activities conducted to satisfy the requirements of this plan.

Training records are to be kept by the administrator of the training program.

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2 INSPECTION PROGRAM

The SWPP Plan inspection requirements have been incorporated into the Rogers Group, Inc. Inspection Program. The scope of this program includes all routine inspections related to health, safety and environmental compliance issues as well as inspection of criteria that are important to Rogers Group, Inc. for business reasons i.e., quality concerns, risk management, and cost control. Rogers Group, Inc. personnel conduct inspections as frequently as necessary to assure compliance with Rogers Group, Inc. standards including the requirements of this plan.

2.1 Routine Inspections

The following table lists the SWPP Plan inspection elements that have been incorporated into the Quarterly Inspection Program:

MONTHLY INSPECTION REQUIREMENTS	
AREA	INSPECTION ELEMENT
Bulk Fuel Tanks	Spills, leaks, equipment condition
Bulk Oil Tank	Spills, leaks, equipment condition
Bulk Hydraulic Fluid Tank	Spills, leaks, equipment condition
Kerosene Tank	Spills, leaks, equipment condition
Waste Oil Tank	Spills, leaks, equipment condition
Used Oil Filter Dumpster	Spills, leaks, equipment condition
Shop & Maintenance Buildings	Spilled material, housekeeping
Material Storage Buildings	Spills, leaks, equipment condition
Yard	Housekeeping

2.2 SWPP Team Semi Annual Inspections

The Pollution Prevention Team conducts comprehensive site inspections on a Semi Annual basis to assure compliance with pollution prevention standards as well as with other requirements of this plan.

The Semi Annual inspection includes:

- A review of material handling areas as potential pollution sources,
- Checking the integrity and adequacy of drums,

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- Looking for any evidence of unreported spills or leaks that might have occurred anywhere on the property,
- Looking for any changes in the process or facility that may have created a new storm water pollution risk, and
- Checking for the presence of a previously unrecognized potential for a spill or leak exists at the facility.
- Checking the general condition of bulk storage tanks.

The Pollution Prevention Team meets at the conclusion of each inspection to review the results of the inspection and define any areas or processes that might require corrective actions. They also review the introduction of new chemicals or processes for possible impact on the SWPP Plan. A Corrective Action Request is completed and submitted to correct deficiencies in the plan or conformance to plan requirements.

The following table lists the SWPP Plan inspection elements that have been incorporated into the Semi Annual Inspection Program. A copy of the Semi Annual Inspection Form can be found at the end of this section.

POLLUTION PREVENTION TEAM SEMI ANNUAL INSPECTION	
AREA	INSPECTION ELEMENT
All Areas	Housekeeping New potential pollution sources Signs of material spills or equipment leaks
Shop Building	Spills / leaks Equipment condition
Storage Building	Spills / leaks Equipment condition
Parking Lots & Drive Ways	Signs of erosion, Excessive silt
Bulk Storage Tanks	Leaks Equipment condition Accumulation of excess water
Truck Wash Areas	Spills/ leaks Equipment condition Process water containment
Yard	House keeping Excess sand and silt accumulations Signs of erosion
Material / Waste Storage Areas	Leakage from containers, Proper empty drum storage Proper waste disposal.
Spill Containment Equipment	Condition & availability

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3 MANAGEMENT AUDIT PROGRAM

West Huntsville Quarry has implemented an audit program that includes a review of the SWPP Plan implementation and compliance with the terms of the storm water discharge permit.

3.1 Responsibility

The Site Foreman of West Huntsville Quarry leads the annual management audit of the SWPP Plan implementation. The audit team includes the Pollution Prevention Team and may include others if desired. The Plant Manager will assure that any non-conformances identified during the audit are corrected within the required time.

3.2 Scope

The audit will include review of the following:

- All reported spill incidents.
- Completed corrective action items.
- Open corrective action requests.
- Monitoring program results.
- Compliance with the training program requirements.
- Compliance with inspection program requirements.
- Compliance with record keeping program requirements.
- An inspection of the facility including
 - ◊ Evidence of, or the potential for, pollutants entering the drainage system.
 - ◊ The presence of new materials or processes that pose a new potential for storm water pollution.
 - ◊ Condition and availability equipment used and needed to implement the plan, such as additional spill response equipment.

