



CITY OF HOT SPRINGS

Utilities Department

780 Adams Street

Hot Springs, Arkansas 71901

May 12, 2023

VIA Email

Leslie Allen-Daniel
Enforcement Analyst – Water Division
Arkansas Energy & Environment – Environmental Quality
5301 Northshore Drive
North Little Rock, AR 72118-5317

RE: City of Hot Springs Utilities
Permit No. AR0033880 / AFIN 26-00145 / CAO LIS 22-007
Manhole 1750, Gulpha Creek and Spencer Bay - Amended

Dear Ms. Allen-Daniel,

The following components are a brief synopsis of progress regarding the CAO with regards to SSOs at Manhole 1750 and affecting water quality in Gulpha Creek and Spencer Bay.

The RJN Group, Inc. has the contract for the Lower Gulpha Gravity Interceptor from Spring Street to the Gulpha Pump Station. The project is funded by the 2020 Wastewater Bond. Below is their updated schedule.

Lower Gulpha Interceptor – RJN Group

Item No.	Begin	End	Description
1	03/22/22	09/16/22	Conceptual Design Report Submitted
2	03/22/22	09/16/22	30% Plan Submitted
3	03/22/22	01/20/23	Conceptual Design Report Final
4	03/22/22	01/20/23	60% Plan Submitted
5	01/21/23	06/16/23	90% Plan Submittal (pending easement acquisition)
Sub Consultants			
6	03/22/22	Ongoing	Crist Survey – Easement documents submitted to CHS on 3/6/23.
7	03/22/22	Complete	Ace Pipe Multi-Sensor Inspection - Completed field work and submitted summary documentation.
8	03/22/22	Ongoing	Eco Environmental - Completed USFWS IPAC and correspondence with USFWS Bat Biologist for tree cutting dates. Completed the request for comments letter to SHPO. Awaiting design progression.
9	04/29/22	Ongoing	Grubbs Geotechnical – RJN identified 11 phase 2 locations currently as contracted. Field work being scheduled
10	02/06/2023	Ongoing	SUE – Badger Daylighting completed SUE of 7 locations.

Crist Engineers, Inc. has the contract for the Gulpha Pump Station Improvements. The project is funded by the 2020 Wastewater Bond. Plans are 100% complete, pending Arkansas Department of Health review and approval. We anticipate bidding the project around June 1, 2023. The construction will be done in coordination with the Gulpha Force Main Project.

Gulpha Pump Station Improvements – Crist Engineers

Item No.	Begin	End	Description
1	03/22/22	Ongoing	Engagement of professional services with Crist Engineers
		07/1/2022	Conceptual Design Phase
		09/1/2022	60% Design Phase
		01/1/2023	90% Design Phase
		03/1/2023	100% Design Phase
2	03/22/22	04/8/22	On site survey on the pump station site, planimetrics, surface features, and contour development
3	03/22/22	Ongoing	Commenced initial hydraulic evaluation of pump alternatives for pump station site. Acceptable pump manufacturers are Cornell, Fairbanks and Flygt.
4	03/22/22	Ongoing	Design Phase Services
5	04/11/23	Ongoing	Submittal to ADH for review - Gulpha Pump Station: ADH Approval anticipated any day
6		06/23	Bidding and Negotiation Services
		07/23	Award Project
7	07/23/23	09/1/24	Construction Phase Services
8		09/2024	Project Complete

It is to be noted that the success of any improvements in the Gulpha Basin, including pump station, gravity and force main infrastructure is directly dependent on the completion of improvements at the Davidson Drive Wastewater Treatment Plant. No ADEQ construction permit has been issued for the plant improvements as of today's date.

Hanson & McLaughlin, LLC is working on the Gulpha Force Main from the Gulpha Pump Station to the Davidson Drive Wastewater Treatment Plant. Plans are 100% complete, relative to easement acquisitions. We anticipate bidding the project around June 30, 2023. The project is funded by the 2020 Wastewater Bond. It has been determined that a 30" forcemain is large enough to carry wet weather flows. The existing 20" force main, intended to carry dry weather flow is failing much sooner than anticipated. CHS has added a 24" replacement force main to the project for expedited construction. Changes to schedule noted below.

Gulpha Force Main – Hanson McLaughlin

Item No.	Begin	End	Description
1	03/15/22	3/31/2024	Gulpha Force Main contract signed.
2	03/15/22	Complete	Surveying.
3	03/15/22	Ongoing	Geotechnical engineering.
4	04/08/22	Ongoing	Design Process.
5	04/08/22	Ongoing	Project Manual (specifications) preparation.
6	04/15/22	Complete	30% Plan Submittal.
7	6/01/22	Complete	60% Plan Submittal.
8	02/02/23	Ongoing	24-Inch Force Main Addition
9	10/01/22	06/30/23	100% Plan Submittal (with easements).
10	07/01/23	08/31/23	Bid Phase/Procurement Services.
11	9/1/23	06/03/25	Construction Phase Services.

Hawkins-Weir Engineers, Inc. has the contract for the Spring Street Collection System Improvements project. The project is funded by the 2020 Wastewater Bond. There is no change to their schedule.

