308 Fountain Circle
Huntsville, AL 35801

Huntsville, Alabama

Cover Memo

Meeting Type: City Council Regular Meeting **Meeting Date:** 6/22/2023 **File ID:** TMP-3058

Department: Water Pollution Control

Subject:

Type of Action: Approval/Action

Resolution authorizing the City Council to review the Annual Municipal Water Pollution Prevention (MWPP) Reports and report same to Alabama Department of Environmental Management.

Resolution No.

Finance Information: N/A

Account Number: N/A

City Cost Amount: $ 0

Total Cost: $0

Special Circumstances: N/A

Grant Funded: N/A

Grant Title - CFDA or granting Agency: N/A

Resolution #: N/A

Location: (list below) N/A

Address:

District: District 1 ☐ District 2 ☐ District 3 ☐ District 4 ☐ District 5 ☐

Additional Comments:

RESOLUTION NO. 23-____

WHEREAS, in order to maintain compliance with regulations promulgated by the Alabama Department of Environmental Management (ADEM), the Water Pollution Control Department for the City of Huntsville prepares a Municipal Water Pollution Prevention (MWPP) Annual Report for submission to ADEM by each of its six wastewater treatment plants; and

WHEREAS, ADEM requires City Council of Huntsville to review the MWPP Annual Reports and set forth any necessary actions to maintain effluent requirements contained in the City's National Pollutant Discharge Elimination System (NPDES) Permit and to prevent the bypass and overflow of raw sewage within the collection system or at the City's treatment plant; and

WHEREAS, the MWPP Annual Reports are scored, and the point total is used to determine if any remedial action is necessary for a sanitary sewer system facility; a score of seventy-one (71) is the threshold score requiring corrective action to be taken; the maximum points possible is 783; and

WHEREAS, Huntsville City Council has reviewed the MWPP Annual Reports for the City's six Waste Water Treatment Plants (WWTP), which are attached hereto as Exhibits A through F; and

WHEREAS, the reports reflect the following scores: Exhibit A – Western Area WWTP (11 points); Exhibit B – Aldridge Creek WWTP (6 points); Exhibit C – Big Cove WWTP (16 points), Exhibit D – Chase WWTP (2 points); Exhibit E – Magnolia Springs WWTP (34 points), and Exhibit F– Spring Branch WWTP (2 points); and

WHEREAS, the scores of the City's wastewater treatment plants all fall well below the threshold where ADEM would direct any remedial action.

NOW, THEREFORE, BE IT RESOLVED by the City Council of the City of Huntsville, Alabama, that having reviewed the 2022 MWPP Annual Reports, the City Council hereby informs ADEM that the City's six wastewater treatment plants are in compliance with ADEM's sanitary sewer system regulations.

ADOPTED this the 22nd day of June, 2023.

_____
President of the City Council
City of Huntsville, Alabama

APPROVED this the 22nd day of June, 2023.

_____
Mayor of the City of Huntsville, Alabama

EXHIBIT A

MUNICIPAL WATER POLLUTION PREVENTION (MWPP)

ANNUAL REPORT

SUBMITTED BY:

TREATMENT FACILITY: WESTERN AREA WWTP NPDES #: AL0049531

MUNICIPALITY: HUNTSVILLE COUNTY: MADISON

CONTACT PERSON: SHANE COOK
Responsible Official
DIRECTOR OF WATER POLLUTION CONTROL
Title
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: shane.cook@huntsvilleal.gov

CHIEF OPERATOR: KEVIN RICHARDSON
Name
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: kevin.richardson@huntsvilleal.gov
Date: MAY 20, 2023

REVIEWED BY: _____
Consulting Engineer
Telephone #: _____ Fax #: _____
Date: _____

MWPP Annual Report
Information Source List

The following information will be needed to complete the compliance maintenance report that covers the calendar year of 2022 (due **May 31,** 2023).

Part 1
A. The average plant influent flow for each month (million gallons per day/MGD) during the year.
B. The average plant influent BOD (CBOD) for each month (mg/l and lb/day) in the year.
C. The plant's average design flow (MGD) and design BOD (CBOD) loading (lbs/day).

Part 2
A. The monthly average permit and DMR effluent concentration for BOD (CBOD), TSS, NH3-N, and/or TKN in mg/l for the year
B. The monthly average effluent limits and DMR loading for BOD (CBOD), TSS, NH3-N, and/or TKN in lbs/day for the year

Part 3 The age of the treatment plant defined as the number of years since the last major reconstruction to increase the organic or hydraulic capacity of the plant. The last calendar year minus the year the new construction was brought on-line.

Part 4 Bypass and overflow information. This is the number of bypass or overflow events of untreated wastewater due to heavy rain or equipment failure whether intentional or inadvertent from all collection systems tributary to the treatment facility.

Part 5
A. Describe the characteristics and quantity of sludge generated.
B. If sludge is landspread, how many months of sludge storage does the plant have? This should include on-site and off-site storage from the treatment plant. The digestor capacity may be used in the calculation.

Part 6
A. Sludge Disposal Method
B. The number of approved land disposal sites for sludge available, and how many months or years these disposal sites will these be available for use.

Part 7 The number of sewer extensions installed in the community last year, the design population, design flow, and design BOD (CBOD) for each sewer extension.

Part 8 Operator Certification

Part 9 Financial Status

Part 10 Subjective Evaluation

Part 11 Summary Sheet

Instructions to the Operator-in-Charge

1. Complete all sections of the MWPP Report to the best of your ability.

2. Parts 1 through 8 contain questions for which points will be generated. These points are intended to communicate to the Department and the governing body or owner the actions necessary to prevent effluent violations. Enter the point totals from Parts 1 through 8 on Part 11: Summary Sheet.

3. Add the point totals on Part 11: Summary Sheet.

4. Submit the MWPP Report to the governing body and the consulting engineer and owner for review and approval.

5. The governing body should pass a resolution which contains the following points:

   a. The resolution should acknowledge the governing body or owner has reviewed the MWPP Report.

   b. The resolution should indicate what actions will be taken to prevent effluent violations.

   c. The resolution should provide any other information the governing body or owner deems appropriate.

6. **The MWPP Report and the resolution must be submitted by May 31st to Municipal Section, Water Division, ADEM, P.O. Box 301463, Montgomery, AL 36130-1463.**

Facility Name: WESTERN AREA WWTP

Part 1: Influent Loading/Flows

A. List the average monthly volumetric flows and BOD_5 ($CBOD_5$) loadings received at your facility during the last calendar year.

Month	Column 1 Average Monthly Flowrate (MGD)	Column 2 Average Monthly BOD_5 ($CBOD_5$) Concentration (mg/l)	Column 3 Average Loading BOD_5 ($CBOD_5$) (lbs/day**)
January	18.54	66	10260
February	17.8	75	11264
March	20.22	66	11114
April	17.84	68	10064
May	14.4	90	10774
June	13.47	110	12417
July	12.02	93	9275
August	11.09	85	7898
September	9.91	82	6771
October	9.59	91	7264
November	9.57	108	8663
December	15.64	58	7578
Annual Avg.	14.17	83	9445

** As reported on NPDES Discharge Monitoring Reports (DMRs) and as required by EPA's NPDES Self-Monitoring System, User Guide, March 1985.

B. List the average design flow and average design BOD_5 ($CBOD_5$) loading for the facility below. If you are not aware of these design quantities, contact your consulting engineer.

	Average Design Flow	Average Design BOD_5 ($CBOD_5$) Loading (lbs/day)
Design Criteria	20	33380
90% of the Design Criteria	18	30042

C. How many times did the monthly flow (Column 1) to the WWTP exceed 90% of design flow?

2 (Check the appropriate point total)

■ 0 - 4 = 0 points ☐ 5 or more = 5 points

D. How many times did the monthly flow (Column 1) to the WWTP exceed the design flow?

1 (Check the appropriate point total)

☐ 0 = 0 points ■ 1 – 2 = 5 points ☐ 3 – 4 =10 points ☐ 5 or more =15 points

E. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed 90% of the design loading?

0 (Check the appropriate point total)

■ 0 -1 = 0 points ☐ 2 – 4 =5 points ☐ 5 or more =10 points

F. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed the design loading?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 = 10 points ☐ 2 =20 points ☐ 3 =30 points ☐ 4 =40 points ☐ 5 or more =50 points

G. Enter each point value marked for C through F and enter the sum in the appropriate blank below.

C points = 0

D points = 5

E points = 0

F points = 0

TOTAL POINTS VALUE FOR PART 1 5

Enter this value on Part 11: Summary Sheet.

*To obtain equivalent BOD_5 loading for comparison with design loading for those permittees using influent $CBOD_5$, divide annual average $CBOD_5$, loading in lbs/day from Part 1, A by 0.7.

Facility Name: WESTERN AREA WWTP

Part 2: Effluent Quality/Plant Performance

A. List the monthly average permit limits for the facility in the blanks below and the average monthly effluent DMR BOD_5, ($CBOD_5$) TSS, NH_3-N and/or TKN concentration produced by the facility during the last calendar year.

(1) NPDES Permit Concentration

	Months	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
Permit Limit	1-12	25	30	20	N/A

(2) DMR Concentration

Qtr	Month	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
1	January	4.1	3.3	0.3	4
	February	4.6	3	0.5	3.3
	March	4.9	2.9	0.7	2.3
2	April	5.3	3.2	0.6	1.5
	May	5	3.5	0.9	4.3
	June	5.1	2.7	0.8	4.7
3	July	5	2.3	1.5	1.7
	August	5.4	3.4	0.7	4.7
	September	4.8	2.7	0.5	6.6
4	October	4.9	5.7	1	4.3
	November	5.7	5.5	1.1	4.9
	December	3.8	3.1	0.6	3.4
	Annual Avg.	4.9	3.4	0.8	3.8

B. List the monthly average permit limit and DMR loadings below.

(1) NPDES Permit Loading

	Months	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
Permit Limit	1-12	4170	5004	3336	N/A

(2) DMR Loading

Qtr	Month	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
1	January	632	503	48	611
	February	681	446	76	486
	March	821	484	122	381
2	April	782	472	83	225
	May	604	422	103	518
	June	570	305	90	527
3	July	501	234	149	168
	August	502	317	67	430
	September	401	223	39	543
4	October	394	454	76	347
	November	457	439	84	389
	December	492	401	83	441
	Annual Avg.	570	392	85	422

C. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

D. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

E. During the past year did the effluent TSS concentration (mg/l) or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

F. During the past year did the TSS concentration (mg/l) and/or loading (lbs/day) exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

G. During the past year did the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

H. During the past year did either the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

I. Enter each point value checked for C through H in the blanks below.

C Points = 0

D Points = 0

E Points = 0

F Points = 0

G Points = 0

H Points = 0

HIGHEST INDIVIDUAL POINT VALUE FOR PART 2 (C-H) 0 (HIGHEST POINT = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: WESTERN AREA WWTP

Part 3: Age of the Wastewater Treatment Facility

A. What year was the wastewater treatment plant constructed or last reconstructed? 2019

Subtract the above answer from the report year to determine age:

Age = (Last Calendar year) - (Answer to A)

Age 3 = (2022) - (2019)

Enter Age in Part C below.

B. Check the type of treatment facility employed.

		Factor
X	Mechanical Treatment Plant	2.0
	Aerated Lagoon	1.5
	Stabilization Pond	1.0
	Other (Specify:)	1.0

C. Multiply the factor listed next to the type of the facility your community employs by the age of your facility to determine the total point value for Part 3:

2 (Factor) x 3 (Age) = 6 TOTAL POINT VALUE FOR PART 3

Enter the above value on Part 11: Summary Sheet. If the total point value exceeds 40, enter 40 on Part 11: Summary Sheet.

Facility Name: WESTERN AREA WWTP

Part 4: Bypassing and Overflows

A. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to heavy rain? 0

B. How many bypass or overflow events of untreated wastewater occurred in the last year prior to the headworks of the WWTP due to heavy rain? 0

C. How many of the bypass or overflow events listed in Parts A and B have been corrected such that future bypass or overflow events at the same location due to heavy rain are not anticipated? 0

D. Add together Answers A and B and subtract Answer C from that total.

A + B – C = 0 (Check the appropriate point total.)

- [x] 0 = 0 points
- [ ] 1 = 5 points
- [ ] 2 =10 points
- [ ] 3 =15 points
- [ ] 4 =20 points
- [ ] 5 =25 points
- [ ] 6 = 30 points
- [ ] 7 = 35 points
- [ ] 8 =40 points
- [ ] 9 =45 points
- [ ] 10 =50 points
- [ ] 11 or more =100 points

E. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to equipment failure? (This includes clogged/broken lines or manholes.) 0

F. How many bypass or overflow events of untreated wastewater occurred in the last year due to equipment failure prior to the headworks of the WWTP? (This includes clogged/broken lines or manholes.) 1

G. How many of the bypass or overflow events listed in Parts E and F have been corrected such that future bypass or overflow events at the same location due to the same equipment failure are not anticipated? 1

H. Add together Answers E and F and subtract Answer G from that total.

E + F – G = 0 (Check the appropriate point total.)

- [x] 0 = 0 points
- [ ] 1 = 5 points
- [ ] 2 =10 points
- [ ] 3 =15 points
- [ ] 4 =20 points
- [ ] 5 =25 points
- [ ] 6 = 30 points
- [ ] 7 = 35 points
- [ ] 8 =40 points
- [ ] 9 =45 points
- [ ] 10 =50 points
- [ ] 11 or more =100 points

I. Add point values checked in D and H and enter the total in the blank below.

TOTAL POINT VALUE FOR PART 4 0
Enter this value on Part 11: Summary Sheet.

All bypass or overflow events that have occurred in the last year (for any reason) must be individually reported with this MWPP report.

Facility Name: WESTERN AREA WWTP

Part 5: Sludge Quantity and Storage

A. Please provide information concerning sludge quantity, characteristics, and storage practices based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months of sludge storage capacity does the wastewater treatment facility have available, either on-site or off-site? (i.e., How many months can the facility operate without land spreading or disposing of sludge?) _____

(Check the appropriate point total.)

Greater than or equal to 4 months	[x]	= 0 points
Less than 4 months, but greater than or equal to 3 months	[ ]	= 10 points
Less than 3 months, but greater than or equal to 2 months	[ ]	= 20 points
Less than 2 months, but greater than or equal to 1 month	[ ]	= 30 points
Less than one month	[ ]	= 50 points

TOTAL POINT VALUE FOR PART 5 0
Enter this value on Part 11: Summary Sheet.

Part 6: Sludge Disposal Practices and Sites

A. Please provide the sludge disposal practices and site information based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months or years does the facility have access to and approval for sufficient land disposal sites to provide proper land disposal? (Check the appropriate point total.)

36 or more months	[■]	= 0 points
24 - 35 months	[ ]	= 10 points
12 - 23 months	[ ]	= 20 points
6 - 11 months	[ ]	= 30 points
Less than 6 months	[ ]	= 50 points

TOTAL POINT VALUE FOR PART 6 0
Enter this value on Part 11: Summary Sheet.

Facility Name: WESTERN AREA WWTP

Part 7: New Development

Are there any major new developments (industrial, commercial, or residential) in the last calendar year or anticipated in the next 2-3 years such that either flow or BOD_5 ($CBOD_5$) loadings to the sewage system could significantly increase? Estimate additional loadings below.

Design Population Equivalent (PE): 7000 Design Flow: 1 MGD Design BOD_5 ($CBOD_5$): 700 lbs/day

List industrial and/or residential developments.

NEW SUBDIVISION APPROXIMATELY 2300 LOTS. INDUSTRIAL USAGE WILL RISE DUE TO GROWTH. WWTP HAS 35% REMAINING CAPACITY AND LOADING.

Will the additional loading overload the plant?
(Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

Enter the point total in the blank below.

TOTAL POINT VALUE FOR PART 7 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Part 8: Operator Certification

Complete the *Plant and Collection System Personnel Inventory,* ADEM Form 441.

Do both the plant operator and collection system staffing comply with ADEM Administrative Code; Division 10, Operator Certification Program?
(Check the appropriate point total.)

☒ Yes = 0 points ☐ No = 121 points

TOTAL POINT VALUE FOR PART 8 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: WESETRN AREA WWTP

Part 9: Financial Status

A. Are User-Charge Revenues sufficient to cover operation and maintenance expenses? If no, how are O&M costs being financed? ***Include user charge rates***.

YES

Residential Minimum 0 Plus rate 4.83 /1,000 gal.

Industrial Minimum 0 Plus rate 4.83 /1,000 gal.

Monthly residential rate based on 6,000 gallons usage $ 28.98

B. What financial resources are available to pay for the wastewater improvements and/or reconstruction needs?

ADEQUATE USER CHARGE SYSTEM WITH A+ BOND RATING FROM STANDARD & POORS.

C. Please attach a rate sheet and the most recent audit, if available.

Part 10: Subjective Evaluation

A. Describe briefly the physical and structural conditions of the wastewater treatment facility.

ALL CONCRETE AND METAL STRUCTURES ARE IN GOOD CONDITION. THERE CURRENTLY EXISTS NO PROBLEMS WITH PREMATURE FAILURE DUE TO CORROSION OR DIFFERENTIAL SETTLING. WWTP UPGRADES CONTINUE.

B. Describe the general condition of the sewer system (sewer lines, manholes, lift stations).

CLEAR WATER INTRUSION FOR THE FACILITY IS ESTIMATED AT 25%. INFLOW AND INFILTRATION PROJECTS CONTINUE FOR SERVICE AREA.

C. What sewage system improvements does the community have planned for construction in the next 5 years?

CONSTRUCT NEW PROCESS TRAIN, NEW BLOWERS FOR AERATION BASINS, NEW RAS/WAS PUMP STATION AND ELECTRICAL BUILDING FULL HEADWORKS UPGRADE INCLUDING ALL NEW MECHANICAL EQUIPMENT

D. What is the theoretical design life of the plant, and what is the estimated remaining useful life of the wastewater treatment facility?

DESIGN LIFE IS 50 YEARS. REMAINING LIFE IS 50 YEARS.

E. What problems, if any, over the last year have threatened treatment or conveyance within the system?

NONE

F. Is the community presently involved in formal planning for treatment facility upgrading?

YES. FUNDING IS IN PLACE TO ADEQUATELY PLAN FOR ANY GROWTH. ALL PROJECTS AND CONTRACTS ARE APPROVED IN PUBLIC FORUM.

G. How many days in the last year were there residential backups at any point in the collection system for any reason other than clogging of the lateral connection? 0

H. Does the plant have a written plan for preventive maintenance on major equipment items? If yes, describe.

YES. ELECTRICAL:MEG-OHM, AMP CHECK. MECHANICAL:LUBRICATION OF ALL BEARINGS,SEALS,ETC. THESE TASKS ARE PREFORMED FROM PREVENTATIVE MAINTENANCE LOGS AND TRACKED THROUGH DEPARTMENT DATABASES.

I. Does this preventive maintenance program depict frequency of intervals, types of lubrication, and other preventive maintenance tasks necessary for each piece of equipment?

(Check the appropriate response.) ☒ Yes ☐ No

J. Are these preventive maintenance tasks, as well as equipment problems, being recorded and filed so future maintenance problems can be assessed properly?

(Check the appropriate response.) ☒ Yes ☐ No

K. Describe any major repairs or mechanical equipment replacement made in the last year and include the approximate cost for those repairs. Do not include major treatment plant construction or upgrading programs.

$150,000.00 SANITARY SEWER COLLECTION IMPROVEMENTS

$150,000.00 VARIOUS PROCESS TRAIN MECHANICAL IMPROVEMENTS

$70,000.00 VARIOUS ELECTRICAL/SCADA IMPROVEMENTS

L. List any additional comments. (Attach additional sheets if necessary.)

$200,000 WAS BUDGETED FOR ROUTINE REPAIRS FOR THIS PLANT IN 2022. THESE FUNDS WERE ALLOCATED FOR VARIOUS REPAIRS INCLUDING PUMPS, PROCESS EQUIPMENT AND ANY OTHER MECHANICAL/ELECTRICAL REPAIRS REPAIRS. IN ADDITION, CAPITAL PROJECTS ARE BUDGETED AND NOT INCLUDED IN THESE NUMBERS. THIS AMOUNT DOES NOT INCLUDE WHAT IS ANNUALLY BUDGETED FOR THE COLLECTION SYSTEM.

Facility Name: WESETRN AREA WWTP

Part 11: Summary Sheet

1. Enter in the values from Parts 1 through 8 in the left column below. Add the numbers in the left column to determine the MWPP Report point total the wastewater system generated for the previous calendar year.

Actual Values	Maximum Possible
Part 1 5 points	80 points
Part 2 0 points	121 points
Part 3 6 points	40 points
Part 4 0 points	200 points
Part 5 0 points	50 points
Part 6 0 points	50 points
Part 7 0 points	121 points
Part 8 0 points	121 points
Total 11 points	783 points

2. Check the facility type that best describes the plant's treatment and disposal of wastewater.

- [x] Mechanical plant with surface water discharge
- [ ] Aerated Lagoon or stabilization pond with surface water discharge
- [ ] Mechanical plant using land disposal of liquid wastes
- [ ] Aerated Lagoon or stabilization pond using land disposal of liquid wastes

3. Check the range that describes the action needed to address problems identified in the report.

- [x] 0 - 70 points Actions as Appropriate*
- [ ] 71 - 120 points Departmental Recommendation Range*
- [ ] 121 – 783 points Municipality Action Range*

***Other actions may be required by NPDES outside the scope of this report.**

4. Complete the *Municipal Water Pollution Prevention Resolution Form*, ADEM Form 418.

5. In Question 1, do any of the actual point values in the left column equal the maximum possible points in the right column?

(Check the appropriate response.) ☐ Yes ■ No

If yes, provide a written explanation for this situation in the space below.

PLANT AND COLLECTION SYSTEM PERSONNEL INVENTORY

FACILITY NAME: City of Huntsville Western Area WWTP PLANT GRADE: IV

PERMIT NUMBER: AL0049531

PLANT SUPERINTENDENT: Kevin Richardson TEL. # 256-883-3719

SYSTEM MANAGER: Shane L. Cook TEL. # 256-883-3719

PLANT OPERATORS:

NAME	GRADE OR TRAINEE STATUS	OPERATOR NO.	EXP. DATE
1. Kevin Richardson	IV	C008002	08/31/25
2. Randall Colwell	IV	C004919	01/31/24
3. Jorge Estrada	IV	C008853	01/31/26
4. Noah Perry	IV	C009543	03/31/24
5. Jeremy Lovell	IV	C003116	05/31/26
6. Timothy Tarpley	IV	C002279	09/30/23
7. Devin Smith	IV	C007990	8/31/25
8.			
9.			