3.3 Reporting

Prepare a report summarizing the findings of the inspection, personnel making the inspection, the date(s) of the inspection and identify any incidents of noncompliance or certify that the facility is in compliance with the present storm water plan. If significant problems are discovered, submit a Corrective Action Request to the responsible party. When the report does not identify any incidents of non-compliance, the report shall contain a certification that the facility is in compliance with this permit.

3.4 Plan Revision

Based on the results of the inspection, the Pollution Prevention Team will revise the storm water plan as needed within two (2) weeks of inspection and provide implementation of any changes to the plan in a timely manner, but in no case more than twelve (12) weeks after the inspection.

3.5 Record Keeping

A copy of the report is maintained with the SWPP records.

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4 CORRECTIVE ACTION

Rogers Group, Inc. has implemented a Corrective Action System to serve this facility including corrective action required for SWPP Plan maintenance. Records of action taken are documented in this system.

A corrective action request is submitted to the SWPP Team Leader if plan revisions are required due to deficiencies identified in inspections or audits, due to spill incidents, or for other reasons that may arise.

A sample Corrective Action Request form is included.

5 STORMWATER MONITORING PROGRAM

5.1 Sampling

Under Individual Permit Number AL0083089, West Huntsville Quarry is required to conduct storm water sampling of its outfalls as follows:

- During the period beginning with the effective date of this permit and lasting through the expiration date of this permit, the permittee is authorized to discharge treated wastewater from all point sources associated with the mining and related facilities indicated on the approved area maps.

<u>Effluent Characteristics</u>	<u>Discharge Limitations</u>		
	<u>Daily Minimum</u>	<u>Daily Average</u>	<u>Daily Maximum</u>
Total Suspended Solids	N/A	25.0 mg/l	45.0 mg/l
PH	6.0 s.u.	N/A	8.5 s.u.
Flow (Instantaneous, determine At time of sample collection)	Monitor	Monitor	Monitor

Flow can be determined by direct measurement, calculation, or other method acceptable to the Department and must be reported in mgd.

5.2 Records

The following information shall be recorded for each measurement or sample taken:

- Date, exact place, and time of sampling
- Person who performed sampling or measurements
- Dates the analyses were performed
- Person who performed analyses
- Analytical techniques or methods used
- Results of all required analyses

See the "Records" section for more information regarding record retention time and responsibility.



POLLUTION ABATEMENT PLAN (PAP)

FOR

WEST HUNTSVILLE QUARRY

26024 Newby Road
Madison, Alabama 335756
Madison County

Prepared by:

Anthony Russo
Rogers Group, Inc.
421 Great Circle Road
Nashville, Tennessee 37228

February 2025

INTRODUCTION

Rogers Group, Inc. (RGI) has prepared this Pollution Abatement Plan (PAP) for the RGI West Huntsville Quarry located in West Huntsville, Madison County, Alabama. PAP Plans are required by the Alabama Department of Environmental Management (ADEM) National Pollutant Discharge Elimination System (NPDES) Individual Permit for surface and underground mineral and ore or mineral product mining, quarrying, excavation, borrowing, hydraulic mining, storage, processing, preparation, recovery, handling, loading, storing or disposing activities and associated areas including pre-mining site development, construction, excavation, clearing, disturbance, reclamation, and associated areas.

The objective of this plan is to develop a means to manage operations at the facility in an environmentally sensible manner. This plan identifies potential sources of pollutants, Best Management Practices (BMPs) or control measures to minimize or eliminate the discharge of pollutants in stormwater runoff. According to the U.S. Environmental Protection Agency (EPA), BMPs include preventative maintenance, spill prevention, good housekeeping, training, material management, segregation of areas of concern, recycling and treatment and disposal of waste.

Development, implementation, and maintenance of the PAP will provide Rogers Group, Inc. with the tools to reduce pollutants contained in storm water discharges and comply with the requirements of the General Storm Water Permit issued by the State of Alabama 335-6-9. The primary goals of the PAP plan will be to identify potential sources of pollution, maintenance/inspection procedures, records of inspections and follow-up maintenance of BMPs, and Good Housekeeping practices. As per ADEM, the permittee shall amend the PAP 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.