Spring Street Collection System Improvements – Hawkins-Weir Engineers

Item No.	Begin	End	Description
1	3/22/22	Complete	Design Phase Services Complete 11/4/2022
2	3/30/22	Complete	Survey – Completed on October 28, 2022
3	TBD	TBD	Advertising / Bidding <i>Note: This project will be advertised and bid after the WW Treatment Plant, Gulpha Pump Station, Gulpha Force Main and Lower Gulpha Interceptor projects are bid. Depending on available remaining funds, the Spring Street project may be constructed in phases.</i>
4	9/8/22	Ongoing	Permitting <ul style="list-style-type: none">• National Park Service approval received October 25, 2022.• ADH Approval received November 10, 2022• ARDOT Approval received 3/22/2023
5	TBD	TBD	Construction Services

There were four SSOs reported in April for Manhole 1750 affecting the Gulpha Creek-Spencer Bay area (see data on attached pages). The April 25 overflow continued to May 3 and will be more completely documented in the next report. Currently, in order to prevent force main failure, only one pump is operating below capacity at the Gulpha Pump Station.

Should you need further information, please contact me at (501)651-7730 or by email at mledbetter@cityhs.net.

Sincerely,



Monty Ledbetter
Utilities Director

Attachments: April Lab Results for MH 1750 SSO's
Summary of Wastewater Treatment and Collection System Improvement Projects

cc: **City of Hot Springs** - Bill Burrough, City Manager; Denny McPhate, Deputy City Manager; Harold Mauldin, Wastewater Facilities Operations Manager; Todd Piller, Capital Project Manager;
Consultants - Karl Hanson, Hanson McLaughlin; Chris Leathers, RJN Group; Craig Johnson, Crist Engineers; Elizabeth Heiles, Hawkins-Weir

Manhole 1750

Gulpha Sewer Basin

117 Catherine Heights Road
 Hot Springs, Arkansas

- Affecting Gulpha Creek and Spencer Bay

On November 18, 2022 DEQ provided a response accepting Hot Springs Utilities Revised Bacteriological Sampling and Communications Plan for SSO's. The plan states that the Water Quality Assessment testing and Fecal Coliforms are no longer needed. The plan also aligns with the contact periods as depicted in Rule 2.507 for acceptable E.Coli numbers.

Acceptable E.Coli cfu limits: **October 1 through April 30 <630 cfu**
 May 1 through September 30 <126 cfu

Manhole 1750 Sanitary Sewer Overflows for April 2023

Overflow Date: 4/6/2023
 End Date: 4/6/2023
 Cause: Line Failure
 Discharge: Approximately 270,000 Gallons discharge to Gulpha Creek
 Actions Taken: Environmental Cleanup, Hydro cleaned, Disinfected, Deodorized, Raked/picked up and Spread Lime

Lab Results

Sample Date:	4/6/2023
Site No.	E. coli (cfu)
1	285.1

Overflow Date: 4/11/2023
 End Date: 4/11/2023
 Cause: Equipment Failure
 Discharge: Approximately 45,000 Gallons discharge to Gulpha Creek
 Actions Taken: Environmental Cleanup, Hydro cleaned, Disinfected, Deodorized, Raked/picked up and Spread Lime

Lab Results

Sample Date:	4/6/2023
Site No.	E. coli (cfu)
1	113.7

Overflow Date: 4/20/2023
 End Date: 4/24/2023
 Cause: Rainfall and Equipment Failure Event
 Discharge: Approximately 1,674,000 Gallons discharge to Gulpha Creek
 Actions Taken: Environmental Cleanup, Hydro cleaned, Disinfected, Deodorized, Raked/picked up and Spread Lime

Lab Results

Sample Date:	4/21/23	Sample Date:	4/24/23	Sample Date:	4/25/23	Sample Date:	4/27/23
Site No.	E. coli (cfu)	Site No.	E. coli (cfu)	Site No.	E. coli (cfu)	Site No.	E. coli (cfu)
1	>2419.6	2	37.7	2	67.0	2	98.7
		3	>2419.6	3	93.4	3	158.5
		4	111.8	4	387.3	4	378.4
		5	137.2	5	222.4	5	1553.1

Sample Date:	4/28/23	Sample Date:	5/1/23	Sample Date:	5/3/23	Sample Date:	5/4/23
Site No.	E. coli (cfu)	Site No.	E. coli (cfu)	Site No.	E. coli (cfu)	Site No.	E. coli (cfu)
2	Passed	2	Passed	2	Passed	2	Passed
3	Passed	3	Passed	3	Passed	3	Passed
4	Passed	4	Passed	4	Passed	4	Passed
5	2419.6	5	920.8	5	3.0	5	30.5

Overflow Date: 4/25/2023
 End Date: 5/3/2023
 Cause: Line Failure
 Discharge: Approximately 2,952,000 (ongoing to May 3) discharge to Gulpha Creek
 Actions Taken: Environmental Cleanup, Hydro cleaned, Disinfected, Deodorized, Raked/picked up and Spread Lime

Lab Results

Sample Date:	4/25/2023
Site No.	E. coli (cfu)
1	228.2

Monthly Average for E. coli: 654.80 cfu/100ml
 Year to Date Average for E. coli: 604.28 cfu/100ml