COLLECTION SYSTEM OPERATORS:

1. Sam Rowan	IC	C009546	08/31/23
2. Terrell Poindexter	IC	C008173	07/31/25
3. Jeffery Jefferson	IC	C000981	10/31/24
4. Dennis Holt	IC	C009619	09/30/23

	MAN HRS./WK	NUMBER
MANAGEMENT/SUPERVISOR	40	1
OPERATOR(S):		
GRADE I-C	80	4
GRADE I		
GRADE II		
GRADE III		
GRADE IV	252	7
DESIGNATED TRAINEE(S)		
LABORATORY		
MAINTENANCE	80	2
OTHER PLANT WORKERS		

AVERAGE NUMBER OF EMPLOYEES PER SHIFT:

1ST	2	START TIME	6:00 AM
2ND	1		6:00 PM

OPERATOR SHIFTS NORMALLY WORKED EACH DAY:

	SUN	MON	TUES	WED	THURS	FRI	SAT
1ST	12	12	12	12	12	12	12
2ND	12	12	12	12	12	12	12

ADEM USE ONLY

	YES	NO
1. DOES PLANT OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		
2. DOES COLLECTION SYSTEM OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		

ALABAMA POTW'S SEWAGE SLUDGE SURVEY *

Facility Background Information:

1. Facility Information

Permit Number: AL0049531

Name: WESTERN AREA WASTEWATER TREATMENT PLANT

Street Address: 733 LANDESS CIR

County: MADISON

2. Facility Contact

Name: SHANE L. COOK

Title: DIRECTOR OF WATER POLLUTION CONTROL

Telephone: 256-883-3719

Permittee Name: CITY OF HUNTSVILLE

Mailing Address: 1800 VERMONT ROAD

HUNTSVILLE, AL 35802

Facility Flow Information

1. Facility Wastewater Treatment Capacity

Avg. Daily Flow for 2022: 14.17 MGD

Facility Design Capacity: 20.0 MGD

2. Estimated Septage Quantity Handled (Residuals Removed from Septic Tank Systems)

Average Domestic Septage: 0 gallons per month

Average Commercial Septage: 0 gallons per month

3. Method of Septage Processing

x Mixed with Influent Wastewater for Treatment

[ ] Mixed with Sewage Sludge

[ ] _____

4. Estimated Percentage Contributing Wastewater Flow

Residential: 30 %

Industrial: 50 %

Other: 20 % Describe: Commercial

5. List type of wastewater treatment process(es) utilized at this facility:

PRIMARY CLARIFIER, COARSE BUBBLE AERATION AND EXTENDED AIR OXIDATION DITCH, SECONDARY CLARIFIER, UV DISINFECTION

6. Estimated sewage sludge wasting rate at this facility: 15189 lb/day dry weight

or _____ gallons per day

7. Estimated untreated sludge received from off site: 0 lb/day dry weight

or _____ gallons per day

8. Estimated percent solids of combined sewage sludge prior to treatment: 70 %

9. List the sewage sludge treatment processes used in preparing sludge for final use or disposal:

	Sludge Quantity (untreated pounds per day)
N/A	

10. Estimate the total volume of sludge generated: 2772 (dry U.S. tons per year)

Sludge Disposal Methods

1. Which of the following describes the current method of sewage sludge disposal for this facility:

	Current Practices			Proposed Practices	
	Approved by ADEM		Quantity	Approved by ADEM	
	Yes	No	(dry U.S. tons/year)	Yes	No
a. ☐ Land Application, Bulk Shipped					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
b. ☐ Land Application, Bagged/Other Container					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
c. x Incineration	X	☐	2772	X	☐
d. ☐ Subtitle D Landfill (Disposal Only)	☐	☐		☐	☐
e. ☐ Lined Treatment Lagoon or Stabilization Pond	☐	☐		☐	☐
f. ☐ Unlined Lagoon or Stabilization Pond	☐	☐		☐	☐
g. ☐ Other (Please Describe)	☐	☐		☐	☐

2. If "f" was selected above and sludge is stored for 2 or more years, enter the distance between the surface disposal site and the property line: _____ feet

Pollutant Concentrations

1. Enter the total concentrations of the following analytes using existing data. Do not enter TCLP results.

Analyte	Concentration (mg/kg or ppm)	Sample Type	Sample Date	Detection Level of Analysis

Arsenic				
Cadmium				
Chromium				
Copper				
Lead				
Mercury				
Molybdenum				
Nickel				
Selenium				
Zinc				
Ammonium-Nitrogen				
Nitrate-Nitrogen				
Total Kjeldahl Nitrogen				

2. Enter the estimated or determined percent solids of the sewage sludge when sampled for the above analysis: _____ %

Treatment Provided for Sewage Sludge at the Facility

1. Which class of pathogen reduction does the sewage sludge meet at the facility? (As defined in 40 CFR Part 503)

- ☐ Class A
  - ☐ Alternative A1 - Time and Temperature
  - ☐ Alternative A2 - Alkaline Treatment
  - ☐ Alternative A3 - Analysis and Operation
  - ☐ Alternative A4 - Analysis Only
  - ☐ Alternative A5 - Processes to Further Reduce Pathogens (PFRP)
    - ☐ Heat Drying ☐ Thermophilic Aerobic Digestion ☐ Heat Treatment
    - ☐ Pasteurization ☐ Gamma Ray Irradiation ☐ Beta Ray Irradiation
    - ☐ Composting ☐ ☐
  - ☐ Alternative A6 - PFRP Equivalent _____
- ☐ Class B
  - ☐ Alternative B1 - Fecal Coliform Count
  - ☐ Alternative B2 - Process to Significantly Reduce Pathogens (PSRP)
    - ☐ Aerobic Digestion ☐ Air Drying ☐ Anaerobic Digestion
    - ☐ Composting ☐ Lime Stabilization
  - ☐ Alternative B3 - PSRP Equivalent _____
- ☐ Neither or Unknown

Vector Attraction Control

- ☐ Option 1 - Minimum 38% Reduction in Volatile Solids
- ☐ Option 2 - Anaerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 3 - Aerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 4 - Specific Oxygen Uptake Rate (SOUR) for Aerobically Digested Sludge
- ☐ Option 5 - Aerobic Processes plus Elevated Temperature
- ☐ Option 6 - Raised pH to 12 and Retained at 11.5
- ☐ Option 7 - 75% Solids with no Unstabilized Solids
- ☐ Option 8 - 90% Solids with Unstabilized Solids
- ☐ Option 9 - Injection Below Land Surface
- ☐ Option 10 - Incorporation into Soil within 6 or 8 Hours
- ☐ Option 11 Covering Active Sewage Sludge Unit Daily
- ☐ None of the Above

Groundwater Monitoring

1. If disposal practice is surface disposal or land application, is groundwater monitoring required or performed at the site?

☐ Yes
☐ No

(If yes, please submit a copy of the groundwater monitoring reports along with this survey. Also please provide the approximate depth to groundwater and the groundwater monitoring procedures used to obtain the data.)

Land Application of Sewage Sludge

Answer the following questions if sewage sludge is applied to land.

1. If sewage sludge is land applied in bulk form, what type of crop or other vegetation is grown on this site?

N/A

2. If sewage sludge is land applied in bulk form, what is the nitrogen requirement for this crop or vegetation?

N/A

3. If sewage sludge is land applied in bulk form, briefly describe the nature of any complaints filed from neighbors?

N/A

* Permittees that submitted the "Annual Report Review Form" for sludge to the EPA may submit a copy with the MWPP in lieu of Attachment 3.

NPDES Sanitary Sewer Overflow (SSO) Event Reporting Form

version 1.3

(Submission #: HPQ-15H0-BER6A, version 1)

Details

Submission Alias NPDES Sanitary Sewer Overflow (SSO) Event Report

SSO ID SSO-00208710

Submission ID HPQ-15H0-BER6A

Form Input

General Instructions

All publicly or privately owned wastewater treatment plants holding an NPDES permit are required to provide immediate notification to the Alabama Department of Environmental Management (ADEM), county public health officials, the public, and any other affected entity such as public water systems as soon as possible upon becoming aware of any notifiable sanitary sewer overflow (SSO) events.

A "notifiable SSO", as defined in ADEM Admin. Code r. 335-6-6-.02(hh), is an overflow, spill, release or diversion of wastewater from a sanitary sewer system that either (1) reaches a surface water of the State or (2) may imminently and substantially endanger human health based on potential for public exposure including but not limited to close proximity to public or private water supply wells or in areas where human contact would be likely to occur.

Immediate notification shall be provided within 24 hours of becoming aware of the event. This immediate notification may be made either verbally to the Department's SSO Hotline at (334) 274-4200 or electronically to the Department's Alabama Environmental Permitting and Compliance System (AEPACS) system. The follow-up report shall be submitted within five days of becoming aware of the SSO event using the Department's AEPACS system.

Special Note:

The Sanitary Sewer Overflow map allows users to see the locations of SSOs that have been reported to the Department. They are displayed on the map for 10 days after the SSO has ceased. The colors indicate the volume of the discharge.

Click on any dot on the map and a popup will display information about the SSO(s).

At the top of the popup that is displayed after clicking on a dot, there is a number that indicates the number of SSOs at that location. Users can cycle through them by clicking on the arrows at the top of the popup.

At the bottom of the popup is a link ("click for eFile") that will take users to SSOs reported from that facility. The eFile entries that appear are sorted by date from most recent to oldest and contain only SSO reports.

Users can zoom in and out by using the +/- buttons at the top left of the map, the scroll on their mouse, or by holding the Shift key down while clicking and dragging a box on the map to zoom in.

The Switch Basemap button at the top right of the page allows users to select a different basemap.
Please also be aware that the SSOs reported to the Department will appear on a public map here.

Processing

NOTE: You should choose the correct status for this SSO notification/report EACH time you submit a notification/report.

If you are able to complete all of the information in the first submittal, please indicate the status of ◆Submit both the Initial 24-

Indicate which of the following describes the status of this SSO notification/report:
Submit both the Initial 24-hour notification and 5-day report concurrently

Prior to submitting this notification/report through AEPACS, did you make the first notification of this SSO to the Department by a method other than AEPACS (e.g. SSO Hotline, Fax, Email)?
No

Regardless of the notification method used to first notify the Department of this SSO event (i.e. AEPACS, SSO hotline, fax, etc), was the initial notification made to the Department within 24 hours of becoming aware of the event?
Yes

Permittee Information

Permit Number
AL0049531

Permittee
City of Huntsville

Facility/Site Information

Facility Name
Huntsville Western Area WWTP

Facility County
Madison

Assigned SSO ID

Assigned SSO ID
SSO-00208710

SSO Event - Information

Date/Time SSO Event Started:

Date	Time
12/17/2022	03:00 pm

Is the SSO on-going?
No

Date/Time SSO Event Stopped:

Date	Time
12/17/2022	04:00 pm

Did the SSO occur during wet weather?
No

Was the SSO caused by an extreme weather event (e.g. hurricane) that flooded the ENTIRE sewer system?
No

Note:
If estimated volume discharged is known, the VALUE section should be completed. If you only select a RANGE, you should be aware that the estimated volume discharged will be considered to be the largest value of the range selected. Estimated volumes above 1,000,000 gallons must be entered as a VALUE.

Report Estimated Volume Discharged as
Range

Estimated Volume Discharged (Range)
1,000 < gallons <= 10,000

Indicate source of discharge event
Treatment Plant

County in which SSO occurred (check all that apply)
Madison

Note
For detailed information on how to place a point on the map, please click the Map Help link below. Also, when reporting for an SSO(s) caused by an extreme weather event, please specify a general location for the SSO(s):
Map Help link

Latitude/Longitude of discharge
34.56730552041902,-86.76467326171048

Note
Please specify either the street address or location description for the discharge

Street Address
759 Landess Circle

City
Madison

State
AL

ZIP Code
35756

Location Description
Huntsville Western Area WWTP

Known or suspected cause of the discharge
Pump Malfunction at Covered Drying Bed

Destination of discharge
Drainage Ditch

Note:
If the SSO discharge first entered a storm drain or drainage ditch, you must also provide the first named creek or river that receives the flow from that storm drain/drainage ditch.

Provide the first named creek or river that receives the flow.
Blackwell Swamp

Did the discharge enter an unnamed tributary prior to entering the first named creek or river listed above?
No

Did the discharge reach a designated swimming water?
No

Monitoring of the receiving water (i.e. visual survey or water quality sampling) is:
Not Performed

Was the affected area cleaned?
Yes

Was the affected area disinfected?
Yes

Are you aware of any other potential health or environmental impacts?
No

SSO Event - Corrective Action

Describe corrective actions taken, plans to eliminate future discharges, and actions or plans to mitigate impacts to the environment and/or public health.
Area was cleaned and disinfected.

Please attach supporting information, if applicable:
NONE PROVIDED
Comment
NONE PROVIDED

Indicate efforts to notify public (check all that apply):
Notice not required

Please explain why notice to the public was not required and, if cited as the reason why no notice was given, also give the reason why the SSO event was not a notifiable SSO:
Overflow was contained on the treatment plant property.

Indicate Other Officials Notified (check all that apply):
Notice Not Required

Please explain why notice to the other officials was not required and, if cited as the reason why no notice was given, also give the reason why the SSO event was not a notifiable SSO:
Overflow was contained on the treatment plant property.

Other States notified:
NONE PROVIDED

Were any public water supply intake locations affected?
No

Additional Attachments

Additional Attachments
NONE PROVIDED
Comment
NONE PROVIDED

General Comments

General Comments (Optional)
Pump malfunction caused an overflow at the covered drying beds. Area was cleaned and disinfected.

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.

I certify that I have personally examined and am familiar with the information submitted herein. Based on my inquiry of those individuals immediately responsible for obtaining the information, I believe the submitted information to be true, accurate, and complete. I am aware that there are significant penalties for knowingly submitting false information, including the possibility of fine and imprisonment.

Signed By Randall Stewart on 12/18/2022 at 2:58 PM

Submission Complete

NPDES Sanitary Sewer Overflow (SSO) Event Reporting Form (NPDES Sanitary Sewer Overflow (SSO) Event Report)

SSO ID SSO-00207635 Submission HPF-2RTZ-TC4P9 Revision 1 Form Version 1.1

NPDES Sanitary Sewer Overflow (SSO) Event Reporting Form

version 1.1

(Submission #: HPF-2RTZ-TC4P9, version 1)

Details

Submission Alias	NPDES Sanitary Sewer Overflow (SSO) Event Report
SSO ID	SSO-00207635
Submission ID	HPF-2RTZ-TC4P9
Status	Submitting

Form Input

General Instructions

Processing

NOTE: You should choose the correct status for this SSO notification/report each time you submit a notification/report. If you are able to complete all of the information in the first submittal, please indicate the status of "Submit both the Initial 24-hour notification and 5-day report concurrently."

Indicate which of the following describes the status of this SSO notification/report:
Submit Initial 24-hour notification

Prior to submitting this notification/report through AEPACS, did you make the first notification of this SSO to the Department by a method other than AEPACS (e.g. SSO Hotline, Fax, Email)?
No

Regardless of the notification method used to first notify the Department of this SSO event (i.e. AEPACS, SSO hotline, fax, etc), was the initial notification made to the Department within 24 hours of becoming aware of the event?
Yes

Permittee Information

Permit Number
AL0049531

Permittee
City of Huntsville

Facility/Site Information

Facility Name
Huntsville Western Area WWTP

Facility County
Madison

Assigned SSO ID

Assigned SSO ID
SSO-00207635

SSO Event - Information

Date/Time SSO Event Started:

Date	Time
1/28/2022	12:30 pm

Is the SSO on-going?
No

Date/Time SSO Event Stopped:

Date	Time
1/28/2022	04:30 pm

Did the SSO occur during wet weather?
No

Was the SSO caused by an extreme weather event (e.g. hurricane) that flooded the ENTIRE sewer system?
No

Report Estimated Volume Discharged as
Range

Estimated Volume Discharged (Range)
75,000 < gallons <= 100,000

Indicate source of discharge event
Broken Line

County in which SSO occurred (check all that apply)
Madison

Note
For detailed information on how to place a point on the map, please click the Map Help link below. Also, when reporting for an SSO(s) caused by an extreme weather event, please specify a general location for the SSO(s):
Map Help link

Latitude/Longitude of discharge
34.65552468859133,-86.752792299459

Note
Please specify either the street address or location description for the discharge

Street Address
NONE PROVIDED

City
NONE PROVIDED

State
AL

ZIP Code
NONE PROVIDED

Location Description
SW of the intersection of Old Jim Williams Road and Trademark Drive.

Known or suspected cause of the discharge
An outside contractor crushed/collapsed our gravity main.

Destination of discharge
Other (Please Describe)

Please describe the "Other" destination(s) of the discharge:
Water confined to recent construction area.

Did the discharge reach a designated swimming water?
No

Monitoring of the receiving water (i.e. visual survey or water quality sampling) is:
Not Performed

Was the affected area cleaned?
Yes

Was the affected area disinfected?
Yes

Are you aware of any other potential health or environmental impacts?
No

SSO Event - Corrective Action

Describe corrective actions taken, plans to eliminate future discharges, and actions or plans to mitigate impacts to the environment and/or public health.
Area was secured and the sewer line was repaired. The area was cleaned and disinfected after repair was made.

Please attach supporting information, if applicable:
Old Jim Williams Road and Trademark Drive 1.jpg - 01/28/2022 08:11 PM
Old Jim Williams Road and Trademark Drive 2.jpg - 01/28/2022 08:11 PM
Old Jim Williams Road and Trademark Drive 3.jpg - 01/28/2022 08:11 PM
Comment
NONE PROVIDED

Indicate efforts to notify public (check all that apply):
Placement of Signs

Date signs were placed:
1/28/2022

Indicate Other Officials Notified (check all that apply):
County Health Department
Other (Please Describe)

County Health Department notification date:
1/28/2022

Please describe the "Other" officials notified:
Storm Water Authority

Other Officials Notification Date:
1/28/2022

Other States notified:
NONE PROVIDED

Were any public water supply intake locations affected?
No

Additional Attachments

Additional Attachments
NONE PROVIDED
Comment
NONE PROVIDED

General Comments

General Comments (Optional)
Area was secured and sewer line was repaired. Area was cleaned and disinfected after repair was made.

Attachments

Date	Attachment Name	Context	Confidential?	User
1/28/2022 8:11 PM	Old Jim Williams Road and Trademark Drive 3.jpg	Attachment	No	Randall Stewart
1/28/2022 8:11 PM	Old Jim Williams Road and Trademark Drive 2.jpg	Attachment	No	Randall Stewart
1/28/2022 8:11 PM	Old Jim Williams Road and Trademark Drive 1.jpg	Attachment	No	Randall Stewart

Status History

	User	Processing Status
1/28/2022 7:29:11 PM	Randall Stewart	Draft
1/28/2022 8:16:53 PM	Randall Stewart	Submitting
1/28/2022 8:16:53 PM	Randall Stewart	Signing

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.

I certify that I have personally examined and am familiar with the information submitted herein. Based on my inquiry of those individuals immediately responsible for obtaining the information, I believe the submitted information to be true, accurate, and complete. I am aware that there are significant penalties for knowingly submitting false information, including the possibility of fine and imprisonment.

Signed By Randall Stewart on 01/28/2022 at 8:16 PM

EXHIBIT B

MUNICIPAL WATER POLLUTION PREVENTION (MWPP)

ANNUAL REPORT

SUBMITTED BY:

TREATMENT FACILITY: ALDRIDGE CREEK WWTP NPDES #: AL0056855

MUNICIPALITY: HUNTSVILLE COUNTY: MADISON

CONTACT PERSON: SHANE COOK
Responsible Official
DIRECTOR OF WATER POLLUTION CONTROL
Title
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: shane.cook@huntsvilleal.gov

CHIEF OPERATOR: MARK RITTMAN
Name
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: mark.rittman@huntsvilleal.gov
Date: MAY 20, 2023

REVIEWED BY: _____
Consulting Engineer
Telephone #: _____ Fax #: _____
Date: _____

MWPP Annual Report
Information Source List

The following information will be needed to complete the compliance maintenance report that covers the calendar year of 2022 (due **May 31,** 2023).

Part 1
A. The average plant influent flow for each month (million gallons per day/MGD) during the year.
B. The average plant influent BOD (CBOD) for each month (mg/l and lb/day) in the year.
C. The plant's average design flow (MGD) and design BOD (CBOD) loading (lbs/day).

Part 2
A. The monthly average permit and DMR effluent concentration for BOD (CBOD), TSS, NH3-N, and/or TKN in mg/l for the year
B. The monthly average effluent limits and DMR loading for BOD (CBOD), TSS, NH3-N, and/or TKN in lbs/day for the year

Part 3 The age of the treatment plant defined as the number of years since the last major reconstruction to increase the organic or hydraulic capacity of the plant. The last calendar year minus the year the new construction was brought on-line.

Part 4 Bypass and overflow information. This is the number of bypass or overflow events of untreated wastewater due to heavy rain or equipment failure whether intentional or inadvertent from all collection systems tributary to the treatment facility.

Part 5
A. Describe the characteristics and quantity of sludge generated.
B. If sludge is landspread, how many months of sludge storage does the plant have? This should include on-site and off-site storage from the treatment plant. The digestor capacity may be used in the calculation.

Part 6
A. Sludge Disposal Method
B. The number of approved land disposal sites for sludge available, and how many months or years these disposal sites will these be available for use.

Part 7 The number of sewer extensions installed in the community last year, the design population, design flow, and design BOD (CBOD) for each sewer extension.

Part 8 Operator Certification

Part 9 Financial Status

Part 10 Subjective Evaluation

Part 11 Summary Sheet

Instructions to the Operator-in-Charge

1. Complete all sections of the MWPP Report to the best of your ability.

2. Parts 1 through 8 contain questions for which points will be generated. These points are intended to communicate to the Department and the governing body or owner the actions necessary to prevent effluent violations. Enter the point totals from Parts 1 through 8 on Part 11: Summary Sheet.

3. Add the point totals on Part 11: Summary Sheet.

4. Submit the MWPP Report to the governing body and the consulting engineer and owner for review and approval.

5. The governing body should pass a resolution which contains the following points:

   a. The resolution should acknowledge the governing body or owner has reviewed the MWPP Report.

   b. The resolution should indicate what actions will be taken to prevent effluent violations.

   c. The resolution should provide any other information the governing body or owner deems appropriate.

6. **The MWPP Report and the resolution must be submitted by May 31st to Municipal Section, Water Division, ADEM, P.O. Box 301463, Montgomery, AL 36130-1463.**

Facility Name: ALDRIDGE CREEK WWTP

Part 1: Influent Loading/Flows

A. List the average monthly volumetric flows and BOD_5 ($CBOD_5$) loadings received at your facility during the last calendar year.

Month	Column 1 Average Monthly Flowrate (MGD)	Column 2 Average Monthly BOD_5 ($CBOD_5$) Concentration (mg/l)	Column 3 Average Loading BOD_5 ($CBOD_5$) (lbs/day**)
January	6.31	106	5579
February	5.39	154	6941
March	6.99	121	7082
April	4.85	116	4710
May	3.11	203	5279
June	3.19	268	7133
July	2.53	214	4531
August	2.64	202	4457
September	4.17	182	6340
October	4.95	164	6770
November	5.14	264	11335
December	6.53	110	6017
Annual Avg.	4.65	175	6348

** As reported on NPDES Discharge Monitoring Reports (DMRs) and as required by EPA's NPDES Self-Monitoring System, User Guide, March 1985.

B. List the average design flow and average design BOD_5 ($CBOD_5$) loading for the facility below. If you are not aware of these design quantities, contact your consulting engineer.

	Average Design Flow	Average Design BOD_5 ($CBOD_5$) Loading (lbs/day)
Design Criteria	8.4	14020
90% of the Design Criteria	7.6	12618

C. How many times did the monthly flow (Column 1) to the WWTP exceed 90% of design flow?

0 (Check the appropriate point total)

■ 0 - 4 = 0 points ☐ 5 or more = 5 points

D. How many times did the monthly flow (Column 1) to the WWTP exceed the design flow?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 – 2 = 5 points ☐ 3 – 4 =10 points ☐ 5 or more =15 points

E. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed 90% of the design loading?

0 (Check the appropriate point total)

■ 0 -1 = 0 points ☐ 2 – 4 =5 points ☐ 5 or more =10 points

F. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed the design loading?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 = 10 points ☐ 2 =20 points ☐ 3 =30 points ☐ 4 =40 points ☐ 5 or more =50 points

G. Enter each point value marked for C through F and enter the sum in the appropriate blank below.

C points = 0

D points = 0

E points = 0

F points = 0

TOTAL POINTS VALUE FOR PART 1 0

Enter this value on Part 11: Summary Sheet.

*To obtain equivalent BOD_5 loading for comparison with design loading for those permittees using influent $CBOD_5$, divide annual average $CBOD_5$, loading in lbs/day from Part 1, A by 0.7.

Facility Name: ALDRIDGE CREEK WWTP

Part 2: Effluent Quality/Plant Performance

A. List the monthly average permit limits for the facility in the blanks below and the average monthly effluent DMR BOD_5, ($CBOD_5$) TSS, NH_3-N and/or TKN concentration produced by the facility during the last calendar year.