This PAP plan has been prepared to implement the following:

- a. Provide control sufficient to prevent or control pollution of storm water by particles to the degree required to maintain compliance with this permit and water quality standards.
- b. Prevent the spillage or loss of fluids, oil, grease, gasoline, etc. thereby preventing the contamination of storm water from these substances.
- c. Prevent or minimize storm water contact with any other pollutants present at the permittee's facility.
- d. Designate by position or name the person or persons responsible for the day-to-day implementation of the PAP.
- e. Provide monthly inspections, on days during which the facility is manned, of any structures that function to prevent storm water pollution or to remove pollutants from storm water and of the facility in general to ensure that the PAP is continually implemented and effective.
- f. Narrative account of operations explaining and/or defining raw materials, processes, and products. Block line or schematic diagrams indicating points

of waste origin and its collection and disposal shall be included.

- g. Quantity and characteristics of waste after treatment with respect to flow, suspended solids, total iron, and pH.
- h. Description of waste treatment facilities, pretreatment measures and recovery systems including expected life of sedimentation basins and schedules for cleaning or proper abandonment of such basins.
- i. A plan to eliminate or minimize sediment and other pollutants from haul roads.
- j. Locate all streams in or adjacent to the mining area and those measures which will be taken to minimize the impact on water quality when the mining operation is near such streams.
- k. Those measures to be employed to minimize the effect of any non-point source pollution which may be generated because of the surface mining operation.

Contact Information/Responsible Parties

Operator:

The operator of the West Huntsville Quarry will be Rogers Group, Inc. whose business address is as follows:

Rogers Group, Inc.
421 Great Circle Road
Nashville, Tennessee 37228

Site Supervisor Responsible for Implementation of this BMP Plan:

Oliver Dash
Plant Manager
26024 Newby Road
Madison, Alabama 35756

Site Description

The RGI West Huntsville facility is mining limestone and processing it for sale as aggregate. This facility is currently permitted under NPDES Permit Number AL0083089. Approximately 12 to 15 individuals from the immediate area will be employed by the operation which hours of operation run 8-12 hours a day Monday-Saturday. The facility is located within Madison County, Alabama, as found on the Greenbrier U.S.G.S. Quadrangle 7.5-Minute Series Map. The permit area is located within Township 3S, Range 3W, of Section 33. The surface water from the proposed mining, crushing plant, and stockpile areas will be directed to the quarry pits, the quarry pit sumps, and/or through sediment ponds as shown in the attached drawing entitled "NPDES Permit Map." This allows solids to settle prior to discharging through the outfalls labeled on the attached NPDES Permit Map, into Martin Branch through existing

monitoring points 001E and 002E.

MAPS

Design plans submitted with this document provide an existing contour map. The “Pollution Abatement” layout shows the planned general layout of the mining, crushing plant, and stockpile areas, sedimentation ponds, and all runoff locations.

Permit boundary identified on the NPDES Permit Map will be shown on our internal GIS software that is provided to all Plant Managers within the company. This software includes the locations of each outfall shown onsite. Furthermore, permit boundaries will be marked onsite in the form of perimeter berms that will provide a physical, visual aid for quarry personnel to not disturb beyond those limits.

METHOD OF DIVERTING SURFACE WATER RUNOFF

Drawing entitled “NPDES Permit Map”, details the storm water and process water flow direction for the West Huntsville Quarry. The total affected area consists of 255.50 acres of disturbed and undisturbed future mining area. The entire disturbed portion of the affected area is divided into three (3) distinct drainage areas. A description of each drainage area runoff pattern and proposed treatment follows is listed below. A water flow schematic and pond volume calculations for each drainage are also included in this application.