(1) NPDES Permit Concentration

	Months	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
Permit Limit	1-12	25	30	20	N/A

(2) DMR Concentration

Qtr	Month	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
1	January	8.33	6.8	2.03	1.45
	February	7.75	2.5	1.07	1.23
	March	6.07	6	0.8	1.14
2	April	12.92	8.7	4	4.68
	May	6.63	4.7	1.66	4.57
	June	11.43	7.6	4.63	12.1
3	July	6.67	9.9	2.97	1.59
	August	4.21	1.6	0.21	0.47
	September	5	3.2	1.56	3.91
4	October	3.58	2.8	0.15	6.67
	November	4	2	0.41	6.85
	December	5	3.9	1.57	0.43
	Annual Avg.	6.8	4.97	1.76	3.76

B. List the monthly average permit limit and DMR loadings below.

(1) NPDES Permit Loading

	Months	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
Permit Limit	1-12	1751	2101	1401	N/A

(2) DMR Loading

Qtr	Month	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
1	January	439	359	107	76
	February	348	112	48	55
	March	353	350	46	66
2	April	522	350	161	189
	May	172	122	43	118
	June	304	201	123	322
3	July	140	209	62	33
	August	92	34	4	10
	September	173	109	54	135
4	October	147	116	6	275
	November	171	85	17	293
	December	272.4	213	85	23
	Annual Avg.	261	189	63	133

C. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

D. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

E. During the past year did the effluent TSS concentration (mg/l) or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

F. During the past year did the TSS concentration (mg/l) and/or loading (lbs/day) exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

G. During the past year did the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

H. During the past year did either the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

I. Enter each point value checked for C through H in the blanks below.

C Points = 0
D Points = 0
E Points = 0
F Points = 0
G Points = 0
H Points = 0

HIGHEST INDIVIDUAL POINT VALUE FOR PART 2 (C-H) 0 (HIGHEST POINT = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: ALDRIDGE CREEK WWTP

Part 3: Age of the Wastewater Treatment Facility

A. What year was the wastewater treatment plant constructed or last reconstructed? 2019

Subtract the above answer from the report year to determine age:

Age = (Last Calendar year) - (Answer to A)

Age 3 = (2022) - (2019)

Enter Age in Part C below.

B. Check the type of treatment facility employed.

		Factor
X	Mechanical Treatment Plant	2.0
	Aerated Lagoon	1.5
	Stabilization Pond	1.0
	Other (Specify:)	1.0

C. Multiply the factor listed next to the type of the facility your community employs by the age of your facility to determine the total point value for Part 3:

2 (Factor) x 3 (Age) = 6 TOTAL POINT VALUE FOR PART 3

Enter the above value on Part 11: Summary Sheet. If the total point value exceeds 40, enter 40 on Part 11: Summary Sheet.

Facility Name: ALDRIDGE CREEK WWTP

Part 4: Bypassing and Overflows

A. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to heavy rain? 0

B. How many bypass or overflow events of untreated wastewater occurred in the last year prior to the headworks of the WWTP due to heavy rain? 0

C. How many of the bypass or overflow events listed in Parts A and B have been corrected such that future bypass or overflow events at the same location due to heavy rain are not anticipated? 0

D. Add together Answers A and B and subtract Answer C from that total.

A + B – C = 0 (Check the appropriate point total.)

- [x] 0 = 0 points
- [ ] 1 = 5 points
- [ ] 2 =10 points
- [ ] 3 =15 points
- [ ] 4 =20 points
- [ ] 5 =25 points
- [ ] 6 = 30 points
- [ ] 7 = 35 points
- [ ] 8 =40 points
- [ ] 9 =45 points
- [ ] 10 =50 points
- [ ] 11 or more =100 points

E. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to equipment failure? (This includes clogged/broken lines or manholes.) 0

F. How many bypass or overflow events of untreated wastewater occurred in the last year due to equipment failure prior to the headworks of the WWTP? (This includes clogged/broken lines or manholes.) 0

G. How many of the bypass or overflow events listed in Parts E and F have been corrected such that future bypass or overflow events at the same location due to the same equipment failure are not anticipated? 0

H. Add together Answers E and F and subtract Answer G from that total.

E + F – G = 0 (Check the appropriate point total.)

- [x] 0 = 0 points
- [ ] 1 = 5 points
- [ ] 2 =10 points
- [ ] 3 =15 points
- [ ] 4 =20 points
- [ ] 5 =25 points
- [ ] 6 = 30 points
- [ ] 7 = 35 points
- [ ] 8 =40 points
- [ ] 9 =45 points
- [ ] 10 =50 points
- [ ] 11 or more =100 points

I. Add point values checked in D and H and enter the total in the blank below.

TOTAL POINT VALUE FOR PART 4 0
Enter this value on Part 11: Summary Sheet.

All bypass or overflow events that have occurred in the last year (for any reason) must be individually reported with this MWPP report.

Facility Name: ALDRIDGE CREEK WWTP

Part 5: Sludge Quantity and Storage

A. Please provide information concerning sludge quantity, characteristics, and storage practices based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months of sludge storage capacity does the wastewater treatment facility have available, either on-site or off-site? (i.e., How many months can the facility operate without land spreading or disposing of sludge?) _____

(Check the appropriate point total.)

Greater than or equal to 4 months	[x]	= 0 points
Less than 4 months, but greater than or equal to 3 months	[ ]	= 10 points
Less than 3 months, but greater than or equal to 2 months	[ ]	= 20 points
Less than 2 months, but greater than or equal to 1 month	[ ]	= 30 points
Less than one month	[ ]	= 50 points

TOTAL POINT VALUE FOR PART 5 0
Enter this value on Part 11: Summary Sheet.

Part 6: Sludge Disposal Practices and Sites

A. Please provide the sludge disposal practices and site information based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months or years does the facility have access to and approval for sufficient land disposal sites to provide proper land disposal? (Check the appropriate point total.)

36 or more months	[■]	= 0 points
24 - 35 months	[ ]	= 10 points
12 - 23 months	[ ]	= 20 points
6 - 11 months	[ ]	= 30 points
Less than 6 months	[ ]	= 50 points

TOTAL POINT VALUE FOR PART 6 0
Enter this value on Part 11: Summary Sheet.

Facility Name: ALDRIDGE CREEK WWTP

Part 7: New Development

Are there any major new developments (industrial, commercial, or residential) in the last calendar year or anticipated in the next 2-3 years such that either flow or BOD_5 ($CBOD_5$) loadings to the sewage system could significantly increase? Estimate additional loadings below.

Design Population Equivalent (PE): _____ Design Flow: _____ MGD Design BOD_5 ($CBOD_5$): _____ lbs/day

List industrial and/or residential developments.

NONE. SERVICE AREA IS APPROXIMATELY 95% DEVELOPED.

Will the additional loading overload the plant?
(Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

Enter the point total in the blank below.

TOTAL POINT VALUE FOR PART 7 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Part 8: Operator Certification

Complete the *Plant and Collection System Personnel Inventory,* ADEM Form 441.

Do both the plant operator and collection system staffing comply with ADEM Administrative Code; Division 10, Operator Certification Program?
(Check the appropriate point total.)

☒ Yes = 0 points ☐ No = 121 points

TOTAL POINT VALUE FOR PART 8 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: ALDRIDGE CREEK WWTP

Part 9: Financial Status

A. Are User-Charge Revenues sufficient to cover operation and maintenance expenses? If no, how are O&M costs being financed? ***Include user charge rates***.

YES

Residential Minimum 0 Plus rate 4.83 /1,000 gal.

Industrial Minimum 0 Plus rate 4.83 /1,000 gal.

Monthly residential rate based on 6,000 gallons usage $ 28.98

B. What financial resources are available to pay for the wastewater improvements and/or reconstruction needs?

ADEQUATE USER CHARGE SYSTEM WITH A+ BOND RATING FROM STANDARD & POORS.

C. Please attach a rate sheet and the most recent audit, if available.

Part 10: Subjective Evaluation

A. Describe briefly the physical and structural conditions of the wastewater treatment facility.

ALL CONCRETE AND METAL STRUCTURES ARE IN GOOD CONDITION. THERE CURRENTLY EXISTS NO PROBLEMS WITH PREMATURE FAILURE DUE TO CORROSION OR DIFFERENTIAL SETTLING. WWTP UPGRADES CONTINUE.

B. Describe the general condition of the sewer system (sewer lines, manholes, lift stations).

CLEAR WATER INTRUSION FOR THE FACILITY IS ESTIMATED AT 25%. INFLOW AND INFILTRATION PROJECTS CONTINUE FOR SERVICE AREA.

C. What sewage system improvements does the community have planned for construction in the next 5 years?

UPGRADES TO PUMPING EQUIPMENT ALONG WITH SANITARY SEWER REHABILITATION PROJECTS.

IMPROVEMENTS TO HEADWORKS FACILITY AND MECHANICAL EQUIPMENT

D. What is the theoretical design life of the plant, and what is the estimated remaining useful life of the wastewater treatment facility?

DESIGN LIFE IS 50 YEARS. REMAINING LIFE IS 50 YEARS.

E. What problems, if any, over the last year have threatened treatment or conveyance within the system?

NONE

F. Is the community presently involved in formal planning for treatment facility upgrading?

YES. FUNDING IS IN PLACE TO ADEQUATELY PLAN FOR ANY GROWTH. ALL PROJECTS AND CONTRACTS ARE APPROVED IN PUBLIC FORUM.

G. How many days in the last year were there residential backups at any point in the collection system for any reason other than clogging of the lateral connection? 0

H. Does the plant have a written plan for preventive maintenance on major equipment items? If yes, describe.

YES. ELECTRICAL:MEG-OHM, AMP CHECK. MECHANICAL:LUBRICATION OF ALL BEARINGS,SEALS,ETC. THESE TASKS ARE PREFORMED FROM PREVENTATIVE MAINTENANCE LOGS AND TRACKED THROUGH DEPARTMENT DATABASES.

I. Does this preventive maintenance program depict frequency of intervals, types of lubrication, and other preventive maintenance tasks necessary for each piece of equipment?

(Check the appropriate response.) ☒ Yes ☐ No

J. Are these preventive maintenance tasks, as well as equipment problems, being recorded and filed so future maintenance problems can be assessed properly?

(Check the appropriate response.) ☒ Yes ☐ No

K. Describe any major repairs or mechanical equipment replacement made in the last year and include the approximate cost for those repairs. Do not include major treatment plant construction or upgrading programs.

$50,000.00 SANITARY SEWER COLLECTION IMPROVEMENTS

$180,000.00 PROCESS TRAIN IMPROVEMENTS

L. List any additional comments. (Attach additional sheets if necessary.)

$100,000 WAS BUDGETED FOR ROUTINE REPAIRS FOR THIS PLANT IN 2022. THESE FUNDS WERE ALLOCATED FOR VARIOUS REPAIRS INCLUDING PUMPS, PROCESS EQUIPMENT AND ANY OTHER MECHANICAL/ELECTRICAL REPAIRS REPAIRS. IN ADDITION, CAPITAL PROJECTS ARE BUDGETED AND NOT INCLUDED IN THESE NUMBERS. THIS AMOUNT DOES NOT INCLUDE WHAT IS ANNUALLY BUDGETED FOR THE COLLECTION SYSTEM.

Facility Name: ALDRIDGE CREEK WWTP

Part 11: Summary Sheet

1. Enter in the values from Parts 1 through 8 in the left column below. Add the numbers in the left column to determine the MWPP Report point total the wastewater system generated for the previous calendar year.

Actual Values	Maximum Possible
Part 1 0 points	80 points
Part 2 0 points	121 points
Part 3 6 points	40 points
Part 4 0 points	200 points
Part 5 0 points	50 points
Part 6 0 points	50 points
Part 7 0 points	121 points
Part 8 0 points	121 points
Total 6 points	783 points

2. Check the facility type that best describes the plant's treatment and disposal of wastewater.

- [x] Mechanical plant with surface water discharge
- [ ] Aerated Lagoon or stabilization pond with surface water discharge
- [ ] Mechanical plant using land disposal of liquid wastes
- [ ] Aerated Lagoon or stabilization pond using land disposal of liquid wastes

3. Check the range that describes the action needed to address problems identified in the report.

- [x] 0 - 70 points Actions as Appropriate*
- [ ] 71 - 120 points Departmental Recommendation Range*
- [ ] 121 – 783 points Municipality Action Range*

***Other actions may be required by NPDES outside the scope of this report.**

4. Complete the *Municipal Water Pollution Prevention Resolution Form*, ADEM Form 418.

5. In Question 1, do any of the actual point values in the left column equal the maximum possible points in the right column?

(Check the appropriate response.) ☐ Yes ■ No

If yes, provide a written explanation for this situation in the space below.

ALABAMA POTW'S SEWAGE SLUDGE SURVEY *

Facility Background Information:

1. Facility Information

Permit Number: AL0056855

Name: ALDRIDGE CREEK WASTEWATER TREATMENT PLANT

Street Address: 13331 MEMORIAL PARKWAY S

County: MADISON

2. Facility Contact

Name: SHANE L. COOK

Title: DIRECTOR OF WATER POLLUTION CONTROL

Telephone: 256-883-3719

Permittee Name: CITY OF HUNTSVILLE

Mailing Address: 1800 VERMONT ROAD

HUNTSVILLE, AL 35802

Facility Flow Information

1. Facility Wastewater Treatment Capacity

Avg. Daily Flow for 2022: 4.65 MGD

Facility Design Capacity: 8.4 MGD

2. Estimated Septage Quantity Handled (Residuals Removed from Septic Tank Systems)

Average Domestic Septage: 0 gallons per month

Average Commercial Septage: 0 gallons per month

3. Method of Septage Processing

☐ Mixed with Influent Wastewater for Treatment

☐ Mixed with Sewage Sludge

☐ _____

4. Estimated Percentage Contributing Wastewater Flow

Residential: 93 %

Industrial: 2 %

Other: 5 % Describe: Commercial

5. List type of wastewater treatment process(es) utilized at this facility:

HEADWORKS, EXTENDED AERATION OXIDATION DITCH, SECONDARY CLARIFIER, CHLORINATION

6. Estimated sewage sludge wasting rate at this facility: 2323 lb/day dry weight

or _____ gallons per day

7. Estimated untreated sludge received from off site: 0 lb/day dry weight

or _____ gallons per day

8. Estimated percent solids of combined sewage sludge prior to treatment: 70 %

9. List the sewage sludge treatment processes used in preparing sludge for final use or disposal:

	Sludge Quantity (untreated pounds per day)
N/A	

10. Estimate the total volume of sludge generated: 424 (dry U.S. tons per year)

Sludge Disposal Methods

1. Which of the following describes the current method of sewage sludge disposal for this facility:

	Current Practices			Proposed Practices	
	Approved by ADEM		Quantity	Approved by ADEM	
	Yes	No	(dry U.S. tons/year)	Yes	No
a. ☐ Land Application, Bulk Shipped					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
b. ☐ Land Application, Bagged/Other Container					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
c. x Incineration	x	☐	424	x	☐
d. ☐ Subtitle D Landfill (Disposal Only)	☐	☐		☐	☐
e. ☐ Lined Treatment Lagoon or Stabilization Pond	☐	☐		☐	☐
f. ☐ Unlined Lagoon or Stabilization Pond	☐	☐		☐	☐
g. ☐ Other (Please Describe)	☐	☐		☐	☐

2. If "f" was selected above and sludge is stored for 2 or more years, enter the distance between the surface disposal site and the property line: _____ feet

Pollutant Concentrations

1. Enter the total concentrations of the following analytes using existing data. Do not enter TCLP results.

Analyte	Concentration (mg/kg or ppm)	Sample Type	Sample Date	Detection Level of Analysis

Arsenic				
Cadmium				
Chromium				
Copper				
Lead				
Mercury				
Molybdenum				
Nickel				
Selenium				
Zinc				
Ammonium-Nitrogen				
Nitrate-Nitrogen				
Total Kjeldahl Nitrogen				

2. Enter the estimated or determined percent solids of the sewage sludge when sampled for the above analysis: _____ %

Treatment Provided for Sewage Sludge at the Facility

1. Which class of pathogen reduction does the sewage sludge meet at the facility? (As defined in 40 CFR Part 503)

- ☐ Class A
  - ☐ Alternative A1 - Time and Temperature
  - ☐ Alternative A2 - Alkaline Treatment
  - ☐ Alternative A3 - Analysis and Operation
  - ☐ Alternative A4 - Analysis Only
  - ☐ Alternative A5 - Processes to Further Reduce Pathogens (PFRP)
    - ☐ Heat Drying ☐ Thermophilic Aerobic Digestion ☐ Heat Treatment
    - ☐ Pasteurization ☐ Gamma Ray Irradiation ☐ Beta Ray Irradiation
    - ☐ Composting ☐ ☐
  - ☐ Alternative A6 - PFRP Equivalent _____

- ☐ Class B
  - ☐ Alternative B1 - Fecal Coliform Count
  - ☐ Alternative B2 - Process to Significantly Reduce Pathogens (PSRP)
    - ☐ Aerobic Digestion ☐ Air Drying ☐ Anaerobic Digestion
    - ☐ Composting ☐ Lime Stabilization
  - ☐ Alternative B3 - PSRP Equivalent _____
- ☐ Neither or Unknown

Vector Attraction Control

- ☐ Option 1 - Minimum 38% Reduction in Volatile Solids
- ☐ Option 2 - Anaerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 3 - Aerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 4 - Specific Oxygen Uptake Rate (SOUR) for Aerobically Digested Sludge
- ☐ Option 5 - Aerobic Processes plus Elevated Temperature
- ☐ Option 6 - Raised pH to 12 and Retained at 11.5
- ☐ Option 7 - 75% Solids with no Unstabilized Solids
- ☐ Option 8 - 90% Solids with Unstabilized Solids
- ☐ Option 9 - Injection Below Land Surface
- ☐ Option 10 - Incorporation into Soil within 6 or 8 Hours
- ☐ Option 11 Covering Active Sewage Sludge Unit Daily
- ☐ None of the Above

Groundwater Monitoring

1. If disposal practice is surface disposal or land application, is groundwater monitoring required or performed at the site?

- ☐ Yes
- ☐ No

(If yes, please submit a copy of the groundwater monitoring reports along with this survey. Also please provide the approximate depth to groundwater and the groundwater monitoring procedures used to obtain the data.)

Land Application of Sewage Sludge

Answer the following questions if sewage sludge is applied to land.

1. If sewage sludge is land applied in bulk form, what type of crop or other vegetation is grown on this site?

N/A

2. If sewage sludge is land applied in bulk form, what is the nitrogen requirement for this crop or vegetation?

N/A

3. If sewage sludge is land applied in bulk form, briefly describe the nature of any complaints filed from neighbors?

N/A

* Permittees that submitted the "Annual Report Review Form" for sludge to the EPA may submit a copy with the MWPP in lieu of Attachment 3.

PLANT AND COLLECTION SYSTEM PERSONNEL INVENTORY

FACILITY NAME: ALDRIDGE CREEK WWTP PLANT GRADE: IV

PERMIT NUMBER: AL0056855

PLANT SUPERINTENDENT: Mark Rittman TEL. # (256)883-3719

SYSTEM MANAGER: Shane Cook TEL. # (256)883-3719

PLANT OPERATORS:

	NAME	GRADE OR TRAINEE STATUS	OPERATOR NO.	EXP. DATE
1	Mark Rittman	IV	C002451	03/31/26
2	Sharee White	IV	C009530	08/31/25
3	Blake Thorson	IV	C004348	06/30/24
4	John W. Wheeler	IV	C002654	3/31/24
5	Luke Ramsey	IV	C009279	1/15/25
6	Skylar Renfroe	IV	C009597	9/30/23

COLLECTION SYSTEM OPERATORS:

1.	Travis Hampton	IC	C008857	1/31/25
2.	Joshua Pence	IC	C004904	12/31/25
3.	Perrin Cole	IC	C008863	1/31/25
4.	Bryan Sharp	IC	C009238	9/30/2025

	MAN HRS./WK	NUMBER
MANAGEMENT/SUPERVISOR	40	1
OPERATOR(S):		
GRADE I-C	120	4
GRADE I		
GRADE II		
GRADE III		
GRADE IV	252	6
DESIGNATED TRAINEE(S)		
LABORATORY		
MAINTENANCE	120	3
OTHER PLANT WORKERS		

AVERAGE NUMBER OF EMPLOYEES PER SHIFT:

1ST	2
2ND	1
3RD	

START TIME	6:00
	18:00

OPERATOR SHIFTS NORMALLY WORKED EACH DAY:

	SUN	MON	TUES	WED	THURS	FRI	SAT
1ST	✓	✓	✓	✓	✓	✓	✓
2ND	✓	✓	✓	✓	✓	✓	✓

ADEM USE ONLY

	YES	NO
1. DOES PLANT OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		
2. DOES COLLECTION SYSTEM OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		

MUNICIPAL WATER POLLUTION PREVENTION (MWPP)

ANNUAL REPORT

SUBMITTED BY:

TREATMENT FACILITY: BIG COVE WWTP NPDES #: AL0055042

MUNICIPALITY: HUNTSVILLE COUNTY: MADISON

CONTACT PERSON: SHANE COOK
Responsible Official
DIRECTOR OF WATER POLLUTION CONTROL
Title
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: shane.cook@huntsvilleal.gov

CHIEF OPERATOR: LYLE GILLILAND
Name
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: lyle.gilliland@huntsvilleal.gov
Date: MAY 20, 2022

REVIEWED BY:
Consulting Engineer
Telephone #: Fax #:
Date:

MWPP Annual Report
Information Source List

The following information will be needed to complete the compliance maintenance report that covers the calendar year of 2022 (due **May 31,** 2023).

Part 1
A. The average plant influent flow for each month (million gallons per day/MGD) during the year.
B. The average plant influent BOD (CBOD) for each month (mg/l and lb/day) in the year.
C. The plant's average design flow (MGD) and design BOD (CBOD) loading (lbs/day).

Part 2
A. The monthly average permit and DMR effluent concentration for BOD (CBOD), TSS, NH3-N, and/or TKN in mg/l for the year
B. The monthly average effluent limits and DMR loading for BOD (CBOD), TSS, NH3-N, and/or TKN in lbs/day for the year

Part 3 The age of the treatment plant defined as the number of years since the last major reconstruction to increase the organic or hydraulic capacity of the plant. The last calendar year minus the year the new construction was brought on-line.

Part 4 Bypass and overflow information. This is the number of bypass or overflow events of untreated wastewater due to heavy rain or equipment failure whether intentional or inadvertent from all collection systems tributary to the treatment facility.

Part 5
A. Describe the characteristics and quantity of sludge generated.
B. If sludge is landspread, how many months of sludge storage does the plant have? This should include on-site and off-site storage from the treatment plant. The digestor capacity may be used in the calculation.

Part 6
A. Sludge Disposal Method
B. The number of approved land disposal sites for sludge available, and how many months or years these disposal sites will these be available for use.

Part 7 The number of sewer extensions installed in the community last year, the design population, design flow, and design BOD (CBOD) for each sewer extension.

Part 8 Operator Certification

Part 9 Financial Status

Part 10 Subjective Evaluation

Part 11 Summary Sheet

Instructions to the Operator-in-Charge

1. Complete all sections of the MWPP Report to the best of your ability.

2. Parts 1 through 8 contain questions for which points will be generated. These points are intended to communicate to the Department and the governing body or owner the actions necessary to prevent effluent violations. Enter the point totals from Parts 1 through 8 on Part 11: Summary Sheet.

3. Add the point totals on Part 11: Summary Sheet.

4. Submit the MWPP Report to the governing body and the consulting engineer and owner for review and approval.

5. The governing body should pass a resolution which contains the following points:

   a. The resolution should acknowledge the governing body or owner has reviewed the MWPP Report.

   b. The resolution should indicate what actions will be taken to prevent effluent violations.

   c. The resolution should provide any other information the governing body or owner deems appropriate.

6. **The MWPP Report and the resolution must be submitted by May 31st to Municipal Section, Water Division, ADEM, P.O. Box 301463, Montgomery, AL 36130-1463.**

Facility Name: BIG COVE WWTP

Part 1: Influent Loading/Flows

A. List the average monthly volumetric flows and BOD_5 ($CBOD_5$) loadings received at your facility during the last calendar year.