Area 1 consist of 34.20 acres and includes the existing quarry aggregate processing plant, aggregate stockpiles, facility office, customer truck scales, overburden storage, and oil storage area. Berms have been placed along the northern front of the area with an approximate height of 15 feet. Out slopes have been seeded and stabilized to serve as a natural barrier to prevent unauthorized access and to minimize erosion from this area. This area will drain to Pond 1 where storm water runoff can be conserved or discharged to the quarry pit sump (Sump 1) located in Area 2. Pond 1, the quarry pit sump, and the lower quarry pit floor will provide water storage that exceeds the volume required to treat a 10-year, 24-hour rain event. Water can also be discharged directly through Outfall 001E when water quality allows. Water that is conserved in Pond 1 and the quarry sump will be pumped either to large holding tanks for use in dust suppression or to the wash plant to process aggregate. Wash plant water is reused as much as possible. Any excess wash plant water would flow back to Pond 1.

Area 2 consists of 86.90 acres and will be primarily current and future quarry pit and overburden storage. Overburden material has been excavated and used to construct berms along the perimeter of the disturbed area to a height of 15 feet. These berms will direct storm water runoff to the quarry pit sump. The quarry pit sump and lower pit floor will provide water storage that exceeds the volume required to treat a 10-year, 24-hour rain event. Water will be either pumped to resupply Pond 1 or pumped and discharged through Outfall 001E.

Area 3 consist of 114.40 acres and is primarily current and future quarry pit and

overburden storage. Stormwater will be treated by the quarry pit sump (Sump 2). The quarry pit sump and lower pit floor will provide water storage that exceeds the volume required to treat a 10-year, 24-hour rain event. 15-foot-high berms will be constructed around the perimeter of the area as mining progresses south to not allow stormwater to leave the site untreated. Water will be either pumped to resupply Pond 1, pumped and discharged through Outfall 001E, or pumped and discharged through Outfall 002E.

SPILLS AND LEAKS

West Huntsville Quarry has been used as a limestone quarry operation by RGI for several years. Only minor spills and leaks have occurred within the quarry permit area and cleaned up for proper disposal through a 3rd party vendor. No spills have left the facility permit or property boundary. The Spill Prevention, Control and Countermeasure Plan (SPCC) implements further management and operational activities in the event of a spill.

OPERATIONS, PROCESSES, AND PRODUCTS

Limestone will be the only raw material mined at the West Huntsville quarry. Limestone is drilled, blasted, crushed, washed and stockpile on site. The main waste products are overburden removed to access the top of the limestone rock and fines that results from the processing of limestone in the stone washing circuit. Overburden removed will be stored onsite in a designated storage pile, sold as fill material to customers, or used as fill onsite to grade and make berms. The stone fines will be carried back to the previously mined area or mixed with salable products for resale to customers.

Specific products that will be produced at the West Huntsville Quarry are as follows:

- Riprap - 8" stone
- 2" stone
- Base stone - 1-1/4 inch minus material
- 1" – 1/2" inch stone
- ¾"-1" stone
- Screenings
- Pugmill

The proposed hours of operations consist of 6am to 6pm Monday through Saturday.

POTENTIAL SOURCES OF POLLUTION

Potential sources for pollution of West Huntsville Quarry include but are not limited to:

- Storm water runoff of material stockpiles
- Spill from AST's
- Dust emissions from site activity
- Spill/leakage from equipment
- Haul road sediment.

The only waste products that are a by-product of the limestone washing process is silt. Storm runoff will contain clays since the dominant soil type at the site is silty loam clay. Clays and silt will settle into the pit. The sediment treatment structures will be cleaned out once they reach 60% capacity to provide adequate sedimentation area and retention time for incoming materials to be treated. The pH of the treated water is expected to be between 6.0 and 9.0 SU. There is no indication that this activity will increase the iron concentration of potential discharges.

MATERIAL STOCKPILES

Potential pollution includes sediment runoff from the material stockpiles. Aggregate/gravel and yard dust that leave the yard in runoff can contribute sediment to nearby water bodies. The site is graded in a manner that prevents untreated runoff from leaving the site so that most solids and suspended solids are removed from the effluent being discharged.

ABOVEGROUND STORAGE TANK (AST)

The West Huntsville Quarry has one (1) 10,000-gallon diesel aboveground storage tank (AST) and various 55-gallon drums. The AST is constructed from materials that are compatible with the product stored and are appropriate for pressure and temperature ratings and all tanks are stored inside of impermeable secondary containment.