Month	Column 1 Average Monthly Flowrate (MGD)	Column 2 Average Monthly BOD_5 ($CBOD_5$) Concentration (mg/l)	Column 3 Average Loading BOD_5 ($CBOD_5$) (lbs/day**)
January	4.36	103	3743
February	4.09	144	4920
March	4.36	121	4383
April	3.38	134	3788
May	2.77	161	3725
June	2.54	195	4126
July	2.28	146	2781
August	2.3	156	2989
September	2.3	153	2936
October	1.95	186	3039
November	2.13	183	3246
December	4.32	96	3444
Annual Avg.	3.06	148	3593

** As reported on NPDES Discharge Monitoring Reports (DMRs) and as required by EPA's NPDES Self-Monitoring System, User Guide, March 1985.

B. List the average design flow and average design BOD_5 ($CBOD_5$) loading for the facility below. If you are not aware of these design quantities, contact your consulting engineer.

	Average Design Flow (MGD)	Average Design BOD_5 ($CBOD_5$) Loading (lbs/day)
Design Criteria	6.0	6676
90% of the Design Criteria	5.4	6008

C. How many times did the monthly flow (Column 1) to the WWTP exceed 90% of design flow?

0 (Check the appropriate point total)

■ 0 - 4 = 0 points ☐ 5 or more = 5 points

D. How many times did the monthly flow (Column 1) to the WWTP exceed the design flow?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 – 2 = 5 points ☐ 3 – 4 =10 points ☐ 5 or more =15 points

E. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed 90% of the design loading?

0 (Check the appropriate point total)

■ 0 -1 = 0 points ☐ 2 – 4 =5 points ☐ 5 or more =10 points

F. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed the design loading?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 = 10 points ☐ 2 =20 points ☐ 3 =30 points ☐ 4 =40 points ☐ 5 or more =50 points

G. Enter each point value marked for C through F and enter the sum in the appropriate blank below.

C points = 0

D points = 0

E points = 0

F points = 0

TOTAL POINTS VALUE FOR PART 1 0

Enter this value on Part 11: Summary Sheet.

*To obtain equivalent BOD_5 loading for comparison with design loading for those permittees using influent $CBOD_5$, divide annual average $CBOD_5$, loading in lbs/day from Part 1, A by 0.7.

Facility Name: BIG COVE WWTP

Part 2: Effluent Quality/Plant Performance

A. List the monthly average permit limits for the facility in the blanks below and the average monthly effluent DMR BOD_5, ($CBOD_5$) TSS, NH_3-N and/or TKN concentration produced by the facility during the last calendar year.

(1) NPDES Permit Concentration

	Months	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
Permit Limit	12-4	25	30	10	N/A
	5-11	10	30	4	N/A

(2) DMR Concentration

Qtr	Month	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
1	January	7.6	9.4	1.7	4.8
	February	6.6	6.9	1.1	5.3
	March	5.4	4.3	0.6	3.1
2	April	6.1	4.7	0.3	2.2
	May	6	3.8	0.7	8.6
	June	6.8	3.3	0.3	10.4
3	July	5.7	2.6	0.2	5.8
	August	6.5	2.4	0.1	5.6
	September	6.5	7.7	1.5	15
4	October	5.5	1.8	0.1	7.4
	November	5.7	5.2	0.8	13.7
	December	5.3	3.9	1.8	2.1
	Annual Avg.	6.1	4.6	0.8	7

B. List the monthly average permit limit and DMR loadings below.

(1) NPDES Permit Loading

	Months	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
Permit Limit	12-4	1251	1501	500	N/A
	5-11	500	1501	200	N/A

(2) DMR Loading

Qtr	Month	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
1	January	275	341	62	175
	February	223	235	38	181
	March	196	155	21	114
2	April	173	133	8	62
	May	139	88	16	198
	June	144	69	6	220
3	July	108	49	4	110
	August	125	45	3	108
	September	124	147	29	288
4	October	89	29	2	120
	November	101	93	15	244
	December	190	139	65	76
	Annual Avg.	157	127	22	158

C. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any consecutive quarters? (Check the appropriate point total.)

■ No = 0 points ☐ Yes = 121 points

D. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

E. During the past year did the effluent TSS concentration (mg/l) or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

F. During the past year did the TSS concentration (mg/l) and/or loading (lbs/day) exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

G. During the past year did the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

H. During the past year did either the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

I. Enter each point value checked for C through H in the blanks below.

C Points = 0
D Points = 0
E Points = 0
F Points = 0
G Points = 0
H Points = 0

HIGHEST INDIVIDUAL POINT VALUE FOR PART 2 (C-H) 0 (HIGHEST POINT = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: BIG COVE WWTP

Part 3: Age of the Wastewater Treatment Facility

A. What year was the wastewater treatment plant constructed or last reconstructed? 2014

Subtract the above answer from the report year to determine age:

Age = (Last Calendar year) - (Answer to A)

Age 8 = (2022) - (2014)

Enter Age in Part C below.

B. Check the type of treatment facility employed.

		Factor
X	Mechanical Treatment Plant	2.0
	Aerated Lagoon	1.5
	Stabilization Pond	1.0
	Other (Specify:)	1.0

C. Multiply the factor listed next to the type of the facility your community employs by the age of your facility to determine the total point value for Part 3:

2 (Factor) x 8 (Age) = 16 TOTAL POINT VALUE FOR PART 3

Enter the above value on Part 11: Summary Sheet. If the total point value exceeds 40, enter 40 on Part 11: Summary Sheet.

Facility Name: BIG COVE WWTP

Part 4: Bypassing and Overflows

A. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to heavy rain? 0

B. How many bypass or overflow events of untreated wastewater occurred in the last year prior to the headworks of the WWTP due to heavy rain? 0

C. How many of the bypass or overflow events listed in Parts A and B have been corrected such that future bypass or overflow events at the same location due to heavy rain are not anticipated? 0

D. Add together Answers A and B and subtract Answer C from that total.

A + B – C = 0 (Check the appropriate point total.)

- [x] 0 = 0 points
- [ ] 1 = 5 points
- [ ] 2 =10 points
- [ ] 3 =15 points
- [ ] 4 =20 points
- [ ] 5 =25 points
- [ ] 6 = 30 points
- [ ] 7 = 35 points
- [ ] 8 =40 points
- [ ] 9 =45 points
- [ ] 10 =50 points
- [ ] 11 or more =100 points

E. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to equipment failure? (This includes clogged/broken lines or manholes.) 0

F. How many bypass or overflow events of untreated wastewater occurred in the last year due to equipment failure prior to the headworks of the WWTP? (This includes clogged/broken lines or manholes.) 0

G. How many of the bypass or overflow events listed in Parts E and F have been corrected such that future bypass or overflow events at the same location due to the same equipment failure are not anticipated? 0

H. Add together Answers E and F and subtract Answer G from that total.

E + F – G = 0 (Check the appropriate point total.)

- [x] 0 = 0 points
- [ ] 1 = 5 points
- [ ] 2 =10 points
- [ ] 3 =15 points
- [ ] 4 =20 points
- [ ] 5 =25 points
- [ ] 6 = 30 points
- [ ] 7 = 35 points
- [ ] 8 =40 points
- [ ] 9 =45 points
- [ ] 10 =50 points
- [ ] 11 or more =100 points

I. Add point values checked in D and H and enter the total in the blank below.

TOTAL POINT VALUE FOR PART 4 0
Enter this value on Part 11: Summary Sheet.

All bypass or overflow events that have occurred in the last year (for any reason) must be individually reported with this MWPP report.

Facility Name: BIG COVE WWTP

Part 5: Sludge Quantity and Storage

A. Please provide information concerning sludge quantity, characteristics, and storage practices based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months of sludge storage capacity does the wastewater treatment facility have available, either on-site or off-site? (i.e., How many months can the facility operate without land spreading or disposing of sludge?) _____

(Check the appropriate point total.)

Greater than or equal to 4 months	☒	= 0 points
Less than 4 months, but greater than or equal to 3 months	☐	= 10 points
Less than 3 months, but greater than or equal to 2 months	☐	= 20 points
Less than 2 months, but greater than or equal to 1 month	☐	= 30 points
Less than one month	☐	= 50 points

TOTAL POINT VALUE FOR PART 5 0
Enter this value on Part 11: Summary Sheet.

Part 6: Sludge Disposal Practices and Sites

A. Please provide the sludge disposal practices and site information based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months or years does the facility have access to and approval for sufficient land disposal sites to provide proper land disposal? (Check the appropriate point total.)

36 or more months	■	= 0 points
24 - 35 months	☐	= 10 points
12 - 23 months	☐	= 20 points
6 - 11 months	☐	= 30 points
Less than 6 months	☐	= 50 points

TOTAL POINT VALUE FOR PART 6 0
Enter this value on Part 11: Summary Sheet.

Facility Name: BIG COVE WWTP

Part 7: New Development

Are there any major new developments (industrial, commercial, or residential) in the last calendar year or anticipated in the next 2-3 years such that either flow or BOD_5 ($CBOD_5$) loadings to the sewage system could significantly increase? Estimate additional loadings below.

Design Population Equivalent (PE): 3000 Design Flow: 0.50 MGD Design BOD_5 ($CBOD_5$): 600 lbs/day

List industrial and/or residential developments.

NEW SUBDIVISIONS TOTALING
APPROXIMATELY 1000 LOTS.
60% CAPACITY REMAINS

Will the additional loading overload the plant?
(Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

Enter the point total in the blank below.

TOTAL POINT VALUE FOR PART 7 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Part 8: Operator Certification

Complete the *Plant and Collection System Personnel Inventory,* ADEM Form 441.

Do both the plant operator and collection system staffing comply with ADEM Administrative Code; Division 10, Operator Certification Program?
(Check the appropriate point total.)

☒ Yes = 0 points ☐ No = 121 points

TOTAL POINT VALUE FOR PART 8 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: BIG COVE WWTP

Part 9: Financial Status

A. Are User-Charge Revenues sufficient to cover operation and maintenance expenses? If no, how are O&M costs being financed? ***Include user charge rates***.

YES

Residential Minimum 0 Plus rate 4.83 /1,000 gal.

Industrial Minimum 0 Plus rate 4.83 /1,000 gal.

Monthly residential rate based on 6,000 gallons usage $ 28.98

B. What financial resources are available to pay for the wastewater improvements and/or reconstruction needs?

ADEQUATE USER CHARGE SYSTEM WITH A+ BOND RATING FROM STANDARD & POORS.

C. Please attach a rate sheet and the most recent audit, if available.

Part 10: Subjective Evaluation

A. Describe briefly the physical and structural conditions of the wastewater treatment facility.

ALL CONCRETE AND METAL STRUCTURES ARE IN GOOD CONDITION. THERE CURRENTLY EXISTS NO PROBLEMS WITH PREMATURE FAILURE DUE TO CORROSION OR DIFFERENTIAL SETTLING. WWTP UPGRADES CONTINUE.

B. Describe the general condition of the sewer system (sewer lines, manholes, lift stations).

CLEAR WATER INTRUSION FOR THE FACILITY IS ESTIMATED AT 25%. INFLOW AND INFILTRATION PROJECTS CONTINUE FOR SERVICE AREA.

C. What sewage system improvements does the community have planned for construction in the next 5 years?

UPGRADES TO INFLUENT PUMP STATION, PUMPING EQUIPMENT, AND SLUDGE HOLDING TANK, ALONG WITH SANITARY SEWER REHABILITATION PROJECTS.

D. What is the theoretical design life of the plant, and what is the estimated remaining useful life of the wastewater treatment facility?

DESIGN LIFE IS 50 YEARS. REMAINING LIFE IS 45 YEARS.

E. What problems, if any, over the last year have threatened treatment or conveyance within the system?

NONE

F. Is the community presently involved in formal planning for treatment facility upgrading?

YES. FUNDING IS IN PLACE TO ADEQUATELY PLAN FOR ANY GROWTH. ALL PROJECTS AND CONTRACTS ARE APPROVED IN PUBLIC FORUM.

G. How many days in the last year were there residential backups at any point in the collection system for any reason other than clogging of the lateral connection? 0

H. Does the plant have a written plan for preventive maintenance on major equipment items? If yes, describe.

YES. ELECTRICAL:MEG-OHM, AMP CHECK. MECHANICAL:LUBRICATION OF ALL BEARINGS,SEALS,ETC. THESE TASKS ARE PREFORMED FROM PREVENTATIVE MAINTENANCE LOGS AND TRACKED THROUGH DEPARTMENT DATABASES.

Facility Name: BIG COVE WWTP

Part 11: Summary Sheet

1. Enter in the values from Parts 1 through 8 in the left column below. Add the numbers in the left column to determine the MWPP Report point total the wastewater system generated for the previous calendar year.

Actual Values	Maximum Possible
Part 1 0 points	80 points
Part 2 0 points	121 points
Part 3 16 points	40 points
Part 4 0 points	200 points
Part 5 0 points	50 points
Part 6 0 points	50 points
Part 7 0 points	121 points
Part 8 0 points	121 points
Total 16 points	783 points

2. Check the facility type that best describes the plant's treatment and disposal of wastewater.

- [x] Mechanical plant with surface water discharge
- [ ] Aerated Lagoon or stabilization pond with surface water discharge
- [ ] Mechanical plant using land disposal of liquid wastes
- [ ] Aerated Lagoon or stabilization pond using land disposal of liquid wastes

3. Check the range that describes the action needed to address problems identified in the report.

- [x] 0 - 70 points Actions as Appropriate*
- [ ] 71 - 120 points Departmental Recommendation Range*
- [ ] 121 – 783 points Municipality Action Range*

***Other actions may be required by NPDES outside the scope of this report.**

4. Complete the *Municipal Water Pollution Prevention Resolution Form*, ADEM Form 418.

5. In Question 1, do any of the actual point values in the left column equal the maximum possible points in the right column?

(Check the appropriate response.) ☐ Yes ■ No

If yes, provide a written explanation for this situation in the space below.

I. Does this preventive maintenance program depict frequency of intervals, types of lubrication, and other preventive maintenance tasks necessary for each piece of equipment?

(Check the appropriate response.) ■ Yes ☐ No

J. Are these preventive maintenance tasks, as well as equipment problems, being recorded and filed so future maintenance problems can be assessed properly?

(Check the appropriate response.) ■ Yes ☐ No

K. Describe any major repairs or mechanical equipment replacement made in the last year and include the approximate cost for those repairs. Do not include major treatment plant construction or upgrading programs.

250,000 UPGRADES TO RAS/WAS FACILITY AND MECHANICAL EQUIPMENT

175,000 COLLECTION SYSTEM REPAIRS

125,000 PROCESS TRAIN & EQUIPMENT REPAIRS

L. List any additional comments. (Attach additional sheets if necessary.)

$150,000 WAS BUDGETED FOR ROUTINE REPAIRS FOR THIS PLANT IN 2022. THESE FUNDS WERE ALLOCATED FOR VARIOUS REPAIRS INCLUDING PUMPS, PROCESS EQUIPMENT AND ANY OTHER MECHANICAL/ELECTRICAL REPAIRS REPAIRS. IN ADDITION, CAPITAL PROJECTS ARE BUDGETED AND NOT INCLUDED IN THESE NUMBERS. THIS AMOUNT DOES NOT INCLUDE WHAT IS ANNUALLY BUDGETED FOR THE COLLECTION SYSTEM.

PLANT AND COLLECTION SYSTEM PERSONNEL INVENTORY

FACILITY NAME: BIG COVE WWTP PLANT GRADE: IV

PERMIT NUMBER: AL0055042

PLANT SUPERINTENDENT: Lyle Gilliland TEL. # 256-883-3719

SYSTEM MANAGER: Shane Cook TEL. # 256-883-3719

PLANT OPERATORS:

NAME	GRADE OR TRAINEE STATUS	OPERATOR NO.	EXP. DATE
1. Lyle Gilliland	IV	C000559	06/30/25
2. Kenneth Barecky	IV	C006511	6/30/26
3. Joseph Goss	IV	C006469	1/31/25
4. Ben Thompson	IV	C009896	12/31/24
5 Dustin Yarbrough	IV	C004265	4/30/25
6 Don McIlhargey	IV	C006803	9/30/25
7			

COLLECTION SYSTEM OPERATORS:

1. Daniel Duskin	IC	C000759	5/31/24
2. Christopher Beck	IC	C008674	1/31/25
3. Mike Duffy	IC	C000482	8/31/25
4. Michael Hall	IC	C004613	1/31/2025

	MAN HRS./WK	NUMBER
MANAGEMENT/SUPERVISOR	40	1
OPERATOR(S):		
GRADE I-C	60	4
GRADE I		
GRADE II		
GRADE III		
GRADE IV	200	6
DESIGNATED TRAINEE(S)		
LABORATORY		
MAINTENANCE	40	2
OTHER PLANT WORKERS		

AVERAGE NUMBER OF EMPLOYEES PER SHIFT:

1ST	2	START TIME	6:00 AM
2ND	1		6:00 PM

OPERATOR SHIFTS NORMALLY WORKED EACH DAY:

	SUN	MON	TUES	WED	THURS	FRI	SAT
1ST	12	12	12	12	12	12	12
2ND	12	12	12	12	12	12	12

ADEM USE ONLY

	YES	NO
1. DOES PLANT OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?	X	
2. DOES COLLECTION SYSTEM OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?	X	

ALABAMA POTW'S SEWAGE SLUDGE SURVEY *

Facility Background Information:

1. Facility Information

Permit Number: AL0055042

Name: BIG COVE WWTP
Street Address: 260 ROUNDBAR DR
County: MADISON

2. Facility Contact

Name: Shane L. Cook
Title: DIRECTOR OF WATER POLLUTION CONTROL
Telephone: 256-883-3719
Permittee Name: CITY OF HUNTSVILLE
Mailing Address: 1800 VERMONT ROAD
HUNTSVILLE, AL 35802

Facility Flow Information

1. Facility Wastewater Treatment Capacity

Avg. Daily Flow for 2022: 3.06 MGD
Facility Design Capacity: 6.00 MGD

2. Estimated Septage Quantity Handled (Residuals Removed from Septic Tank Systems)

Average Domestic Septage: 0 gallons per month
Average Commercial Septage: 0 gallons per month

3. Method of Septage Processing

- ☐ Mixed with Influent Wastewater for Treatment
- ☐ Mixed with Sewage Sludge
- ☐ _____

4. Estimated Percentage Contributing Wastewater Flow

Residential: 95 %
Industrial: 0 %
Other: 5 % Describe: Commercial

5. List type of wastewater treatment process(es) utilized at this facility:

OXIDATION DITCH, FINAL CLARIFICATION, CHLORINATION

6. Estimated sewage sludge wasting rate at this facility: 3403 lb/day dry weight
or _____ gallons per day

7. Estimated untreated sludge received from off site: 0 lb/day dry weight
or _____ gallons per day

8. Estimated percent solids of combined sewage sludge prior to treatment: 70 %

9. List the sewage sludge treatment processes used in preparing sludge for final use or disposal:

	Sludge Quantity (untreated pounds per day)
N/A	

10. Estimate the total volume of sludge generated: 621 (dry U.S. tons per year)

Sludge Disposal Methods

1. Which of the following describes the current method of sewage sludge disposal for this facility:

	Current Practices: Approved by ADEM Yes	Current Practices: Approved by ADEM No	Current Practices: Quantity (dry U.S. tons/year)	Proposed Practices: Approved by ADEM Yes	Proposed Practices: Approved by ADEM No
a. ☐ Land Application, Bulk Shipped					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
b. ☐ Land Application, Bagged/Other Container					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
c. X Incineration	X	☐	621	X	☐
d. ☐ Subtitle D Landfill (Disposal Only)	☐	☐		☐	☐
e. ☐ Lined Treatment Lagoon or Stabilization Pond	☐	☐		☐	☐
f. ☐ Unlined Lagoon or Stabilization Pond	☐	☐		☐	☐
g. ☐ Other (Please Describe)	☐	☐		☐	☐

2. If "f" was selected above and sludge is stored for 2 or more years, enter the distance between the surface disposal site and the property line: _____ feet

Pollutant Concentrations

1. Enter the total concentrations of the following analytes using existing data. Do not enter TCLP results.

Analyte	Concentration (mg/kg or ppm)	Sample Type	Sample Date	Detection Level of Analysis

Arsenic				
Cadmium				
Chromium				
Copper				
Lead				
Mercury				
Molybdenum				
Nickel				
Selenium				
Zinc				
Ammonium-Nitrogen				
Nitrate-Nitrogen				
Total Kjeldahl Nitrogen				

2. Enter the estimated or determined percent solids of the sewage sludge when sampled for the above analysis: _____%

Treatment Provided for Sewage Sludge at the Facility

1. Which class of pathogen reduction does the sewage sludge meet at the facility? (As defined in 40 CFR Part 503)

- ☐ Class A
  - ☐ Alternative A1 - Time and Temperature
  - ☐ Alternative A2 - Alkaline Treatment
  - ☐ Alternative A3 - Analysis and Operation
  - ☐ Alternative A4 - Analysis Only
  - ☐ Alternative A5 - Processes to Further Reduce Pathogens (PFRP)
    - ☐ Heat Drying ☐ Thermophilic Aerobic Digestion ☐ Heat Treatment
    - ☐ Pasteurization ☐ Gamma Ray Irradiation ☐ Beta Ray Irradiation
    - ☐ Composting ☐ ☐
  - ☐ Alternative A6 - PFRP Equivalent _____

- ☐ Class B
  - ☐ Alternative B1 - Fecal Coliform Count
  - ☐ Alternative B2 - Process to Significantly Reduce Pathogens (PSRP)
    - ☐ Aerobic Digestion ☐ Air Drying ☐ Anaerobic Digestion
    - ☐ Composting ☐ Lime Stabilization
  - ☐ Alternative B3 - PSRP Equivalent _____
- ☐ Neither or Unknown

Vector Attraction Control

- ☐ Option 1 - Minimum 38% Reduction in Volatile Solids
- ☐ Option 2 - Anaerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 3 - Aerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 4 - Specific Oxygen Uptake Rate (SOUR) for Aerobically Digested Sludge
- ☐ Option 5 - Aerobic Processes plus Elevated Temperature
- ☐ Option 6 - Raised pH to 12 and Retained at 11.5
- ☐ Option 7 - 75% Solids with no Unstabilized Solids
- ☐ Option 8 - 90% Solids with Unstabilized Solids
- ☐ Option 9 - Injection Below Land Surface
- ☐ Option 10 - Incorporation into Soil within 6 or 8 Hours
- ☐ Option 11 Covering Active Sewage Sludge Unit Daily
- ☐ None of the Above

Groundwater Monitoring

1. If disposal practice is surface disposal or land application, is groundwater monitoring required or performed at the site?

- ☐ Yes
- ☐ No

(If yes, please submit a copy of the groundwater monitoring reports along with this survey. Also please provide the approximate depth to groundwater and the groundwater monitoring procedures used to obtain the data.)

Land Application of Sewage Sludge

Answer the following questions if sewage sludge is applied to land.

1. If sewage sludge is land applied in bulk form, what type of crop or other vegetation is grown on this site?

N/A

2. If sewage sludge is land applied in bulk form, what is the nitrogen requirement for this crop or vegetation?

N/A

3. If sewage sludge is land applied in bulk form, briefly describe the nature of any complaints filed from neighbors?

N/A

* Permittees that submitted the "Annual Report Review Form" for sludge to the EPA may submit a copy with the MWPP in lieu of Attachment 3.

EXHIBIT D

MUNICIPAL WATER POLLUTION PREVENTION (MWPP)

ANNUAL REPORT

SUBMITTED BY:

TREATMENT FACILITY: CHASE WWTP NPDES #: AL0057428

MUNICIPALITY: HUNTSVILLE COUNTY: MADISON

CONTACT PERSON: SHANE COOK
Responsible Official
DIRECTOR OF WATER POLLUTION CONTROL
Title
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: shane.cook@huntsvilleal.gov

CHIEF OPERATOR: LYLE GILLILAND
Name
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: lyle.gilliland@huntsvilleal.gov
Date: MAY 20, 2023

REVIEWED BY: _____
Consulting Engineer
Telephone #: _____ Fax #: _____
Date: _____

MWPP Annual Report
Information Source List

The following information will be needed to complete the compliance maintenance report that covers the calendar year of 2022 (due **May 31,** 2023).

Part 1
A. The average plant influent flow for each month (million gallons per day/MGD) during the year.
B. The average plant influent BOD (CBOD) for each month (mg/l and lb/day) in the year.
C. The plant's average design flow (MGD) and design BOD (CBOD) loading (lbs/day).

Part 2
A. The monthly average permit and DMR effluent concentration for BOD (CBOD), TSS, NH3-N, and/or TKN in mg/l for the year
B. The monthly average effluent limits and DMR loading for BOD (CBOD), TSS, NH3-N, and/or TKN in lbs/day for the year

Part 3 The age of the treatment plant defined as the number of years since the last major reconstruction to increase the organic or hydraulic capacity of the plant. The last calendar year minus the year the new construction was brought on-line.

Part 4 Bypass and overflow information. This is the number of bypass or overflow events of untreated wastewater due to heavy rain or equipment failure whether intentional or inadvertent from all collection systems tributary to the treatment facility.

Part 5
A. Describe the characteristics and quantity of sludge generated.
B. If sludge is landspread, how many months of sludge storage does the plant have? This should include on-site and off-site storage from the treatment plant. The digestor capacity may be used in the calculation.

Part 6
A. Sludge Disposal Method
B. The number of approved land disposal sites for sludge available, and how many months or years these disposal sites will these be available for use.

Part 7 The number of sewer extensions installed in the community last year, the design population, design flow, and design BOD (CBOD) for each sewer extension.

Part 8 Operator Certification

Part 9 Financial Status

Part 10 Subjective Evaluation

Part 11 Summary Sheet

Instructions to the Operator-in-Charge

1. Complete all sections of the MWPP Report to the best of your ability.

2. Parts 1 through 8 contain questions for which points will be generated. These points are intended to communicate to the Department and the governing body or owner the actions necessary to prevent effluent violations. Enter the point totals from Parts 1 through 8 on Part 11: Summary Sheet.

3. Add the point totals on Part 11: Summary Sheet.

4. Submit the MWPP Report to the governing body and the consulting engineer and owner for review and approval.

5. The governing body should pass a resolution which contains the following points:

   a. The resolution should acknowledge the governing body or owner has reviewed the MWPP Report.

   b. The resolution should indicate what actions will be taken to prevent effluent violations.

   c. The resolution should provide any other information the governing body or owner deems appropriate.

6. **The MWPP Report and the resolution must be submitted by May 31st to Municipal Section, Water Division, ADEM, P.O. Box 301463, Montgomery, AL 36130-1463.**

Facility Name: CHASE WWTP

Part 1: Influent Loading/Flows

A. List the average monthly volumetric flows and BOD_5 ($CBOD_5$) loadings received at your facility during the last calendar year.

Month	Column 1 Average Monthly Flowrate (MGD)	Column 2 Average Monthly BOD_5 ($CBOD_5$) Concentration (mg/l)	Column 3 Average Loading BOD_5 ($CBOD_5$) (lbs/day**)
January	1.9	147	2327
February	1.95	39	640
March	2.22	45	833
April	1.79	43	645
May	1.23	77	790
June	1.15	90	867
July	0.65	71	386
August	0.98	81	659
September	0.72	79	473
October	0.68	75	429
November	0.86	91	656
December	1.62	50	674
Annual Avg.	1.31	74	782

** As reported on NPDES Discharge Monitoring Reports (DMRs) and as required by EPA's NPDES Self-Monitoring System, User Guide, March 1985.

B. List the average design flow and average design BOD_5 ($CBOD_5$) loading for the facility below. If you are not aware of these design quantities, contact your consulting engineer.

	Average Design Flow (MGD)	Average Design BOD_5 ($CBOD_5$) Loading (lbs/day)
Design Criteria	4.0	6676
90% of the Design Criteria	3.6	6008

C. How many times did the monthly flow (Column 1) to the WWTP exceed 90% of design flow?

0 (Check the appropriate point total)

■ 0 - 4 = 0 points ☐ 5 or more = 5 points

D. How many times did the monthly flow (Column 1) to the WWTP exceed the design flow?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 – 2 = 5 points ☐ 3 – 4 =10 points ☐ 5 or more =15 points

E. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed 90% of the design loading?

0 (Check the appropriate point total)

■ 0 -1 = 0 points ☐ 2 – 4 =5 points ☐ 5 or more =10 points

F. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed the design loading?

_____ (Check the appropriate point total)

■ 0 = 0 points ☐ 1 = 10 points ☐ 2 =20 points ☐ 3 =30 points ☐ 4 =40 points ☐ 5 or more =50 points

G. Enter each point value marked for C through F and enter the sum in the appropriate blank below.

C points = 0

D points = 0

E points = 0

F points = 0

TOTAL POINTS VALUE FOR PART 1 0

Enter this value on Part 11: Summary Sheet.

*To obtain equivalent BOD_5 loading for comparison with design loading for those permittees using influent $CBOD_5$, divide annual average $CBOD_5$, loading in lbs/day from Part 1, A by 0.7.

Facility Name: CHASE WWTP

Part 2: Effluent Quality/Plant Performance

A. List the monthly average permit limits for the facility in the blanks below and the average monthly effluent DMR BOD_5, ($CBOD_5$) TSS, NH_3-N and/or TKN concentration produced by the facility during the last calendar year.

(1) NPDES Permit Concentration

	Months	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
Permit Limit	5-11	20	30	10	N/A
	12-4	25	30	20	N/A

(2) DMR Concentration

Qtr	Month	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
1	January	2.2	4.4	0.29	2
	February	3.3	4.5	0.73	1.9
	March	2.1	3.1	0.25	2
2	April	2.0	2.5	0.19	2.1
	May	3.8	2.7	0.16	4.6
	June	2.3	2.9	0.28	8.5
3	July	5.3	2.7	0.25	3.4
	August	5	2.8	0.12	3.5
	September	4.2	1.9	0.14	4.3
4	October	3.5	1.6	0.14	3.2
	November	3.5	2.1	0.1	4.9
	December	3.2	4.4	0.12	4.3
	Annual Avg.	3.4	3	0.23	3.7

B. List the monthly average permit limit and DMR loadings below.

(1) NPDES Permit Loading

	Months	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
Permit Limit	5-11	667	1000	333	N/A
	12-4	834	1000	667	N/A

(2) DMR Loading

Qtr	Month	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
1	January	34	70	5	32
	February	54	73	12	31
	March	39	58	5	37
2	April	30	37	3	31
	May	39	27	2	47
	June	22	27	3	81
3	July	29	15	1	19
	August	41	23	1	28
	September	25	11	1	26
4	October	20	9	1	18
	November	25	15	1	35
	December	43	59	2	59
	Annual Avg.	33	35	3	37

C. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any consecutive quarters? (Check the appropriate point total.)

■ No = 0 points ☐ Yes = 121 points

D. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

E. During the past year did the effluent TSS concentration (mg/l) or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

F. During the past year did the TSS concentration (mg/l) and/or loading (lbs/day) exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

G. During the past year did the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

H. During the past year did either the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

I. Enter each point value checked for C through H in the blanks below.

C Points = 0
D Points = 0
E Points = 0
F Points = 0
G Points = 0
H Points = 0

HIGHEST INDIVIDUAL POINT VALUE FOR PART 2 (C-H) 0 (HIGHEST POINT = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: CHASE WWTP

Part 3: Age of the Wastewater Treatment Facility

A. What year was the wastewater treatment plant constructed or last reconstructed? 2021

Subtract the above answer from the report year to determine age:

Age = (Last Calendar year) - (Answer to A)

Age 1 = (2022) - (2021)

Enter Age in Part C below.

B. Check the type of treatment facility employed.

	Factor
1 Mechanical Treatment Plant	2.0
_____ Aerated Lagoon	1.5
_____ Stabilization Pond	1.0
_____ Other (Specify: _____)	1.0

C. Multiply the factor listed next to the type of the facility your community employs by the age of your facility to determine the total point value for Part 3:

2 (Factor) x 1 (Age) = 2 TOTAL POINT VALUE FOR PART 3

Enter the above value on Part 11: Summary Sheet. If the total point value exceeds 40, enter 40 on Part 11: Summary Sheet.

Facility Name: CHASE WWTP

Part 4: Bypassing and Overflows

A. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to heavy rain? 0

B. How many bypass or overflow events of untreated wastewater occurred in the last year prior to the headworks of the WWTP due to heavy rain? 0

C. How many of the bypass or overflow events listed in Parts A and B have been corrected such that future bypass or overflow events at the same location due to heavy rain are not anticipated? 0

D. Add together Answers A and B and subtract Answer C from that total.

A + B – C = 0 (Check the appropriate point total.)

- [x] 0 = 0 points
- [ ] 1 = 5 points
- [ ] 2 =10 points
- [ ] 3 =15 points
- [ ] 4 =20 points
- [ ] 5 =25 points
- [ ] 6 = 30 points
- [ ] 7 = 35 points
- [ ] 8 =40 points
- [ ] 9 =45 points
- [ ] 10 =50 points
- [ ] 11 or more =100 points

E. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to equipment failure? (This includes clogged/broken lines or manholes.) 0

F. How many bypass or overflow events of untreated wastewater occurred in the last year due to equipment failure prior to the headworks of the WWTP? (This includes clogged/broken lines or manholes.) 0

G. How many of the bypass or overflow events listed in Parts E and F have been corrected such that future bypass or overflow events at the same location due to the same equipment failure are not anticipated? 0

H. Add together Answers E and F and subtract Answer G from that total.

E + F – G = 0 (Check the appropriate point total.)

- [x] 0 = 0 points
- [ ] 1 = 5 points
- [ ] 2 =10 points
- [ ] 3 =15 points
- [ ] 4 =20 points
- [ ] 5 =25 points
- [ ] 6 = 30 points
- [ ] 7 = 35 points
- [ ] 8 =40 points
- [ ] 9 =45 points
- [ ] 10 =50 points
- [ ] 11 or more =100 points

I. Add point values checked in D and H and enter the total in the blank below.

TOTAL POINT VALUE FOR PART 4 0
Enter this value on Part 11: Summary Sheet.

All bypass or overflow events that have occurred in the last year (for any reason) must be individually reported with this MWPP report.

Facility Name: CHASE WWTP

Part 5: Sludge Quantity and Storage

A. Please provide information concerning sludge quantity, characteristics, and storage practices based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months of sludge storage capacity does the wastewater treatment facility have available, either on-site or off-site? (i.e., How many months can the facility operate without land spreading or disposing of sludge?) _____

(Check the appropriate point total.)

Greater than or equal to 4 months	[X]	= 0 points
Less than 4 months, but greater than or equal to 3 months	[ ]	= 10 points
Less than 3 months, but greater than or equal to 2 months	[ ]	= 20 points
Less than 2 months, but greater than or equal to 1 month	[ ]	= 30 points
Less than one month	[ ]	= 50 points

TOTAL POINT VALUE FOR PART 5 0
Enter this value on Part 11: Summary Sheet.

Part 6: Sludge Disposal Practices and Sites

A. Please provide the sludge disposal practices and site information based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months or years does the facility have access to and approval for sufficient land disposal sites to provide proper land disposal? (Check the appropriate point total.)

36 or more months	[■]	= 0 points
24 - 35 months	[ ]	= 10 points
12 - 23 months	[ ]	= 20 points
6 - 11 months	[ ]	= 30 points
Less than 6 months	[ ]	= 50 points

TOTAL POINT VALUE FOR PART 6 0
Enter this value on Part 11: Summary Sheet.

Facility Name: CHASE WWTP

Part 7: New Development

Are there any major new developments (industrial, commercial, or residential) in the last calendar year or anticipated in the next 2-3 years such that either flow or BOD_5 ($CBOD_5$) loadings to the sewage system could significantly increase? Estimate additional loadings below.

Design Population Equivalent (PE): _____ Design Flow: _____ MGD Design BOD_5 ($CBOD_5$): _____ lbs/day

List industrial and/or residential developments.

NONE. SERVICE AREA IS APPROXIMATELY 95% DEVELOPED.

Will the additional loading overload the plant?
(Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

Enter the point total in the blank below.

TOTAL POINT VALUE FOR PART 7 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Part 8: Operator Certification

Complete the *Plant and Collection System Personnel Inventory,* ADEM Form 441.

Do both the plant operator and collection system staffing comply with ADEM Administrative Code; Division 10, Operator Certification Program?
(Check the appropriate point total.)

☒ Yes = 0 points ☐ No = 121 points

TOTAL POINT VALUE FOR PART 8 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: CHASE WWTP

Part 9: Financial Status

A. Are User-Charge Revenues sufficient to cover operation and maintenance expenses? If no, how are O&M costs being financed? ***Include user charge rates***.

YES

Residential Minimum 0 Plus rate 4.83 /1,000 gal.

Industrial Minimum 0 Plus rate 4.83 /1,000 gal.

Monthly residential rate based on 6,000 gallons usage $ 28.98

B. What financial resources are available to pay for the wastewater improvements and/or reconstruction needs?

ADEQUATE USER CHARGE SYSTEM WITH A+ BOND RATING FROM STANDARD & POORS.

C. Please attach a rate sheet and the most recent audit, if available.

Part 10: Subjective Evaluation

A. Describe briefly the physical and structural conditions of the wastewater treatment facility.

ALL CONCRETE AND METAL STRUCTURES ARE IN GOOD CONDITION. THERE CURRENTLY EXISTS NO PROBLEMS WITH PREMATURE FAILURE DUE TO CORROSION OR DIFFERENTIAL SETTLING. WWTP UPGRADES CONTINUE.

B. Describe the general condition of the sewer system (sewer lines, manholes, lift stations).

CLEAR WATER INTRUSION FOR THE FACILITY IS ESTIMATED AT 15%. INFLOW AND INFILTRATION PROJECTS CONTINUE FOR SERVICE AREA.

C. What sewage system improvements does the community have planned for construction in the next 5 years?

INFLUENT PUMP STATION UPGRADES

DISINFECTION FACILITY UPGRADES

D. What is the theoretical design life of the plant, and what is the estimated remaining useful life of the wastewater treatment facility?

DESIGN LIFE IS 50 YEARS. REMAINING LIFE IS 50 YEARS.

E. What problems, if any, over the last year have threatened treatment or conveyance within the system?

NONE

F. Is the community presently involved in formal planning for treatment facility upgrading?

YES. FUNDING IS IN PLACE TO ADEQUATELY PLAN FOR ANY GROWTH. ALL PROJECTS AND CONTRACTS ARE APPROVED IN PUBLIC FORUM.

G. How many days in the last year were there residential backups at any point in the collection system for any reason other than clogging of the lateral connection? 0

H. Does the plant have a written plan for preventive maintenance on major equipment items? If yes, describe.

YES. ELECTRICAL:MEG-OHM, AMP CHECK. MECHANICAL:LUBRICATION OF ALL BEARINGS,SEALS,ETC. THESE TASKS ARE PREFORMED FROM PREVENTATIVE MAINTENANCE LOGS AND TRACKED THROUGH DEPARTMENT DATABASES.

I. Does this preventive maintenance program depict frequency of intervals, types of lubrication, and other preventive maintenance tasks necessary for each piece of equipment?

(Check the appropriate response.) ☒ Yes ☐ No

J. Are these preventive maintenance tasks, as well as equipment problems, being recorded and filed so future maintenance problems can be assessed properly?

(Check the appropriate response.) ☒ Yes ☐ No

K. Describe any major repairs or mechanical equipment replacement made in the last year and include the approximate cost for those repairs. Do not include major treatment plant construction or upgrading programs.

$100,000 DISINFECTION FACILITY IMPROVEMENTS

$200,000 VARIOUS PROCESS TRAIN EQUIPMENT REPAIRS

$50,000 INFLUENT PUMP STATION REPAIRS

L. List any additional comments. (Attach additional sheets if necessary.)

$100,000 WAS BUDGETED FOR ROUTINE REPAIRS FOR THIS PLANT IN 2022. THESE FUNDS WERE ALLOCATED FOR VARIOUS REPAIRS INCLUDING PUMPS, PROCESS EQUIPMENT AND ANY OTHER MECHANICAL/ELECTRICAL REPAIRS REPAIRS. IN ADDITION, CAPITAL PROJECTS ARE BUDGETED AND NOT INCLUDED IN THESE NUMBERS. THIS AMOUNT DOES NOT INCLUDE WHAT IS ANNUALLY BUDGETED FOR THE COLLECTION SYSTEM.

Facility Name: CHASE WWTP

Part 11: Summary Sheet

1. Enter in the values from Parts 1 through 8 in the left column below. Add the numbers in the left column to determine the MWPP Report point total the wastewater system generated for the previous calendar year.

Actual Values	Maximum Possible
Part 1 0 points	80 points
Part 2 0 points	121 points
Part 3 2 points	40 points
Part 4 0 points	200 points
Part 5 0 points	50 points
Part 6 0 points	50 points
Part 7 0 points	121 points
Part 8 0 points	121 points
Total 2 points	783 points

2. Check the facility type that best describes the plant's treatment and disposal of wastewater.

- [x] Mechanical plant with surface water discharge
- [ ] Aerated Lagoon or stabilization pond with surface water discharge
- [ ] Mechanical plant using land disposal of liquid wastes
- [ ] Aerated Lagoon or stabilization pond using land disposal of liquid wastes

3. Check the range that describes the action needed to address problems identified in the report.

- [x] 0 - 70 points Actions as Appropriate*
- [ ] 71 - 120 points Departmental Recommendation Range*
- [ ] 121 – 783 points Municipality Action Range*

***Other actions may be required by NPDES outside the scope of this report.**

4. Complete the *Municipal Water Pollution Prevention Resolution Form*, ADEM Form 418.

5. In Question 1, do any of the actual point values in the left column equal the maximum possible points in the right column?

(Check the appropriate response.) ☐ Yes ■ No

If yes, provide a written explanation for this situation in the space below.

PLANT AND COLLECTION SYSTEM PERSONNEL INVENTORY

FACILITY NAME: CHASE AREA WWTP PLANT GRADE: III

PERMIT NUMBER: AL0057428

PLANT SUPERINTENDENT: Lyle Gilliland TEL. # 256-883-3719

SYSTEM MANAGER: Shane L. Cook TEL. # 256-883-3719

PLANT OPERATORS:

	NAME	GRADE OR TRAINEE STATUS	OPERATOR NO.	EXP. DATE
1.	Lyle Gilliland	IV	C000559	06/30/25
2.	Roy Morgan	IV	C000230	04/30/25
3.	Terry Brown	IV	C006649	8/31/25
4.				
5.				
6.				
7.				
8.				
9.				
10.				

COLLECTION SYSTEM OPERATORS:

1.	Jonathan Houston	IC	C009536	8/31/23
2.	David Sloan	IC	CAL008971	7/31/26
3.	Stan Patterson	IC	C007629	11/30/25
4.	Jeb Aycock	IC	C001642	1/31/2025

	MAN HRS./WK	NUMBER
MANAGEMENT/SUPERVISOR	40	1
OPERATOR(S):	80	2
GRADE I-C	20	4
GRADE I		
GRADE II		
GRADE III		
GRADE IV		
DESIGNATED TRAINEE(S)		
LABORATORY		
MAINTENANCE	40	2
OTHER PLANT WORKERS		

AVERAGE NUMBER OF EMPLOYEES PER SHIFT:

1ST 2 START TIME 6:00 AM

OPERATOR SHIFTS NORMALLY WORKED EACH DAY:

	SUN	MON	TUES	WED	THURS	FRI	SAT
1ST	8	8	8	8	8	8	8

ADEM USE ONLY

	YES	NO
1. DOES PLANT OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		
2. DOES COLLECTION SYSTEM OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		

ADEM FORM 441 8/02

ALABAMA POTW'S SEWAGE SLUDGE SURVEY *

Facility Background Information:

1. Facility Information

Permit Number: AL0049531

Name: CHASE AREA WWTP

Street Address: 909 WESS TAYLOR RD

County: MADISON

2. Facility Contact

Name: SHANE L. COOK

Title: DIRECTOR OF WATER POLLUTION CONTROL

Telephone: 256-883-3719

Permittee Name: CITY OF HUNTSVILLE

Mailing Address: 1800 VERMONT ROAD

HUNTSVILLE, AL 35802

Facility Flow Information

1. Facility Wastewater Treatment Capacity

Avg. Daily Flow for 2022: 1.31 MGD

Facility Design Capacity: 4.0 MGD

2. Estimated Septage Quantity Handled (Residuals Removed from Septic Tank Systems)

Average Domestic Septage: 0 gallons per month

Average Commercial Septage: 0 gallons per month

3. Method of Septage Processing

☐ Mixed with Influent Wastewater for Treatment

☐ Mixed with Sewage Sludge

☐ _____

4. Estimated Percentage Contributing Wastewater Flow

Residential: 15 %

Industrial: 85 %

Other: _____ % Describe: _____

5. List type of wastewater treatment process(es) utilized at this facility:

SCREENING GRIT REMOVAL, EXTENDED AERATION (OXIDATION DITCH), FINAL CLARIFICATION, UV DISINFECTION

6. Estimated sewage sludge wasting rate at this facility: 1403 lb/day dry weight

or _____ gallons per day

7. Estimated untreated sludge received from off site: 0 lb/day dry weight

or _____ gallons per day

8. Estimated percent solids of combined sewage sludge prior to treatment: 70 %

9. List the sewage sludge treatment processes used in preparing sludge for final use or disposal:

	Sludge Quantity (untreated pounds per day)
N/A	

10. Estimate the total volume of sludge generated: 256 (dry U.S. tons per year)

Sludge Disposal Methods

1. Which of the following describes the current method of sewage sludge disposal for this facility:

	Current Practices			Proposed Practices	
	Approved by ADEM		Quantity	Approved by ADEM	
	Yes	No	(dry U.S. tons/year)	Yes	No
a. ☐ Land Application, Bulk Shipped					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
b. ☐ Land Application, Bagged/Other Container					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
c. X Incineration	X	☐	256	X	☐
d. ☐ Subtitle D Landfill (Disposal Only)	☐	☐		☐	☐
e. ☐ Lined Treatment Lagoon or Stabilization Pond	☐	☐		☐	☐
f. ☐ Unlined Lagoon or Stabilization Pond	☐	☐		☐	☐
g. ☐ Other (Please Describe)	☐	☐		☐	☐

2. If "f" was selected above and sludge is stored for 2 or more years, enter the distance between the surface disposal site and the property line: _____ feet

Pollutant Concentrations

1. Enter the total concentrations of the following analytes using existing data. Do not enter TCLP results.

Analyte	Concentration (mg/kg or ppm)	Sample Type	Sample Date	Detection Level of Analysis

Arsenic				
Cadmium				
Chromium				
Copper				
Lead				
Mercury				
Molybdenum				
Nickel				
Selenium				
Zinc				
Ammonium-Nitrogen				
Nitrate-Nitrogen				
Total Kjeldahl Nitrogen				

2. Enter the estimated or determined percent solids of the sewage sludge when sampled for the above analysis: _____ %

Treatment Provided for Sewage Sludge at the Facility

1. Which class of pathogen reduction does the sewage sludge meet at the facility? (As defined in 40 CFR Part 503)

- ☐ Class A
  - ☐ Alternative A1 - Time and Temperature
  - ☐ Alternative A2 - Alkaline Treatment
  - ☐ Alternative A3 - Analysis and Operation
  - ☐ Alternative A4 - Analysis Only
  - ☐ Alternative A5 - Processes to Further Reduce Pathogens (PFRP)
    - ☐ Heat Drying ☐ Thermophilic Aerobic Digestion ☐ Heat Treatment
    - ☐ Pasteurization ☐ Gamma Ray Irradiation ☐ Beta Ray Irradiation
    - ☐ Composting ☐ ☐
  - ☐ Alternative A6 - PFRP Equivalent _____

- ☐ Class B
  - ☐ Alternative B1 - Fecal Coliform Count
  - ☐ Alternative B2 - Process to Significantly Reduce Pathogens (PSRP)
    - ☐ Aerobic Digestion ☐ Air Drying ☐ Anaerobic Digestion
    - ☐ Composting ☐ Lime Stabilization
  - ☐ Alternative B3 - PSRP Equivalent _____
- ☐ Neither or Unknown

Vector Attraction Control

- ☐ Option 1 - Minimum 38% Reduction in Volatile Solids
- ☐ Option 2 - Anaerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 3 - Aerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 4 - Specific Oxygen Uptake Rate (SOUR) for Aerobically Digested Sludge
- ☐ Option 5 - Aerobic Processes plus Elevated Temperature
- ☐ Option 6 - Raised pH to 12 and Retained at 11.5
- ☐ Option 7 - 75% Solids with no Unstabilized Solids
- ☐ Option 8 - 90% Solids with Unstabilized Solids
- ☐ Option 9 - Injection Below Land Surface
- ☐ Option 10 - Incorporation into Soil within 6 or 8 Hours
- ☐ Option 11 Covering Active Sewage Sludge Unit Daily
- ☐ None of the Above

Groundwater Monitoring

1. If disposal practice is surface disposal or land application, is groundwater monitoring required or performed at the site?