Stormwater contacting the tanks will collect inside of the secondary containment area. Clean water will be drained from the secondary containment area as necessary and discharged into Drainage Area 1.

The site is graded in a manner that precludes runoff from leaving the site without flowing through the sediment treatment so that most solids and suspended solids are removed from the effluent. All petroleum product storage containers will be maintained in good condition. Overfilling the AST will be prevented by cooperation and communication between the tanker truck operator and the RGI personnel assisting in the delivery. The Spill Prevention, Control and Countermeasure plan (SPCC) will implement further management and operational activities for the petroleum storage area.

DUST EMISSIONS

Dust emissions are expected to occur regularly during operations of mining limestone. Water trucks will routinely drive the quarry area, plant site, and haul roads to maintain and reduce dust emissions.

EQUIPMENT SPILL/LEAKS

All equipment should be inspected routinely to prevent any unforeseen spills or leaks of fluids. In the event a spill occurs, immediate containment will be controlled utilizing drip pans or absorbent materials. Waste generated from the cleanup efforts will be appropriately contained, labeled, stored, and disposed of or recycled. If a spill or release does occur, the project will typically flow towards the sediment basins located in the northwest portion of the site.

If deficiencies are noted, they should be reported to the Plant Manager immediately and corrected.

SEDIMENT CONTROL FOR HAUL ROADS

All site roads will be ditched and stabilized so that runoff will be collected at the sediment treatment structures.

SEDIMENTATION CONTROL

Stormwater from the facility will be directed through diversion structures. These structures include constructed earthen berms, a sediment basin, and quarry pit sums.

STORMWATER DISCHARGE

This facility currently contains two (2) existing outfalls (Outfalls 001E and 002E). Stormwater from the wet and dry crushing/screening operation, pit and portions of the stockpiles is routed through Pond 1 and the quarry pit sums. Based on calculations, Outfalls 001E and 002E are not anticipated to discharge from a rainfall event. Dewatering of the quarry pits may take place in the event the excess water is not needed for the mining operation. A discharge will occur when water is pumped directly out of the current quarry pit sums. Water from Pond 1 and the quarry pit sums will be recirculated back to the processing facility for recycling within this system. All outfalls will be monitored on a regular basis and samples will be taken and sent to a laboratory for analysis. (Electronic discharge monitoring reports will be filed with ADEM accordingly.)

NON-STORMWATER DISCHARGE

Based on current operation practices, there are no process systems, which include discharge of wastewater from the facility. The process water from the wet screens is planned to be recirculated through Pond 1.

LOCATION OF ALL STREAMS ADJACENT TO PLANT AREA

Included with this NPDES application is a drawing which has been reproduced from the USGS quad sheets (Greenbrier Quadrangles) at a 1" = 2500' scale showing the adjacent streams. The receiving stream for Outfalls 001E and 002E is Martin Branch. Our plans include providing buffers from all jurisdictional streams by 50 feet. Proper permitting will be obtained before any impacts to jurisdictional waters onsite.

SITE BMP's

West Huntsville Quarry contains existing BMP's and there will be additional BMPs installed as necessary as the quarry pit expands. The following BMPs are currently implemented but are not limited to the ones listed below during operation. The need for additional BMPs may occur as operation advances. The need for additional BMPs may also be required by ADEM or recommended by the Qualified Credentialed Professional if the currently proposed BMPs appear to be ineffective.

SEDIMENT BASIN

As previously discussed, the treatment process for water quality control is to be quarry pit

sumps and sediment ponds. Details are presented in NPDES Permit Map.

Removal of solids should be accomplished where the sediment accumulation reaches 60% of the design capacity of the sediment treatment. With the amount of material being constantly removed from the mined pit, this should never occur; however, it will be necessary to periodically remove sediment from the sump to maintain water quality.

Sedimentation ponds and the quarry sums are sized based on a 10-year, 24-hour storm event, and designed using the attached calculations. Spillways for sedimentation ponds were sized based on a 25-year, 24-hour storm event. The magnitudes of the storm events were based on NOAA Atlas 14 Point Precipitation Frequency Estimates.