☐ Yes
☐ No

(If yes, please submit a copy of the groundwater monitoring reports along with this survey. Also please provide the approximate depth to groundwater and the groundwater monitoring procedures used to obtain the data.)

Land Application of Sewage Sludge

Answer the following questions if sewage sludge is applied to land.

1. If sewage sludge is land applied in bulk form, what type of crop or other vegetation is grown on this site?

N/A

2. If sewage sludge is land applied in bulk form, what is the nitrogen requirement for this crop or vegetation?

N/A

3. If sewage sludge is land applied in bulk form, briefly describe the nature of any complaints filed from neighbors?

N/A

* Permittees that submitted the "Annual Report Review Form" for sludge to the EPA may submit a copy with the MWPP in lieu of Attachment 3.

EXHIBIT E

MUNICIPAL WATER POLLUTION PREVENTION (MWPP)

ANNUAL REPORT

SUBMITTED BY:

TREATMENT FACILITY: MAGNOLIA SPRINGS WWTP NPDES #: AL0072435

MUNICIPALITY: HUNTSVILLE COUNTY: LIMESTONE

CONTACT PERSON: SHANE COOK
Responsible Official
DIRECTOR OF WATER POLLUTION CONTROL
Title
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: shane.cook@huntsvilleal.gov

CHIEF OPERATOR: WESLEY BAUGH
Name
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: wes.baugh@huntsvilleal.gov
Date: MAY 20, 2023

REVIEWED BY: _____
Consulting Engineer
Telephone #: _____ Fax #: _____
Date: _____

MWPP Annual Report
Information Source List

The following information will be needed to complete the compliance maintenance report that covers the calendar year of 2022 (due **May 31,** 2023).

Part 1
A. The average plant influent flow for each month (million gallons per day/MGD) during the year.
B. The average plant influent BOD (CBOD) for each month (mg/l and lb/day) in the year.
C. The plant's average design flow (MGD) and design BOD (CBOD) loading (lbs/day).

Part 2
A. The monthly average permit and DMR effluent concentration for BOD (CBOD), TSS, NH3-N, and/or TKN in mg/l for the year
B. The monthly average effluent limits and DMR loading for BOD (CBOD), TSS, NH3-N, and/or TKN in lbs/day for the year

Part 3 The age of the treatment plant defined as the number of years since the last major reconstruction to increase the organic or hydraulic capacity of the plant. The last calendar year minus the year the new construction was brought on-line.

Part 4 Bypass and overflow information. This is the number of bypass or overflow events of untreated wastewater due to heavy rain or equipment failure whether intentional or inadvertent from all collection systems tributary to the treatment facility.

Part 5
A. Describe the characteristics and quantity of sludge generated.
B. If sludge is landspread, how many months of sludge storage does the plant have? This should include on-site and off-site storage from the treatment plant. The digestor capacity may be used in the calculation.

Part 6
A. Sludge Disposal Method
B. The number of approved land disposal sites for sludge available, and how many months or years these disposal sites will these be available for use.

Part 7 The number of sewer extensions installed in the community last year, the design population, design flow, and design BOD (CBOD) for each sewer extension.

Part 8 Operator Certification

Part 9 Financial Status

Part 10 Subjective Evaluation

Part 11 Summary Sheet

Instructions to the Operator-in-Charge

1. Complete all sections of the MWPP Report to the best of your ability.

2. Parts 1 through 8 contain questions for which points will be generated. These points are intended to communicate to the Department and the governing body or owner the actions necessary to prevent effluent violations. Enter the point totals from Parts 1 through 8 on Part 11: Summary Sheet.

3. Add the point totals on Part 11: Summary Sheet.

4. Submit the MWPP Report to the governing body and the consulting engineer and owner for review and approval.

5. The governing body should pass a resolution which contains the following points:

   a. The resolution should acknowledge the governing body or owner has reviewed the MWPP Report.

   b. The resolution should indicate what actions will be taken to prevent effluent violations.

   c. The resolution should provide any other information the governing body or owner deems appropriate.

6. **The MWPP Report and the resolution must be submitted by May 31st to Municipal Section, Water Division, ADEM, P.O. Box 301463, Montgomery, AL 36130-1463.**

Facility Name: MAGNOLIA SPRINGS WWTP

Part 1: Influent Loading/Flows

A. List the average monthly volumetric flows and BOD_5 ($CBOD_5$) loadings received at your facility during the last calendar year.

Month	Column 1 Average Monthly Flowrate (MGD)	Column 2 Average Monthly BOD_5 ($CBOD_5$) Concentration (mg/l)	Column 3 Average Loading BOD_5 ($CBOD_5$) (lbs/day**)
January	NO DISCHARGE	N/A	N/A
February	NO DISCHARGE	N/A	N/A
March	NO DISCHARGE	N/A	N/A
April	NO DISCHARGE	N/A	N/A
May	NO DISCHARGE	V	N/A
June	NO DISCHARGE	N/A	N/A
July	NO DISCHARGE	N/A	N/A
August	NO DISCHARGE	N/A	N/A
September	NO DISCHARGE	N/A	N/A
October	NO DISCHARGE	N/A	N/A
November	NO DISCHARGE	N/A	N/A
December	NO DISCHARGE	N/A	N/A
Annual Avg.	NO DISCHARGE	N/A	N/A

** As reported on NPDES Discharge Monitoring Reports (DMRs) and as required by EPA's NPDES Self-Monitoring System, User Guide, March 1985.

B. List the average design flow and average design BOD_5 ($CBOD_5$) loading for the facility below. If you are not aware of these design quantities, contact your consulting engineer.

	Average Design Flow (MGD)	Average Design BOD_5 ($CBOD_5$) Loading (lbs/day)
Design Criteria	0.25	300
90% of the Design Criteria	0.23	270

C. How many times did the monthly flow (Column 1) to the WWTP exceed 90% of design flow?

0 (Check the appropriate point total)

■ 0 - 4 = 0 points ☐ 5 or more = 5 points

D. How many times did the monthly flow (Column 1) to the WWTP exceed the design flow?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 – 2 = 5 points ☐ 3 – 4 =10 points ☐ 5 or more =15 points

E. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed 90% of the design loading?

0 (Check the appropriate point total)

■ 0 -1 = 0 points ☐ 2 – 4 =5 points ☐ 5 or more =10 points

F. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed the design loading?

_____ (Check the appropriate point total)

■ 0 = 0 points ☐ 1 = 10 points ☐ 2 =20 points ☐ 3 =30 points ☐ 4 =40 points ☐ 5 or more =50 points

G. Enter each point value marked for C through F and enter the sum in the appropriate blank below.

C points = 0

D points = 0

E points = 0

F points = 0

TOTAL POINTS VALUE FOR PART 1 0

Enter this value on Part 11: Summary Sheet.

*To obtain equivalent BOD_5 loading for comparison with design loading for those permittees using influent $CBOD_5$, divide annual average $CBOD_5$, loading in lbs/day from Part 1, A by 0.7.

Facility Name: MAGNOLIA SPRINGS WWTP

Part 2: Effluent Quality/Plant Performance

A. List the monthly average permit limits for the facility in the blanks below and the average monthly effluent DMR BOD_5, ($CBOD_5$) TSS, NH_3-N and/or TKN concentration produced by the facility during the last calendar year.

(1) NPDES Permit Concentration

	Months	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
Permit Limit	5-11	25	30	4.8	N/A
	12-4	25	30	10.6	N/A

(2) DMR Concentration

Qtr	Month	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
1	January	N/A	N/A	N/A	N/A
	February	N/A	N/A	N/A	N/A
	March	N/A	N/A	N/A	N/A
2	April	N/A	N/A	N/A	N/A
	May	N/A	N/A	N/A	N/A
	June	N/A	N/A	N/A	N/A
3	July	N/A	N/A	N/A	N/A
	August	N/A	N/A	N/A	N/A
	September	N/A	N/A	N/A	N/A
4	October	N/A	N/A	N/A	N/A
	November	N/A	N/A	N/A	N/A
	December	N/A	N/A	N/A	N/A
	Annual Avg.	N/A	N/A	N/A	N/A

B. List the monthly average permit limit and DMR loadings below.

(1) NPDES Permit Loading

	Months	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
Permit Limit	5-11	52.1	62.5	10	N/A
	12-4	52.1	62.5	22.1	N/A

(2) DMR Loading

Qtr	Month	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
1	January	N/A	N/A	N/A	N/A
	February	N/A	N/A	N/A	N/A
	March	N/A	N/A	N/A	N/A
2	April	N/A	N/A	N/A	N/A
	May	N/A	N/A	N/A	N/A
	June	N/A	N/A	N/A	N/A
3	July	N/A	N/A	N/A	N/A
	August	N/A	N/A	N/A	N/A
	September	N/A	N/A	N/A	N/A
4	October	N/A	N/A	N/A	N/A
	November	N/A	N/A	N/A	N/A
	December	N/A	N/A	N/A	N/A
	Annual Avg.	N/A	N/A	N/A	N/A

C. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

D. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

E. During the past year did the effluent TSS concentration (mg/l) or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

F. During the past year did the TSS concentration (mg/l) and/or loading (lbs/day) exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

G. During the past year did the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

H. During the past year did either the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

I. Enter each point value checked for C through H in the blanks below.

C Points = 0
D Points = 0
E Points = 0
F Points = 0
G Points = 0
H Points = 0

HIGHEST INDIVIDUAL POINT VALUE FOR PART 2 (C-H) 0 (HIGHEST POINT = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: CHASE WWTP

Part 3: Age of the Wastewater Treatment Facility

A. What year was the wastewater treatment plant constructed or last reconstructed? 2005

Subtract the above answer from the report year to determine age:

Age = (Last Calendar year) - (Answer to A)

Age 17 = (2022) - (2005)

Enter Age in Part C below.

B. Check the type of treatment facility employed.

		Factor
X	Mechanical Treatment Plant	2.0
_____	Aerated Lagoon	1.5
_____	Stabilization Pond	1.0
_____	Other (Specify: _____)	1.0

C. Multiply the factor listed next to the type of the facility your community employs by the age of your facility to determine the total point value for Part 3:

2 (Factor) x 17 (Age) = 34 TOTAL POINT VALUE FOR PART 3

Enter the above value on Part 11: Summary Sheet. If the total point value exceeds 40, enter 40 on Part 11: Summary Sheet.

Facility Name: MAGNOLIA SPRINGS WWTP

Part 4: Bypassing and Overflows

A. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to heavy rain? 0

B. How many bypass or overflow events of untreated wastewater occurred in the last year prior to the headworks of the WWTP due to heavy rain? 0

C. How many of the bypass or overflow events listed in Parts A and B have been corrected such that future bypass or overflow events at the same location due to heavy rain are not anticipated? 0

D. Add together Answers A and B and subtract Answer C from that total.

A + B – C = 0 (Check the appropriate point total.)

- ☒ 0 = 0 points
- ☐ 1 = 5 points
- ☐ 2 =10 points
- ☐ 3 =15 points
- ☐ 4 =20 points
- ☐ 5 =25 points
- ☐ 6 = 30 points
- ☐ 7 = 35 points
- ☐ 8 =40 points
- ☐ 9 =45 points
- ☐ 10 =50 points
- ☐ 11 or more =100 points

E. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to equipment failure? (This includes clogged/broken lines or manholes.) 0

F. How many bypass or overflow events of untreated wastewater occurred in the last year due to equipment failure prior to the headworks of the WWTP? (This includes clogged/broken lines or manholes.) 0

G. How many of the bypass or overflow events listed in Parts E and F have been corrected such that future bypass or overflow events at the same location due to the same equipment failure are not anticipated? 0

H. Add together Answers E and F and subtract Answer G from that total.

E + F – G = 0 (Check the appropriate point total.)

- ☒ 0 = 0 points
- ☐ 1 = 5 points
- ☐ 2 =10 points
- ☐ 3 =15 points
- ☐ 4 =20 points
- ☐ 5 =25 points
- ☐ 6 = 30 points
- ☐ 7 = 35 points
- ☐ 8 =40 points
- ☐ 9 =45 points
- ☐ 10 =50 points
- ☐ 11 or more =100 points

I. Add point values checked in D and H and enter the total in the blank below.

TOTAL POINT VALUE FOR PART 4 0
Enter this value on Part 11: Summary Sheet.

All bypass or overflow events that have occurred in the last year (for any reason) must be individually reported with this MWPP report.

Facility Name: MAGNOLIA SPRINGS WWTP

Part 5: Sludge Quantity and Storage

A. Please provide information concerning sludge quantity, characteristics, and storage practices based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months of sludge storage capacity does the wastewater treatment facility have available, either on-site or off-site? (i.e., How many months can the facility operate without land spreading or disposing of sludge?) _____

(Check the appropriate point total.)

Greater than or equal to 4 months	☒	= 0 points
Less than 4 months, but greater than or equal to 3 months	☐	= 10 points
Less than 3 months, but greater than or equal to 2 months	☐	= 20 points
Less than 2 months, but greater than or equal to 1 month	☐	= 30 points
Less than one month	☐	= 50 points

TOTAL POINT VALUE FOR PART 5 0
Enter this value on Part 11: Summary Sheet.

Part 6: Sludge Disposal Practices and Sites

A. Please provide the sludge disposal practices and site information based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months or years does the facility have access to and approval for sufficient land disposal sites to provide proper land disposal? (Check the appropriate point total.)

36 or more months	■	= 0 points
24 - 35 months	☐	= 10 points
12 - 23 months	☐	= 20 points
6 - 11 months	☐	= 30 points
Less than 6 months	☐	= 50 points

TOTAL POINT VALUE FOR PART 6 0
Enter this value on Part 11: Summary Sheet.

Facility Name: MAGNOLIA SPRINGS WWTP

Part 7: New Development

Are there any major new developments (industrial, commercial, or residential) in the last calendar year or anticipated in the next 2-3 years such that either flow or BOD_5 ($CBOD_5$) loadings to the sewage system could significantly increase? Estimate additional loadings below.

Design Population Equivalent (PE): _____ Design Flow: _____ MGD Design BOD_5 ($CBOD_5$): _____ lbs/day

List industrial and/or residential developments.

NONE.

Will the additional loading overload the plant?
(Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

Enter the point total in the blank below.

TOTAL POINT VALUE FOR PART 7 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Part 8: Operator Certification

Complete the *Plant and Collection System Personnel Inventory,* ADEM Form 441.

Do both the plant operator and collection system staffing comply with ADEM Administrative Code; Division 10, Operator Certification Program?
(Check the appropriate point total.)

☒ Yes = 0 points ☐ No = 121 points

TOTAL POINT VALUE FOR PART 8 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: MAGNOLIA SPRINGS WWTP

Part 9: Financial Status

A. Are User-Charge Revenues sufficient to cover operation and maintenance expenses? If no, how are O&M costs being financed? ***Include user charge rates***.

YES

Residential Minimum 0 Plus rate 4.83 /1,000 gal.

Industrial Minimum 0 Plus rate 4.83 /1,000 gal.

Monthly residential rate based on 6,000 gallons usage $ 28.98

B. What financial resources are available to pay for the wastewater improvements and/or reconstruction needs?

ADEQUATE USER CHARGE SYSTEM WITH A+ BOND RATING FROM STANDARD & POORS.

C. Please attach a rate sheet and the most recent audit, if available.

Part 10: Subjective Evaluation

A. Describe briefly the physical and structural conditions of the wastewater treatment facility.

ALL CONCRETE AND METAL STRUCTURES ARE IN GOOD CONDITION. THERE CURRENTLY EXISTS NO PROBLEMS WITH PREMATURE FAILURE DUE TO CORROSION OR DIFFERENTIAL SETTLING.

B. Describe the general condition of the sewer system (sewer lines, manholes, lift stations).

CLEAR WATER INTRUSION FOR THE FACILITY IS ESTIMATED AT 15%.

C. What sewage system improvements does the community have planned for construction in the next 5 years?

ANTICIPATED GROWTH IS EXPECTED IN THE SURRPUNDING AREA.

FINALIZE ROUTE AND CONSTRUCTION FOR NEW EFFLUENT LINE

D. What is the theoretical design life of the plant, and what is the estimated remaining useful life of the wastewater treatment facility?

DESIGN LIFE IS 50 YEARS. REMAINING LIFE IS 34 YEARS.

E. What problems, if any, over the last year have threatened treatment or conveyance within the system?

NONE

F. Is the community presently involved in formal planning for treatment facility upgrading?

YES. FUNDING IS IN PLACE TO ADEQUATELY PLAN FOR ANY GROWTH.

G. How many days in the last year were there residential backups at any point in the collection system for any reason other than clogging of the lateral connection? 0

H. Does the plant have a written plan for preventive maintenance on major equipment items? If yes, describe.

YES. ELECTRICAL:MEG-OHM, AMP CHECK. MECHANICAL:LUBRICATION OF ALL BEARINGS,SEALS,ETC. THESE TASKS ARE PREFORMED FROM PREVENTATIVE MAINTENANCE LOGS AND TRACKED THROUGH DEPARTMENT DATABASES.

I. Does this preventive maintenance program depict frequency of intervals, types of lubrication, and other preventive maintenance tasks necessary for each piece of equipment?

(Check the appropriate response.) ■ Yes ☐ No

J. Are these preventive maintenance tasks, as well as equipment problems, being recorded and filed so future maintenance problems can be assessed properly?

(Check the appropriate response.) ■ Yes ☐ No

K. Describe any major repairs or mechanical equipment replacement made in the last year and include the approximate cost for those repairs. Do not include major treatment plant construction or upgrading programs.

L. List any additional comments. (Attach additional sheets if necessary.)

Facility Name: CHASE WWTP

Part 11: Summary Sheet

1. Enter in the values from Parts 1 through 8 in the left column below. Add the numbers in the left column to determine the MWPP Report point total the wastewater system generated for the previous calendar year.

Actual Values	Maximum Possible
Part 1 0 points	80 points
Part 2 0 points	121 points
Part 3 34 points	40 points
Part 4 0 points	200 points
Part 5 0 points	50 points
Part 6 0 points	50 points
Part 7 0 points	121 points
Part 8 0 points	121 points
Total 34 points	783 points

2. Check the facility type that best describes the plant's treatment and disposal of wastewater.

- [x] Mechanical plant with surface water discharge
- [ ] Aerated Lagoon or stabilization pond with surface water discharge
- [ ] Mechanical plant using land disposal of liquid wastes
- [ ] Aerated Lagoon or stabilization pond using land disposal of liquid wastes

3. Check the range that describes the action needed to address problems identified in the report.

- [x] 0 - 70 points Actions as Appropriate*
- [ ] 71 - 120 points Departmental Recommendation Range*
- [ ] 121 – 783 points Municipality Action Range*

***Other actions may be required by NPDES outside the scope of this report.**

4. Complete the *Municipal Water Pollution Prevention Resolution Form*, ADEM Form 418.

5. In Question 1, do any of the actual point values in the left column equal the maximum possible points in the right column?

(Check the appropriate response.) ☐ Yes ■ No

If yes, provide a written explanation for this situation in the space below.

PLANT AND COLLECTION SYSTEM PERSONNEL INVENTORY

FACILITY NAME: Magnolia Springs WWTP PLANT GRADE: II

PERMIT NUMBER: AL0072435

PLANT SUPERINTENDENT: Wesley Baugh TEL. # 256-883-3719

SYSTEM MANAGER: Shane Cook TEL. # 256-883-3719

PLANT OPERATORS:

	NAME	GRADE OR TRAINEE STATUS	OPERATOR NO.	EXP. DATE
1.	Wesley Baugh	IV	C006624	8/31/25
2.	Matthew Reynolds	IV	C006568	12/31/23
3.				
4.				
5.				
6.				
7.				
8.				
9.				
10.				

COLLECTION SYSTEM OPERATORS:

1.				
2.				
3.				
4.				

	MAN HRS./WK	NUMBER
MANAGEMENT/SUPERVISOR	40	2
OPERATOR(S):		
GRADE I-C		
GRADE I		
GRADE II		
GRADE III		
GRADE IV		
DESIGNATED TRAINEE(S)		
LABORATORY		
MAINTENANCE		
OTHER PLANT WORKERS		

AVERAGE NUMBER OF EMPLOYEES PER SHIFT:

		START TIME
1ST		
2ND		
3RD		

OPERATOR SHIFTS NORMALLY WORKED EACH DAY:

	SUN	MON	TUES	WED	THURS	FRI	SAT
1ST							
2ND							
3RD							

ADEM USE ONLY

	YES	NO
1. DOES PLANT OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		
2. DOES COLLECTION SYSTEM OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		

ADEM FORM 441 8/02

ALABAMA POTW'S SEWAGE SLUDGE SURVEY *

Facility Background Information:

1. Facility Information

Permit Number: AL0072435

Name: Magnolia Springs WWTP

Street Address: 1910 Old Rail Road Bed Road

County: Limestone

2. Facility Contact

Name: SHANE L. COOK

Title: DIRECTOR OF WATER POLLUTION CONTROL

Telephone: 256-883-3719

Permittee Name: CITY OF HUNTSVILLE

Mailing Address: 1800 VERMONT ROAD

HUNTSVILLE, AL 35802

Facility Flow Information

1. Facility Wastewater Treatment Capacity

Avg. Daily Flow for 2022: 0 MGD

Facility Design Capacity: 0.25 MGD

2. Estimated Septage Quantity Handled (Residuals Removed from Septic Tank Systems)

Average Domestic Septage: 0 gallons per month

Average Commercial Septage: 0 gallons per month

3. Method of Septage Processing

☐ Mixed with Influent Wastewater for Treatment

☐ Mixed with Sewage Sludge

☐ _____

4. Estimated Percentage Contributing Wastewater Flow

Residential: 0 %

Industrial: 0 %

Other: _____ % Describe: _____

5. List type of wastewater treatment process(es) utilized at this facility:

PRIMARY SCREENING, AERATION, FINAL CLARIFICATION, CHLORINATION

6. Estimated sewage sludge wasting rate at this facility: 0 lb/day dry weight

or _____ gallons per day

7. Estimated untreated sludge received from off site: 0 lb/day dry weight

or _____ gallons per day

8. Estimated percent solids of combined sewage sludge prior to treatment: 0 %

9. List the sewage sludge treatment processes used in preparing sludge for final use or disposal:

	Sludge Quantity (untreated pounds per day)
N/A	

10. Estimate the total volume of sludge generated: 0 (dry U.S. tons per year)

Sludge Disposal Methods

1. Which of the following describes the current method of sewage sludge disposal for this facility:

	Current Practices: Approved by ADEM Yes	Current Practices: Approved by ADEM No	Current Practices: Quantity (dry U.S. tons/year)	Proposed Practices: Approved by ADEM Yes	Proposed Practices: Approved by ADEM No
a. ☐ Land Application, Bulk Shipped					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
b. ☐ Land Application, Bagged/Other Container					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
c. X Incineration	X	☐	0	X	☐
d. ☐ Subtitle D Landfill (Disposal Only)	☐	☐		☐	☐
e. ☐ Lined Treatment Lagoon or Stabilization Pond	☐	☐		☐	☐
f. ☐ Unlined Lagoon or Stabilization Pond	☐	☐		☐	☐
g. ☐ Other (Please Describe)	☐	☐		☐	☐

2. If "f" was selected above and sludge is stored for 2 or more years, enter the distance between the surface disposal site and the property line: _____ feet

Pollutant Concentrations

1. Enter the total concentrations of the following analytes using existing data. Do not enter TCLP results.

Analyte	Concentration (mg/kg or ppm)	Sample Type	Sample Date	Detection Level of Analysis

Arsenic				
Cadmium				
Chromium				
Copper				
Lead				
Mercury				
Molybdenum				
Nickel				
Selenium				
Zinc				
Ammonium-Nitrogen				
Nitrate-Nitrogen				
Total Kjeldahl Nitrogen				

2. Enter the estimated or determined percent solids of the sewage sludge when sampled for the above analysis: _____ %

Treatment Provided for Sewage Sludge at the Facility

1. Which class of pathogen reduction does the sewage sludge meet at the facility? (As defined in 40 CFR Part 503)

- ☐ Class A
  - ☐ Alternative A1 - Time and Temperature
  - ☐ Alternative A2 - Alkaline Treatment
  - ☐ Alternative A3 - Analysis and Operation
  - ☐ Alternative A4 - Analysis Only
  - ☐ Alternative A5 - Processes to Further Reduce Pathogens (PFRP)
    - ☐ Heat Drying ☐ Thermophilic Aerobic Digestion ☐ Heat Treatment
    - ☐ Pasteurization ☐ Gamma Ray Irradiation ☐ Beta Ray Irradiation
    - ☐ Composting ☐ ☐
  - ☐ Alternative A6 - PFRP Equivalent _____

- ☐ Class B
  - ☐ Alternative B1 - Fecal Coliform Count
  - ☐ Alternative B2 - Process to Significantly Reduce Pathogens (PSRP)
    - ☐ Aerobic Digestion ☐ Air Drying ☐ Anaerobic Digestion
    - ☐ Composting ☐ Lime Stabilization
  - ☐ Alternative B3 - PSRP Equivalent _____
- ☐ Neither or Unknown

Vector Attraction Control

- ☐ Option 1 - Minimum 38% Reduction in Volatile Solids
- ☐ Option 2 - Anaerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 3 - Aerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 4 - Specific Oxygen Uptake Rate (SOUR) for Aerobically Digested Sludge
- ☐ Option 5 - Aerobic Processes plus Elevated Temperature
- ☐ Option 6 - Raised pH to 12 and Retained at 11.5
- ☐ Option 7 - 75% Solids with no Unstabilized Solids
- ☐ Option 8 - 90% Solids with Unstabilized Solids
- ☐ Option 9 - Injection Below Land Surface
- ☐ Option 10 - Incorporation into Soil within 6 or 8 Hours
- ☐ Option 11 Covering Active Sewage Sludge Unit Daily
- ☐ None of the Above

Groundwater Monitoring

1. If disposal practice is surface disposal or land application, is groundwater monitoring required or performed at the site?