DIVERSION STRUCTURE

Diversion structures will be installed to divert the water runoff into the quarry pits and sediment basins. Quarry sums will be shot out to allow water to pool in the lowest part of the quarry pits. Ponds are dugout with earthen berms and constructed of compacted soil.

VEGETATION

The best and most cost-effective protection against soil erosion is a well-established vegetative cover. Vegetation dissipates the energy of the rain. Roots and organic matter hold the soil in place. Vegetation increases water percolation into the soil, thus reducing runoff. After the ground has been exposed and/or in critical areas, such as steep slopes, the following steps may be taken to stabilize the soil, control erosion, and reduce sediment and runoff to downstream areas.

- Provide immediate cover with grass or mulch on any land stripped of vegetation and not under construction for 21 days. Critical areas should be stabilized as soon as possible.
- Temporary seedings made in fall or winter and in hot and dry summer months should be mulched. Mulch adhesives shall not be asphalt-based.
- Sod may be used if vegetative protection is immediately required.
- Maximum slopes of drainage ways should not exceed 4:1 if the grass is to be mowed.
- Jute netting, fiberglass netting, and mulch blankets can be used to provide temporary erosion control until vegetation is established.

Permanent seeding includes soil preparation, fertilization, liming, seeding, and mulching. Installation considerations include the following:

- When possible, topsoil shall be on site material, which is salvaged from excavation and embankment areas and stockpiled. Topsoil shall be free from refuse or any material toxic to plant growth and reasonably free from subsoil, stumps, roots, brush, stones, clay, or similar objects larger than 3 inches in dimension.
- Seed mixtures shall be free of noxious weeds and shall meet the requirements for seeding/planting in North Alabama.
- The recommended minimum depth of the finished topsoil is 3 inches.

HAUL ROAD

All haul roads need to maintain a grade of no greater than 10% with a maximum grade no

greater than 15% or 300 feet. The outer slope from the road is 2(H):1(V). At least 80% of the slopes need to be vegetated. The roads will be crowned and properly ditched.

ENTRANCE ROAD

Entrance road will be paved to reduce track out from this facility. Road will be crowned and properly ditched to allow for water to flow off the road and prevent pooling and flooding. Track out onto public roadways will be monitored regularly and entrance road will be swept on an as needed basis.

GOOD HOUSEKEEPING BMPs

Good Housekeeping BMPs will reduce the movement of potential pollutants other than sediments. These pollutants that are carried with storm water may eventually reach downstream bodies of water. Materials such as petroleum products are difficult to control once they are present in runoff water. The best practical control option available is to prevent these pollutants from reaching runoff waters using proper material handling and storage practices.

- Work areas and traffic routes should be kept clear of obstructions to reduce the potential for accidental spills and to facilitate product transfers and facility inspections.
- Facility equipment should be regularly checked to confirm that it is in proper working and operational order.
- Any on-site equipment washing should only be undertaken in specific locations where rinse can be collected and properly recycled/discharged. Any on-site equipment repairs should be undertaken at specific locations where spills, etc., can be collected and properly disposed of.
- Miscellaneous waste (i.e., litter, garbage, etc.) should be collected at a central location and be properly disposed of. The site should be routinely "policed" to prevent blowing litter and deposition off site upon adjacent properties or waters of the state.

BMPs are implemented to decrease sedimentation and erosion and to reduce impacts caused by runoff and storm water. This is generally accomplished by (a) protecting existing vegetation, (b) protecting exposed surfaces, (c) trapping sediment, and (d) controlling runoff and storm water. BMPs must be implemented, inspected, and maintained. Controlling runoff water areas with proper BMPs is therefore essential to prevent the generation and movement of sediments, which can affect downstream areas.

- BMPs to control runoff are also often effective in managing storm water flow. The primary purpose of storm water management BMPs is to reduce and/or control the flow volumes and peak flow rates for storm water as it leaves the site.
- Storm water inlets should be inspected routinely for signs of debris or sedimentation and damage caused by rain events and/or traffic activities. Repairs and cleaning of inlets should be made promptly.
- There should be no visible dust emissions beyond the property line while the equipment is being operated. The work area should be sprayed with water to maintain dust emissions from site activity as needed. Minimize dust production to the extent possible.
- To the extent possible, minimize exposure of materials to precipitation and storm water run-on.

- The areas containing petroleum products and materials shall be inspected for evidence of small product spills and/or sheen floating on storm water in the containment areas and will be removed to the extent possible using absorbent materials or a portable oil skimmer. (Refer to SPCC plan for more details.)
- The AST should be inspected routinely for evidence of stress or need of replacement or repair. (Corrosion, any form of deterioration in tank or hose, bulging, leaks, etc.)
- All areas of transfer of materials and products shall be inspected for evidence of spills or releases.

INSPECTION AND MAINTENANCE

Visual inspections shall be conducted at the West Huntsville Quarry once per month, during which time the facility is manned. These inspections should include the entire site for evidence of any structures that function to prevent storm water pollution or to remove pollutants from storm water and of the facility. Areas to inspect include, but are not limited to:

- The sediment basin shall be inspected to ensure sediment storage volume has not been exceeded and the berm directing drainage into the basin is intact and maintained.
- The material stockpile area shall be inspected for potential dust control and drainage to sediment basins. The drainage along the berms should be maintained in order to continue flow into the basins.
- A thorough overall site inspection is needed to prevent dust emissions and the spillage or loss of fluids, oil, greases, gasoline, and sediments that could pose a threat and contamination to storm water.

Information recorded during the inspection shall include:

- Date of inspection,
- Name of inspector,
- Storm system location and areas inspected,
- Inspection results,
- Descriptions of potential sources of storm water contaminants if discovered,
- Corrective actions, if any, and time initiated and time completed. Additionally, the corrective actions shall include description of the spillage, estimated volume of spill, name of person who observed spill and name of person cleaning up spill.

A sample of the effluent shall be taken post operations to determine the quality of water and quantity coming from the discharge point, if any.

DOCUMENTATION

Documentation, including inspection reports and stormwater data, will be maintained and copies should be kept on site and available for potential examination.

A copy of this PAP plan will be maintained electronically and available for review and/or inspection by ADEM, Responsible official, and staff.

All records, including monitoring information, all calibration and maintenance records, 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, shall be retained for a period of 3 years from the date of the same measurement, report, or application. This period may be extended at the request of the ADEM Director at any time. These records shall be kept electronically at the permitted facility, or an alternate location approved by ADEM in writing and shall be available for inspection.

PERSONNEL TRAINING

The Plant Manager or Responsible Official shall review this PAP plan on an annual basis and certify that it is consistent with and in compliance with the facility operations. West Huntsville Quarry personnel will be trained by RGI to implement this PAP plan and training should be performed annually thereafter. All personnel should be instructed in proper spill prevention and counter measure procedures, emergency evacuation procedures, and best management practices.

PLAN UPDATES

This plan requires an amendment whenever there is a modification in design, construction, operation, or maintenance of the facility that may change the potential for pollutants to impact stormwater.

ACKNOWLEDGEMENT

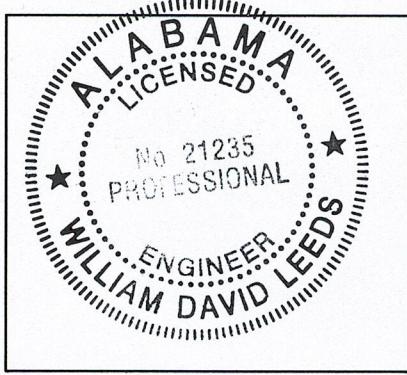
Rogers Group, Inc. represents that the information provided in this Plan reflects the conditions reported, encountered, and discovered at the time of Plan preparation. Conclusions regarding the subject were based on observations of existing conditions available documentation, and our interpretation of the collected data.



Rogers Group, Inc.
Responsible Official

CERTIFICATION OF QUALIFIED CREDENTIALED PROFESSIONAL

I certify under penalty of law that this PAP Plan was prepared in accordance with good engineering practices under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiring of the person or persons who directly gathered the enclosed 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.



W. D. Leeds 2/14/25

David Leeds, P.E. #21235
Engineer