☐ Yes
☐ No

(If yes, please submit a copy of the groundwater monitoring reports along with this survey. Also please provide the approximate depth to groundwater and the groundwater monitoring procedures used to obtain the data.)

Land Application of Sewage Sludge

Answer the following questions if sewage sludge is applied to land.

1. If sewage sludge is land applied in bulk form, what type of crop or other vegetation is grown on this site?

N/A

2. If sewage sludge is land applied in bulk form, what is the nitrogen requirement for this crop or vegetation?

N/A

3. If sewage sludge is land applied in bulk form, briefly describe the nature of any complaints filed from neighbors?

N/A

* Permittees that submitted the "Annual Report Review Form" for sludge to the EPA may submit a copy with the MWPP in lieu of Attachment 3.

MUNICIPAL WATER POLLUTION PREVENTION (MWPP)

ANNUAL REPORT

SUBMITTED BY:

TREATMENT FACILITY: SPRING BRANCH WWTP NPDES #: AL0058394

MUNICIPALITY: HUNTSVILLE COUNTY: MADISON

CONTACT PERSON: SHANE COOK
Responsible Official
DIRECTOR WATER POLLUTION CONTROL
Title
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: shane.cook@huntsvilleal.gov

CHIEF OPERATOR: WESLEY BAUGH
Name
Telephone #: 256-883-3719 Fax #: 256-883-3682
Email Address: wes.baugh@huntsvilleal.gov
Date: MAY 20, 2023

REVIEWED BY:
Consulting Engineer
Telephone #: Fax #:
Date:

MWPP Annual Report
Information Source List

The following information will be needed to complete the compliance maintenance report that covers the calendar year of 2022 (due **May 31,** 2023).

Part 1
A. The average plant influent flow for each month (million gallons per day/MGD) during the year.
B. The average plant influent BOD (CBOD) for each month (mg/l and lb/day) in the year.
C. The plant's average design flow (MGD) and design BOD (CBOD) loading (lbs/day).

Part 2
A. The monthly average permit and DMR effluent concentration for BOD (CBOD), TSS, NH3-N, and/or TKN in mg/l for the year
B. The monthly average effluent limits and DMR loading for BOD (CBOD), TSS, NH3-N, and/or TKN in lbs/day for the year

Part 3 The age of the treatment plant defined as the number of years since the last major reconstruction to increase the organic or hydraulic capacity of the plant. The last calendar year minus the year the new construction was brought on-line.

Part 4 Bypass and overflow information. This is the number of bypass or overflow events of untreated wastewater due to heavy rain or equipment failure whether intentional or inadvertent from all collection systems tributary to the treatment facility.

Part 5
A. Describe the characteristics and quantity of sludge generated.
B. If sludge is landspread, how many months of sludge storage does the plant have? This should include on-site and off-site storage from the treatment plant. The digestor capacity may be used in the calculation.

Part 6
A. Sludge Disposal Method
B. The number of approved land disposal sites for sludge available, and how many months or years these disposal sites will these be available for use.

Part 7 The number of sewer extensions installed in the community last year, the design population, design flow, and design BOD (CBOD) for each sewer extension.

Part 8 Operator Certification

Part 9 Financial Status

Part 10 Subjective Evaluation

Part 11 Summary Sheet

Instructions to the Operator-in-Charge

1. Complete all sections of the MWPP Report to the best of your ability.

2. Parts 1 through 8 contain questions for which points will be generated. These points are intended to communicate to the Department and the governing body or owner the actions necessary to prevent effluent violations. Enter the point totals from Parts 1 through 8 on Part 11: Summary Sheet.

3. Add the point totals on Part 11: Summary Sheet.

4. Submit the MWPP Report to the governing body and the consulting engineer and owner for review and approval.

5. The governing body should pass a resolution which contains the following points:

   a. The resolution should acknowledge the governing body or owner has reviewed the MWPP Report.

   b. The resolution should indicate what actions will be taken to prevent effluent violations.

   c. The resolution should provide any other information the governing body or owner deems appropriate.

6. **The MWPP Report and the resolution must be submitted by May 31st to Municipal Section, Water Division, ADEM, P.O. Box 301463, Montgomery, AL 36130-1463.**

Facility Name: SPRING BRANCH WWTP

Part 1: Influent Loading/Flows

A. List the average monthly volumetric flows and BOD_5 ($CBOD_5$) loadings received at your facility during the last calendar year.

Month	Column 1 Average Monthly Flowrate (MGD)	Column 2 Average Monthly BOD_5 ($CBOD_5$) Concentration (mg/l)	Column 3 Average Loading BOD_5 ($CBOD_5$) (lbs/day**)
January	30.74	141	36084
February	28.16	128	29962
March	31.8	91	24167
April	24.48	122	24970
May	16.37	190	25946
June	14.36	178	21381
July	14.2	156	18472
August	15.75	135	17691
September	14.25	288	34297
October	13.43	230	25790
November	14.15	243	28715
December	23	106	20303
Annual Avg.	20.06	167	25648

** As reported on NPDES Discharge Monitoring Reports (DMRs) and as required by EPA's NPDES Self-Monitoring System, User Guide, March 1985.

B. List the average design flow and average design BOD_5 ($CBOD_5$) loading for the facility below. If you are not aware of these design quantities, contact your consulting engineer.

	Average Design Flow	Average Design BOD_5 ($CBOD_5$) Loading (lbs/day)
Design Criteria	41.0	68429
90% of the Design Criteria	36.9	61586

C. How many times did the monthly flow (Column 1) to the WWTP exceed 90% of design flow?

0 (Check the appropriate point total)

■ 0 - 4 = 0 points ☐ 5 or more = 5 points

D. How many times did the monthly flow (Column 1) to the WWTP exceed the design flow?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 – 2 = 5 points ☐ 3 – 4 =10 points ☐ 5 or more =15 points

E. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed 90% of the design loading?

0 (Check the appropriate point total)

■ 0 -1 = 0 points ☐ 2 – 4 =5 points ☐ 5 or more =10 points

F. How many times did the monthly BOD_5 ($CBOD_5$)* loading (lbs/day) (Column 3) to the WWTP exceed the design loading?

0 (Check the appropriate point total)

■ 0 = 0 points ☐ 1 = 10 points ☐ 2 =20 points ☐ 3 =30 points ☐ 4 =40 points ☐ 5 or more =50 points

G. Enter each point value marked for C through F and enter the sum in the appropriate blank below.

C points = 0

D points = 0

E points = 0

F points = 0

TOTAL POINTS VALUE FOR PART 1 0

Enter this value on Part 11: Summary Sheet.

*To obtain equivalent BOD_5 loading for comparison with design loading for those permittees using influent $CBOD_5$, divide annual average $CBOD_5$, loading in lbs/day from Part 1, A by 0.7.

Facility Name: SPRING BRANCH

Part 2: Effluent Quality/Plant Performance

A. List the monthly average permit limits for the facility in the blanks below and the average monthly effluent DMR BOD_5, ($CBOD_5$) TSS, NH_3-N and/or TKN concentration produced by the facility during the last calendar year.

(1) NPDES Permit Concentration

	Months	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
Permit Limit	1-12	25	30	20	N/A

(2) DMR Concentration

Qtr	Month	BOD_5 ($CBOD_5$) (mg/l)	TSS (mg/l)	NH_3-N (mg/l)	TKN (mg/l)
1	January	9.5	6.9	2.2	4.6
	February	7	6.6	2.2	5.9
	March	11.7	11.6	3.8	3.5
2	April	10.9	7.1	5.1	2.7
	May	9.5	9.4	4.2	5.1
	June	6.5	6.7	2.9	8.2
3	July	8	5.4	2.7	4.9
	August	8.3	11.8	3.6	8
	September	10	10.7	5.2	8.3
4	October	14.6	9.3	5.2	5.5
	November	11.1	10.1	4.9	0.4
	December	9	11.6	4.8	0.6
	Annual Avg.	9.7	8.9	3.9	4.8

B. List the monthly average permit limit and DMR loadings below.

(1) NPDES Permit Loading

	Months	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
Permit Limit	1-12	8548	10258	6838	N/A

(2) DMR Loading

Qtr	Month	BOD_5 ($CBOD_5$) (lbs/day)	TSS (lbs/day)	NH_3-N (lbs/day)	TKN (lbs/day)
1	January	2437	1774	567	1180
	February	1645	1547	520	1375
	March	3114	3078	997	939
2	April	2230	1447	1042	558
	May	1302	1278	568	701
	June	779	805	351	980
3	July	948	642	319	583
	August	1089	1549	470	1046
	September	1189	1271	620	984
4	October	1634	1036	588	621
	November	1316	1198	576	52
	December	1728	2230	929	113
	Annual Avg.	1617	1488	629	761

C. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any consecutive quarters? (Check the appropriate point total.)

■ No = 0 points ☐ Yes = 121 points

D. During the past year did the BOD_5 ($CBOD_5$) concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

E. During the past year did the effluent TSS concentration (mg/l) or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

F. During the past year did the TSS concentration (mg/l) and/or loading (lbs/day) exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

G. During the past year did the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day) exceed the product of 1.4 times the monthly average permit limit during two months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

H. During the past year did either the NH_3-N or TKN concentration (mg/l) and/or loading (lbs/day), exceed the monthly average permit limit during four months of any two consecutive quarters? (Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

I. Enter each point value checked for C through H in the blanks below.

C Points = 0
D Points = 0
E Points = 0
F Points = 0
G Points = 0
H Points = 0

HIGHEST INDIVIDUAL POINT VALUE FOR PART 2 (C-H) 0 (HIGHEST POINT = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: SPRING BRANCH WWTP

Part 3: Age of the Wastewater Treatment Facility

A. What year was the wastewater treatment plant constructed or last reconstructed? 2021

Subtract the above answer from the report year to determine age:

Age = (Last Calendar year) - (Answer to A)

Age 1 = (2022) - (2021)

Enter Age in Part C below.

B. Check the type of treatment facility employed.

		Factor
X	Mechanical Treatment Plant	2.0
	Aerated Lagoon	1.5
	Stabilization Pond	1.0
	Other (Specify:)	1.0

C. Multiply the factor listed next to the type of the facility your community employs by the age of your facility to determine the total point value for Part 3:

2.0 (Factor) x 1 (Age) = 2 TOTAL POINT VALUE FOR PART 3

Enter the above value on Part 11: Summary Sheet. If the total point value exceeds 40, enter 40 on Part 11: Summary Sheet.

Facility Name: SPRING BRANCH WWTP

Part 4: Bypassing and Overflows

A. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to heavy rain? 0

B. How many bypass or overflow events of untreated wastewater occurred in the last year prior to the headworks of the WWTP due to heavy rain? 2

C. How many of the bypass or overflow events listed in Parts A and B have been corrected such that future bypass or overflow events at the same location due to heavy rain are not anticipated? 2

D. Add together Answers A and B and subtract Answer C from that total.

A + B – C = 0 (Check the appropriate point total.)

- ☒ 0 = 0 points
- ☐ 1 = 5 points
- ☐ 2 =10 points
- ☐ 3 =15 points
- ☐ 4 =20 points
- ☐ 5 =25 points
- ☐ 6 = 30 points
- ☐ 7 = 35 points
- ☐ 8 =40 points
- ☐ 9 =45 points
- ☐ 10 =50 points
- ☐ 11 or more =100 points

E. How many bypass or overflow events of untreated wastewater occurred in the last year at the WWTP due to equipment failure? (This includes clogged/broken lines or manholes.) 0

F. How many bypass or overflow events of untreated wastewater occurred in the last year due to equipment failure prior to the headworks of the WWTP? (This includes clogged/broken lines or manholes.) 0

G. How many of the bypass or overflow events listed in Parts E and F have been corrected such that future bypass or overflow events at the same location due to the same equipment failure are not anticipated? 0

H. Add together Answers E and F and subtract Answer G from that total.

E + F – G = 0 (Check the appropriate point total.)

- ☒ 0 = 0 points
- ☐ 1 = 5 points
- ☐ 2 =10 points
- ☐ 3 =15 points
- ☐ 4 =20 points
- ☐ 5 =25 points
- ☐ 6 = 30 points
- ☐ 7 = 35 points
- ☐ 8 =40 points
- ☐ 9 =45 points
- ☐ 10 =50 points
- ☐ 11 or more =100 points

I. Add point values checked in D and H and enter the total in the blank below.

TOTAL POINT VALUE FOR PART 4 0
Enter this value on Part 11: Summary Sheet.

All bypass or overflow events that have occurred in the last year (for any reason) must be individually reported with this MWPP report.

Facility Name: SPRING BRANCH WWTP

Part 5: Sludge Quantity and Storage

A. Please provide information concerning sludge quantity, characteristics, and storage practices based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months of sludge storage capacity does the wastewater treatment facility have available, either on-site or off-site? (i.e., How many months can the facility operate without land spreading or disposing of sludge?) _____

(Check the appropriate point total.)

Greater than or equal to 4 months	[x]	= 0 points
Less than 4 months, but greater than or equal to 3 months	[ ]	= 10 points
Less than 3 months, but greater than or equal to 2 months	[ ]	= 20 points
Less than 2 months, but greater than or equal to 1 month	[ ]	= 30 points
Less than one month	[ ]	= 50 points

TOTAL POINT VALUE FOR PART 5 0
Enter this value on Part 11: Summary Sheet.

Part 6: Sludge Disposal Practices and Sites

A. Please provide the sludge disposal practices and site information based on available data as requested on the *MWPP Sewage Sludge Survey,* ADEM Form 419.

B. How many months or years does the facility have access to and approval for sufficient land disposal sites to provide proper land disposal? (Check the appropriate point total.)

36 or more months	[■]	= 0 points
24 - 35 months	[ ]	= 10 points
12 - 23 months	[ ]	= 20 points
6 - 11 months	[ ]	= 30 points
Less than 6 months	[ ]	= 50 points

TOTAL POINT VALUE FOR PART 6 0
Enter this value on Part 11: Summary Sheet.

Facility Name: SPRING BRANCH WWTP

Part 7: New Development

Are there any major new developments (industrial, commercial, or residential) in the last calendar year or anticipated in the next 2-3 years such that either flow or BOD_5 ($CBOD_5$) loadings to the sewage system could significantly increase? Estimate additional loadings below.

Design Population Equivalent (PE): _____ Design Flow: _____ MGD Design BOD_5 ($CBOD_5$): _____ lbs/day

List industrial and/or residential developments.

NONE. SERVICE AREA IS APPROXIMATELY 90% DEVELOPED.

Will the additional loading overload the plant?
(Check the appropriate point total.)

☒ No = 0 points ☐ Yes = 121 points

Enter the point total in the blank below.

TOTAL POINT VALUE FOR PART 7 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Part 8: Operator Certification

Complete the *Plant and Collection System Personnel Inventory,* ADEM Form 441.

Do both the plant operator and collection system staffing comply with ADEM Administrative Code; Division 10, Operator Certification Program?
(Check the appropriate point total.)

☒ Yes = 0 points ☐ No = 121 points

TOTAL POINT VALUE FOR PART 8 0 (highest point total = 121)
Enter this value on Part 11: Summary Sheet.

Facility Name: SPRING BRANCH WWTP

Part 9: Financial Status

A. Are User-Charge Revenues sufficient to cover operation and maintenance expenses? If no, how are O&M costs being financed? ***Include user charge rates***.

YES

Residential Minimum 0 Plus rate 4.83 /1,000 gal.

Industrial Minimum 0 Plus rate 5.68 /1,000 gal.

Monthly residential rate based on 6,000 gallons usage $ 28.98

B. What financial resources are available to pay for the wastewater improvements and/or reconstruction needs?

ADEQUATE USER CHARGE SYSTEM WITH A+ BOND RATING FROM STANDARD & POORS.

C. Please attach a rate sheet and the most recent audit, if available.

Part 10: Subjective Evaluation

A. Describe briefly the physical and structural conditions of the wastewater treatment facility.

ALL CONCRETE AND METAL STRUCTURES ARE IN GOOD CONDITION. THERE CURRENTLY EXISTS NO PROBLEMS WITH PREMATURE FAILURE DUE TO CORRISION OR DIFFERENTIAL SETTLING. WWTP UPGRADES CONTINUE.

B. Describe the general condition of the sewer system (sewer lines, manholes, lift stations).

CLEAR WATER INTRUSION FOR THE FACILITY IS ESTIMATED AT 25%. INFLOW AND INFILTRATION PROJECTS CONTINUE FOR THE SERVICE AREA.

C. What sewage system improvements does the community have planned for construction in the next 5 years?

PLANT IMPROVEMENTS TO INCLUDE UGRADING ANAEROBIC DIGESTERS

UPGRADING AERATION BASIN BLOWERS

UPGRADING GREASE RECEIVING FACILITY

D. What is the theoretical design life of the plant, and what is the estimated remaining useful life of the wastewater treatment facility?

DESIGN LIFE IS 50 YEARS. REMAINING LIFE IS 50 YEARS.

E. What problems, if any, over the last year have threatened treatment or conveyance within the system?

NONE

F. Is the community presently involved in formal planning for treatment facility upgrading?

YES. FUNDING IS IN PLACE TO ADEQUATELY PLAN FOR ANY GROWTH. ALL PROJECTS AND CONTRACTS ARE APRROVED IN PUBLIC FORUM.

G. How many days in the last year were there residential backups at any point in the collection system for any reason other than clogging of the lateral connection? 2

H. Does the plant have a written plan for preventive maintenance on major equipment items? If yes, describe.

YES. ELECTRICAL:MEG-OHM, AMP CHECK. MECHANICAL:LUBRICATION OF ALL BEARINGS,SEALS,ETC. THESE TASKS ARE PREFORMED FROM PREVENTATIVE MAINTENANCE LOGS AND TRACKED THROUGH DEPARTMENT DATABASES.

I. Does this preventive maintenance program depict frequency of intervals, types of lubrication, and other preventive maintenance tasks necessary for each piece of equipment?

(Check the appropriate response.) ☒ Yes ☐ No

J. Are these preventive maintenance tasks, as well as equipment problems, being recorded and filed so future maintenance problems can be assessed properly?

(Check the appropriate response.) ☒ Yes ☐ No

K. Describe any major repairs or mechanical equipment replacement made in the last year and include the approximate cost for those repairs. Do not include major treatment plant construction or upgrading programs.

$1,150,000.00 DIGESTER IMPROVEMENTS

$450,000 STRUCTURAL/MECHANICAL PROCESSS TRAIN EQUIPMENT REPAIRS

$550,000.00 SANITARY SEWER IMPROVEMENTS

$150,000.00 VARIOUS ELECTRICAL/SCADA REPAIRS

L. List any additional comments. (Attach additional sheets if necessary.)

$500,000.00 WAS BUDGETED FOR ROUTINE REPAIRS FOR THIS PLANT IN 2022.

THESE FUNDS WERE ALLOCATED FOR VARIOUS REPAIRS INCLUDING PUMPS,

PROCESS EQUIPMENT AND ANY OTHER MECHANICAL/ELECTRICAL REPAIRS

NEEDED. IN ADDITION, CAPITAL PROJECTS AS MENTIONED ABOVE ARE ALSO

BUDGETED. THIS AMOUNT DOES NOT INCLUDE WHAT IS ANNUALLY

BUDGETED FOR THE COLLECTION SYSTEM.

Facility Name: SPRING BRANCH WWTP

Part 11: Summary Sheet

1. Enter in the values from Parts 1 through 8 in the left column below. Add the numbers in the left column to determine the MWPP Report point total the wastewater system generated for the previous calendar year.

Actual Values	Maximum Possible
Part 1 0 points	80 points
Part 2 0 points	121 points
Part 3 2 points	40 points
Part 4 0 points	200 points
Part 5 0 points	50 points
Part 6 0 points	50 points
Part 7 0 points	121 points
Part 8 0 points	121 points
Total 2 points	783 points

2. Check the facility type that best describes the plant's treatment and disposal of wastewater.

- [x] Mechanical plant with surface water discharge
- [ ] Aerated Lagoon or stabilization pond with surface water discharge
- [ ] Mechanical plant using land disposal of liquid wastes
- [ ] Aerated Lagoon or stabilization pond using land disposal of liquid wastes

3. Check the range that describes the action needed to address problems identified in the report.

- [x] 0 - 70 points Actions as Appropriate*
- [ ] 71 - 120 points Departmental Recommendation Range*
- [ ] 121 – 783 points Municipality Action Range*

***Other actions may be required by NPDES outside the scope of this report.**

4. Complete the *Municipal Water Pollution Prevention Resolution Form*, ADEM Form 418.

5. In Question 1, do any of the actual point values in the left column equal the maximum possible points in the right column?

(Check the appropriate response.) ☐ Yes ■ No

If yes, provide a written explanation for this situation in the space below.

PLANT AND COLLECTION SYSTEM PERSONNEL INVENTORY

FACILITY NAME: Spring Branch WWTP PLANT GRADE: IV

PERMIT NUMBER: AL0058394

PLANT SUPERINTENDENT: Wesley Baugh TEL. # 256-883-3719

SYSTEM MANAGER: Shane Cook TEL. # 256-883-3719

PLANT OPERATORS:

	NAME	GRADE OR TRAINEE STATUS	OPERATOR NO.	EXP. DATE
1	Wesley Baugh	IV	C006624	8/31/25
2	Michael Loyd	IV	C009539	4/30/24
3	Kason Furnas	IV	C006203	7/31/25
4	Trenton Anton	IV	C009231	11/30/23
5	Chauncey Woodard	IV	C009232	2/28/2026
6	Matthew Towry	IV	C004498	8/31/24
7	DeAngelo Smith	IV	C009239	4/30/24
8	Barrie Livingston	IV	C000295	8/31/25
9				

COLLECTION SYSTEM OPERATORS:

1	Robin Christopher	IC	C007609	10/31/25
2	Ryan Pullen	IC	C009597	9/30/23
3	Greg Fine	IC	C009232	7/31/23
4	Randall Goode	IC	C009529	7/31/23

	MAN HRS./WK	NUMBER
MANAGEMENT/SUPERVISOR	40	1
OPERATOR(S):		
GRADE I-C	40	4
GRADE I		
GRADE II		
GRADE III		
GRADE IV	252	8
DESIGNATED TRAINEE(S)		
LABORATORY	80	2
MAINTENANCE	80	2
OTHER PLANT WORKERS	31	1

AVERAGE NUMBER OF EMPLOYEES PER SHIFT:

1ST	10	START TIME	6:00A
2ND	1		6:00P

OPERATOR SHIFTS NORMALLY WORKED EACH DAY:

	SUN	MON	TUES	WED	THURS	FRI	SAT
1ST	12	12	12	12	12	12	12
2ND	12	12	12	12	12	12	12

ADEM USE ONLY

	YES	NO
1. DOES PLANT OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		
2. DOES COLLECTION SYSTEM OPERATOR STAFFING COMPLY WITH DIVISION 10 OF ADEM ADMINISTRATIVE CODE?		

ADEM FORM 441 8/02

ALABAMA POTW'S SEWAGE SLUDGE SURVEY *

Facility Background Information:

1. Facility Information

Permit Number: AL0058394

Name: SPRING BRANCH WASTEWATER TREATMENT PLANT

Street Address: 1800 VERMONT ROAD

County: MADISON

2. Facility Contact

Name: SHANE L. COOK

Title: DIRECTOR OF WATER POLLUTION CONTROL

Telephone: 256-883-3719

Permittee Name: CITY OF HUNTSVILLE

Mailing Address: 1800 VERMONT ROAD

HUNTSVILLE, AL 35802

Facility Flow Information

1. Facility Wastewater Treatment Capacity

Avg. Daily Flow for 2022: 20.06 MGD

Facility Design Capacity: 41.0 MGD

2. Estimated Septage Quantity Handled (Residuals Removed from Septic Tank Systems)

Average Domestic Septage: 300000 gallons per month

Average Commercial Septage: 100000 gallons per month

3. Method of Septage Processing

x Mixed with Influent Wastewater for Treatment

☐ Mixed with Sewage Sludge

☐ _____

4. Estimated Percentage Contributing Wastewater Flow

Residential: 85 %

Industrial: 5 %

Other: 10 % Describe: Commercial Flow

5. List type of wastewater treatment process(es) utilized at this facility:

PRIMARY CLARIFIER, FINE BUBBLE AERATION, SECONDARY CLARIFIER, CHLORINATION

6. Estimated sewage sludge wasting rate at this facility: 11129 lb/day dry weight

or _____ gallons per day

7. Estimated untreated sludge received from off site: 0 lb/day dry weight

or _____ gallons per day

8. Estimated percent solids of combined sewage sludge prior to treatment: 70 %

9. List the sewage sludge treatment processes used in preparing sludge for final use or disposal:

	Sludge Quantity (untreated pounds per day)
N/A	

10. Estimate the total volume of sludge generated: 2031 (dry U.S. tons per year)

Sludge Disposal Methods

1. Which of the following describes the current method of sewage sludge disposal for this facility:

	Current Practices			Proposed Practices	
	Approved by ADEM		Quantity	Approved by ADEM	
	Yes	No	(dry U.S. tons/year)	Yes	No
a. ☐ Land Application, Bulk Shipped					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
b. ☐ Land Application, Bagged/Other Container					
☐ Agriculture	☐	☐		☐	☐
☐ Forest	☐	☐		☐	☐
☐ Public Contact	☐	☐		☐	☐
☐ Lawn/Home Garden	☐	☐		☐	☐
c. x Incineration	X	☐	2031	X	☐
d. ☐ Subtitle D Landfill (Disposal Only)	☐	☐		☐	☐
e. ☐ Lined Treatment Lagoon or Stabilization Pond	☐	☐		☐	☐
f. ☐ Unlined Lagoon or Stabilization Pond	☐	☐		☐	☐
g. ☐ Other (Please Describe)	☐	☐		☐	☐

2. If "f" was selected above and sludge is stored for 2 or more years, enter the distance between the surface disposal site and the property line: _____ feet

Pollutant Concentrations

1. Enter the total concentrations of the following analytes using existing data. Do not enter TCLP results.

Analyte	Concentration (mg/kg or ppm)	Sample Type	Sample Date	Detection Level of Analysis

Arsenic				
Cadmium				
Chromium				
Copper				
Lead				
Mercury				
Molybdenum				
Nickel				
Selenium				
Zinc				
Ammonium-Nitrogen				
Nitrate-Nitrogen				
Total Kjeldahl Nitrogen				

2. Enter the estimated or determined percent solids of the sewage sludge when sampled for the above analysis: _____ %

Treatment Provided for Sewage Sludge at the Facility

1. Which class of pathogen reduction does the sewage sludge meet at the facility? (As defined in 40 CFR Part 503)

- ☐ Class A
  - ☐ Alternative A1 - Time and Temperature
  - ☐ Alternative A2 - Alkaline Treatment
  - ☐ Alternative A3 - Analysis and Operation
  - ☐ Alternative A4 - Analysis Only
  - ☐ Alternative A5 - Processes to Further Reduce Pathogens (PFRP)
    - ☐ Heat Drying
    - ☐ Thermophilic Aerobic Digestion
    - ☐ Heat Treatment
    - ☐ Pasteurization
    - ☐ Gamma Ray Irradiation
    - ☐ Beta Ray Irradiation
    - ☐ Composting
    - ☐
    - ☐
  - ☐ Alternative A6 - PFRP Equivalent _____

- ☐ Class B
  - ☐ Alternative B1 - Fecal Coliform Count
  - ☐ Alternative B2 - Process to Significantly Reduce Pathogens (PSRP)
    - ☐ Aerobic Digestion
    - ☐ Air Drying
    - ☐ Anaerobic Digestion
    - ☐ Composting
    - ☐ Lime Stabilization
  - ☐ Alternative B3 - PSRP Equivalent _____
- ☐ Neither or Unknown

Vector Attraction Control

- ☐ Option 1 - Minimum 38% Reduction in Volatile Solids
- ☐ Option 2 - Anaerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 3 - Aerobic Processes, with Bench-Scale Demonstration of Volatile Solids Reduction
- ☐ Option 4 - Specific Oxygen Uptake Rate (SOUR) for Aerobically Digested Sludge
- ☐ Option 5 - Aerobic Processes plus Elevated Temperature

- ☐ Option 6 - Raised pH to 12 and Retained at 11.5
- ☐ Option 7 - 75% Solids with no Unstabilized Solids
- ☐ Option 8 - 90% Solids with Unstabilized Solids
- ☐ Option 9 - Injection Below Land Surface
- ☐ Option 10 - Incorporation into Soil within 6 or 8 Hours
- ☐ Option 11 Covering Active Sewage Sludge Unit Daily
- ☐ None of the Above

Groundwater Monitoring

1. If disposal practice is surface disposal or land application, is groundwater monitoring required or performed at the site?

☐ Yes (If yes, please submit a copy of the groundwater monitoring reports along with this survey. Also please provide the approximate depth to groundwater and the groundwater monitoring procedures used to obtain the data.)

☐ No

Land Application of Sewage Sludge

Answer the following questions if sewage sludge is applied to land.

1. If sewage sludge is land applied in bulk form, what type of crop or other vegetation is grown on this site?

N/A

2. If sewage sludge is land applied in bulk form, what is the nitrogen requirement for this crop or vegetation?

N/A

3. If sewage sludge is land applied in bulk form, briefly describe the nature of any complaints filed from neighbors?

N/A

* Permittees that submitted the "Annual Report Review Form" for sludge to the EPA may submit a copy with the MWPP in lieu of Attachment 3.

Submission Complete

NPDES Sanitary Sewer Overflow (SSO) Event Reporting Form (NPDES Sanitary Sewer Overflow (SSO) Event Report)

SSO ID SSO-00207526 Submission HPG-D297-4SBT6 Revision 1 Form Version 1.1

NPDES Sanitary Sewer Overflow (SSO) Event Reporting Form

version 1.1

(Submission #: HPG-D297-4SBT6, version 1)

Details

Submission Alias	NPDES Sanitary Sewer Overflow (SSO) Event Report
SSO ID	SSO-00207526
Submission ID	HPG-D297-4SBT6
Status	Submitting

Form Input

General Instructions

Processing

NOTE: You should choose the correct status for this SSO notification/report each time you submit a notification/report. If you are able to complete all of the information in the first submittal, please indicate the status of "Submit both the Initial 24-hour notification and 5-day report concurrently."

Indicate which of the following describes the status of this SSO notification/report:
Submit both the Initial 24-hour notification and 5-day report concurrently

Prior to submitting this notification/report through AEPACS, did you make the first notification of this SSO to the Department by a method other than AEPACS (e.g. SSO Hotline, Fax, Email)?
No

Regardless of the notification method used to first notify the Department of this SSO event (i.e. AEPACS, SSO hotline, fax, etc), was the initial notification made to the Department within 24 hours of becoming aware of the event?
Yes

Permittee Information

Permit Number
AL0058394

Permittee
City of Huntsville

Facility/Site Information

Facility Name
Spring Branch WWTP

Facility County
Madison

Assigned SSO ID

Assigned SSO ID
SSO-00207526

SSO Event - Information

Date/Time SSO Event Started:

Date	Time
3/23/2022	09:05 am

Is the SSO on-going?
No

Date/Time SSO Event Stopped:

Date	Time
3/23/2022	03:15 pm

Did the SSO occur during wet weather?
Yes

Was the SSO caused by an extreme weather event (e.g. hurricane) that flooded the ENTIRE sewer system?
No

Report Estimated Volume Discharged as
Range

Estimated Volume Discharged (Range)
1,000 < gallons <= 10,000

Indicate source of discharge event
Manhole

County in which SSO occurred (check all that apply)
Madison

Note
For detailed information on how to place a point on the map, please click the Map Help link below. Also, when reporting for an SSO(s) caused by an extreme weather event, please specify a general location for the SSO(s):
Map Help link

Latitude/Longitude of discharge
34.72543137133828,-86.60071375521072

Note
Please specify either the street address or location description for the discharge

Street Address
2222 Hall Avenue

City
Huntsville

State
AL

ZIP Code
35801

Location Description
Intersection of Hall Avenue and Derrick Street.

Known or suspected cause of the discharge
Infiltration in the Collection System due to heavy rain event.

Destination of discharge
Creek or River

Provide the first named creek or river that receives the flow.
Broglan Branch

Did the discharge enter an unnamed tributary prior to entering the first named creek or river listed above?
No

Did the discharge reach a designated swimming water?
No

Monitoring of the receiving water (i.e. visual survey or water quality sampling) is:
Not Performed

Was the affected area cleaned?
Yes

Was the affected area disinfected?
Yes

Are you aware of any other potential health or environmental impacts?
No

SSO Event - Corrective Action

Describe corrective actions taken, plans to eliminate future discharges, and actions or plans to mitigate impacts to the environment and/or public health.
Area was cleaned and disinfected. Investigations will continue to determine the source of inflow.

Please attach supporting information, if applicable:
NONE PROVIDED
Comment
NONE PROVIDED

Indicate efforts to notify public (check all that apply):
Placement of Signs

Date signs were placed:
3/23/2022

Indicate Other Officials Notified (check all that apply):
County Health Department
Other (Please Describe)

County Health Department notification date:
3/23/2022

Please describe the "Other" officials notified:
Storm Water Authority

Other Officials Notification Date:
3/23/2022

Other States notified:
NONE PROVIDED

Were any public water supply intake locations affected?
No

Additional Attachments

Additional Attachments
NONE PROVIDED
Comment
NONE PROVIDED

General Comments

General Comments (Optional)
Area was cleaned and disinfected. Investigation will continue to determine the source of inflow.

Status History

	User	Processing Status
3/23/2022 4:15:51 PM	Randall Stewart	Draft
3/23/2022 4:27:17 PM	Randall Stewart	Submitting
3/23/2022 4:27:17 PM	Randall Stewart	Signing

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.

I certify that I have personally examined and am familiar with the information submitted herein. Based on my inquiry of those individuals immediately responsible for obtaining the information, I believe the submitted information to be true, accurate, and complete. I am aware that there are significant penalties for knowingly submitting false information, including the possibility of fine and imprisonment.

Signed By Randall Stewart on 03/23/2022 at 4:16 PM

Submission Complete

NPDES Sanitary Sewer Overflow (SSO) Event Reporting Form (NPDES Sanitary Sewer Overflow (SSO) Event Report)

SSO ID SSO-00208712 Submission HPG-D2H2-44VR1 Revision 1 Form Version 1.1

NPDES Sanitary Sewer Overflow (SSO) Event Reporting Form

version 1.1

(Submission #: HPG-D2H2-44VR1, version 1)

Details

Submission Alias	NPDES Sanitary Sewer Overflow (SSO) Event Report
SSO ID	SSO-00208712
Submission ID	HPG-D2H2-44VR1
Status	Submitting

Form Input

General Instructions

Processing

NOTE: You should choose the correct status for this SSO notification/report each time you submit a notification/report. If you are able to complete all of the information in the first submittal, please indicate the status of "Submit both the Initial 24-hour notification and 5-day report concurrently."

Indicate which of the following describes the status of this SSO notification/report:
Submit both the Initial 24-hour notification and 5-day report concurrently

Prior to submitting this notification/report through AEPACS, did you make the first notification of this SSO to the Department by a method other than AEPACS (e.g. SSO Hotline, Fax, Email)?
No

Regardless of the notification method used to first notify the Department of this SSO event (i.e. AEPACS, SSO hotline, fax, etc), was the initial notification made to the Department within 24 hours of becoming aware of the event?
Yes

Permittee Information

Permit Number
AL0058394

Permittee
City of Huntsville

Facility/Site Information

Facility Name
Spring Branch WWTP

Facility County
Madison

Assigned SSO ID

Assigned SSO ID
SSO-00208712

SSO Event - Information

Date/Time SSO Event Started:

Date	Time
3/23/2022	08:45 am

Is the SSO on-going?
No

Date/Time SSO Event Stopped:

Date	Time
3/23/2022	03:30 pm

Did the SSO occur during wet weather?
Yes

Was the SSO caused by an extreme weather event (e.g. hurricane) that flooded the ENTIRE sewer system?
No

Report Estimated Volume Discharged as
Range

Estimated Volume Discharged (Range)
1,000 < gallons <= 10,000

Indicate source of discharge event
Manhole

County in which SSO occurred (check all that apply)
Madison

Note
For detailed information on how to place a point on the map, please click the Map Help link below. Also, when reporting for an SSO(s) caused by an extreme weather event, please specify a general location for the SSO(s):
Map Help link

Latitude/Longitude of discharge
34.732720870711496,-86.61062982801029

Note
Please specify either the street address or location description for the discharge

Street Address
1015 Meadow Drive

City
Huntsville

State
AL

ZIP Code
35801

Location Description
Intersection of Meadow Drive and Hart Drive.

Known or suspected cause of the discharge
Inflow in the collection system after a heavy rain event.

Destination of discharge
Creek or River

Provide the first named creek or river that receives the flow.
Broglan Branch

Did the discharge enter an unnamed tributary prior to entering the first named creek or river listed above?
No

Did the discharge reach a designated swimming water?
No

Monitoring of the receiving water (i.e. visual survey or water quality sampling) is:
Not Performed

Was the affected area cleaned?
Yes

Was the affected area disinfected?
Yes

Are you aware of any other potential health or environmental impacts?
No

SSO Event - Corrective Action

Describe corrective actions taken, plans to eliminate future discharges, and actions or plans to mitigate impacts to the environment and/or public health.
Area was cleaned and disinfected. Investigation will continue to determine the source of inflow.

Please attach supporting information, if applicable:
NONE PROVIDED
Comment
NONE PROVIDED

Indicate efforts to notify public (check all that apply):
Placement of Signs

Date signs were placed:
3/23/2022

Indicate Other Officials Notified (check all that apply):
County Health Department
Other (Please Describe)

County Health Department notification date:
3/23/2022

Please describe the "Other" officials notified:
Storm Water Authority

Other Officials Notification Date:
3/23/2022

Other States notified:
NONE PROVIDED

Were any public water supply intake locations affected?
No

Additional Attachments

Additional Attachments
NONE PROVIDED
Comment
NONE PROVIDED

General Comments

General Comments (Optional)
Area was cleaned and disinfected. Investigation will continue to determine the source of inflow.

Status History

	User	Processing Status
3/23/2022 4:29:53 PM	Randall Stewart	Draft
3/23/2022 4:36:31 PM	Randall Stewart	Signing
3/23/2022 4:36:31 PM	Randall Stewart	Submitting

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.

I certify that I have personally examined and am familiar with the information submitted herein. Based on my inquiry of those individuals immediately responsible for obtaining the information, I believe the submitted information to be true, accurate, and complete. I am aware that there are significant penalties for knowingly submitting false information, including the possibility of fine and imprisonment.

Signed By Randall Stewart on 03/23/2022 at 4:30 PM

NPDES Sanitary Sewer Overflow (SSO) Event Reporting Form

version 1.3

(Submission #: HPP-X4Z7-AHBKS, version 1)

Details

Submission Alias	NPDES Sanitary Sewer Overflow (SSO) Event Report
SSO ID	SSO-00208742
Submission ID	HPP-X4Z7-AHBKS

Form Input

General Instructions

All publicly or privately owned wastewater treatment plants holding an NPDES permit are required to provide immediate notification to the Alabama Department of Environmental Management (ADEM), county public health officials, the public, and any other affected entity such as public water systems as soon as possible upon becoming aware of any notifiable sanitary sewer overflow (SSO) events.

A "notifiable SSO", as defined in ADEM Admin. Code r. 335-6-6-.02(hh), is an overflow, spill, release or diversion of wastewater from a sanitary sewer system that either (1) reaches a surface water of the State or (2) may imminently and substantially endanger human health based on potential for public exposure including but not limited to close proximity to public or private water supply wells or in areas where human contact would be likely to occur.

Immediate notification shall be provided within 24 hours of becoming aware of the event. This immediate notification may be made either verbally to the Department's SSO Hotline at (334) 274-4200 or electronically to the Department's Alabama Environmental Permitting and Compliance System (AEPACS) system. The follow-up report shall be submitted within five days of becoming aware of the SSO event using the Department's AEPACS system.

Special Note:

The Sanitary Sewer Overflow map allows users to see the locations of SSOs that have been reported to the Department. They are displayed on the map for 10 days after the SSO has ceased. The colors indicate the volume of the discharge.

Click on any dot on the map and a popup will display information about the SSO(s).

At the top of the popup that is displayed after clicking on a dot, there is a number that indicates the number of SSOs at that location. Users can cycle through them by clicking on the arrows at the top of the popup.

At the bottom of the popup is a link ("click for eFile") that will take users to SSOs reported from that facility. The eFile entries that appear are sorted by date from most recent to oldest and contain only SSO reports.

Users can zoom in and out by using the +/- buttons at the top left of the map, the scroll on their mouse, or by holding the Shift key down while clicking and dragging a box on the map to zoom in.

The Switch Basemap button at the top right of the page allows users to select a different basemap.
Please also be aware that the SSOs reported to the Department will appear on a public map here.

Processing

NOTE: You should choose the correct status for this SSO notification/report EACH time you submit a notification/report.

If you are able to complete all of the information in the first submittal, please indicate the status of ◆Submit both the Initial 24-

Indicate which of the following describes the status of this SSO notification/report:
Submit both the Initial 24-hour notification and 5-day report concurrently

Prior to submitting this notification/report through AEPACS, did you make the first notification of this SSO to the Department by a method other than AEPACS (e.g. SSO Hotline, Fax, Email)?
No

Regardless of the notification method used to first notify the Department of this SSO event (i.e. AEPACS, SSO hotline, fax, etc), was the initial notification made to the Department within 24 hours of becoming aware of the event?
Yes

Permittee Information

Permit Number
AL0058394

Permittee
City of Huntsville Water Pollution Control

Facility/Site Information

Facility Name
Spring Branch WWTP

Facility County
Madison

Assigned SSO ID

Assigned SSO ID
SSO-00208742

SSO Event - Information

Date/Time SSO Event Started:

Date	Time
12/12/2022	12:02 pm

Is the SSO on-going?
No

Date/Time SSO Event Stopped:

Date	Time
12/12/2022	12:48 pm

Did the SSO occur during wet weather?
No

Was the SSO caused by an extreme weather event (e.g. hurricane) that flooded the ENTIRE sewer system?
No

Note:
If estimated volume discharged is known, the VALUE section should be completed. If you only select a RANGE, you should be aware that the estimated volume discharged will be considered to be the largest value of the range selected. Estimated volumes above 1,000,000 gallons must be entered as a VALUE.

Report Estimated Volume Discharged as
Value

Estimated Volume Discharged (in gallons)
10

Indicate source of discharge event
Other (Please Describe)

Please describe the ◆Other◆ source(s) of the discharge event
Home Bathroom

County in which SSO occurred (check all that apply)
Madison

Note
For detailed information on how to place a point on the map, please click the Map Help link below. Also, when reporting for an SSO(s) caused by an extreme weather event, please specify a general location for the SSO(s):
Map Help link

Latitude/Longitude of discharge
34.7452976,-86.5527268

Note
Please specify either the street address or location description for the discharge

Street Address
721 Chambers Drive

City
Huntsville

State
AL

ZIP Code
35613

Location Description
Bathroom

Known or suspected cause of the discharge
Roots/Grease

Destination of discharge
Backup into Building/Residence

Did the discharge reach a designated swimming water?
No

Monitoring of the receiving water (i.e. visual survey or water quality sampling) is:
Not Performed

Was the affected area cleaned?
Yes

Was the affected area disinfected?
Yes

Are you aware of any other potential health or environmental impacts?
No

SSO Event - Corrective Action

Describe corrective actions taken, plans to eliminate future discharges, and actions or plans to mitigate impacts to the environment and/or public health.
Sewer mains were cleaned and tv'd to determine the cause. Sewer mains will be put on a more frequent cleaning/inspection

Please attach supporting information, if applicable:
NONE PROVIDED
Comment
NONE PROVIDED

Indicate efforts to notify public (check all that apply):
Notice not required

Please explain why notice to the public was not required and, if cited as the reason why no notice was given, also give the reason why the SSO event was not a notifiable SSO:
Backup was confined to a residential bathroom. Homeowner made us aware of the issue.

Indicate Other Officials Notified (check all that apply):
Notice Not Required

Please explain why notice to the other officials was not required and, if cited as the reason why no notice was given, also give the reason why the SSO event was not a notifiable SSO:
Backup was confined to a residential bathroom. Homeowner made us aware of the issue.

Other States notified:
NONE PROVIDED

Were any public water supply intake locations affected?
No

Additional Attachments

Additional Attachments
NONE PROVIDED
Comment
NONE PROVIDED

General Comments

General Comments (Optional)
SSO was confined to a residential bathroom. Homeowner notified WPC and SSO was stopped quickly. Restoration company was dispatched to remediate the affected area.

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.

I certify that I have personally examined and am familiar with the information submitted herein. Based on my inquiry of those individuals immediately responsible for obtaining the information, I believe the submitted information to be true, accurate, and complete. I am aware that there are significant penalties for knowingly submitting false information, including the possibility of fine and imprisonment.

Signed By Randall Stewart on 12/13/2022 at 12:06 PM