



State of Utah

GARY R. HERBERT
Governor

SPENCER J. COX
Lieutenant Governor

Department of
Environmental Quality

L. Scott Baird
Executive Director

DIVISION OF WATER QUALITY
Erica Brown Gaddis, PhD
Director

VIA EMAIL
READ RECEIPT REQUESTED

May 4, 2020

Mr. John Byars, General Manager
SUFCo Mine
597 South SR 24
Salina, Utah 84654

Subject: **SUFCo Mine UPDES Permit No. UT0022918, Compliance Evaluation Inspection**

Dear Mr. Byars:

Attached are the results of the Compliance Evaluation Inspection conducted remotely by the Division of Water Quality for the SUFCo Mine on April 23, 2020. Since no deficiencies were observed, no response to this inspection report is required at this time.

Thanks to your staff for facilitating the remote inspection. If you have any questions or comments regarding this inspection report, please contact Jeff Studenka at (801) 536-4395 or via e-mail at jstudenka@utah.gov.

Sincerely,


Jeffrey Studenka (May 1, 2020)

Jeff Studenka, Environmental Scientist
UPDES Surface Water Section

JAS/cjh

Enclosures: Narrative Inspection report (DWQ-2020-010323)
UPDES Inspection Checklist (DWQ-2020-010571)

cc: Eric Larsen, Central Utah Public Health Department
John Chartier, DEQ District Engineer
Steve Christensen, DOGM

DWQ-2020-010325

INSPECTION PROTOCOL

UPDES Permit No: UT0022918 – Canyon Fuel Company, SUFCo Mine
Inspection Type: Compliance Evaluation Inspection (CEI) – Conducted Remotely
Inspection Date: April 23, 2020
Inspection Time: 9:55-10:30 am via conference call
(Followed up with emails and data reviews)

Jeff Studenka of the Division of Water Quality (DWQ) talked with Amanda Lewis and Vicky Miller from SUFCo Mine. The purpose and scope of the remote inspection were explained and the Utah DWQ UPDES Inspection Checklist was completed. Due to statewide travel restrictions, a site visit and facility tour was not conducted as part of this biennial compliance inspection. A follow up site visit may be conducted later this year, but is not being required at this time since DWQ has visited the SUFCo Mine regularly over time. There were no deficiencies noted, no compliance issues, and no significant changes with facility operations since the previous inspection (CEI performed June 28, 2018) requiring follow up during this CEI.

FACILITY DESCRIPTION

Location: Approximately 10 miles northeast of I-70, from exit 73 in Sevier County, Utah. The mine is up what is known as Convulsion Canyon. It has a Standard Industrial Classification (SIC) code 1222, for Underground Bituminous Coal Mining. The facility has three discharge points identified below from its UPDES permit.

Discharge Information:

Outfall 001 (mine water) latitude 38°54'54" N, longitude 111°24'54" W

Outfall 002 (sed. Ponds) latitude 38°54'32" N, longitude 111°24'57" W

Outfall 003 (mine water) latitude 38°57'26" N, longitude 111°23'06" W

Design flow for Outfall 003 is 5.5 MGD and for Outfall 002 is 0.5 MGD. Outfall 001 is from an old mine water discharge that has not discharged for many years and it is anticipated it will not discharge in the foreseeable future.

Receiving Waters: North Fork of Quitchupah Creek

Process: This is an active underground coal mining operation which produces approximately six million tons of coal per year using a long wall mining technology. Mine water discharge is first settled in underground areas and then pumped to a location where it is piped out of the mine on a continual basis to the North Fork of Quitchupah Creek (Outfall 003). Surface water runoff is conveyed to a series of two settling ponds before discharge to South Fork of the North Fork of Quitchupah Creek (Outfall 002). If Outfall 001 were to ever discharge again it would flow into the sedimentation ponds as well. SUFCo personnel indicated that the sedimentation ponds are scheduled for cleanout this spring.

INSPECTION SUMMARY

Permit: The current UPDES Permit was last re-issued effective February 1, 2018 and expires January 31, 2023.

Effluent & Flow Measurement: Effluent flow is measured at Outfall 003 using a straight edge weir, which is 2 feet and 11.5 inches in length, along with corresponding staff gauge and conversion chart. Effluent flow at Outfall 002 is measured by using a 1.0 HS flume and corresponding staff gauge and conversion chart supplied by Plasti-Fab. Both of these devices are primary devices with no secondary measurement instrumentation. As a result there is no need to complete calibration comparisons, as no secondary devices are utilized. No issues or concerns with the effluent discharges or receiving waters as reported by SUFCo since the previous CEI.

Monitoring and Record Keeping: The required discharge monitoring report (DMR) information was provided by SUFCo, along with the quarterly WET test reports, and were subsequently reviewed and evaluated by DWQ. DMR information was reviewed and compared to the laboratory reports received by SUFCo for the month of September 2019 as randomly selected by DWQ. SUFCo uses SGS North America, Inc. in Huntington, Utah for TSS, TDS, total iron and oil & grease analyses, along with using Chemtech-Ford in Sandy, Utah for completion of quarterly metals analyses. SUFCo uses TRE Environmental Strategies, LLC in Fort Collins, Colorado for its quarterly WET testing. There were no deficiencies noted, all holding times were met and all required sampling was conducted. SUFCO conducts pH, temperature and dissolved oxygen instantaneously on site with no issues as reported. SUFCo submits the required DMR information online each month thru NetDMR as appropriate.

Storm Water: A Storm Water Pollution Prevention Plan was verified on site and was recently updated in March 2020. As mentioned during the inspection, the storm water permit provisions will be separated out from the current UPDES Permit during the next renewal and as a result, separate UPDES Permit coverage for Industrial Storm Water will be required at that time going forward.

Site Photos: In the absence of a site visit during this CEI, photos from the previous CEI have been included for reference along with a few current photos provided by the facility. There have been no significant changes in facility structures or operations since the previous CEI.

DEFICIENCIES NOTED

None.

CORRECTIVE ACTIONS REQUIRED

None.

Photo Log (from 2018 CEI)



Photo 1: Facility entrance.



Photo 2: Outfall 002 & receiving waters.



Photo 3: Second Sedimentation Pond (002).



Photo 4: Inflow to second sedimentation pond.



Photo 5: Facility view from sedimentation pond.

PHOTOS provided by SUFCO (4-23-2020)



Photo 6: View of sedimentation ponds from above.



Photo 7: Close up view of first sed pond.



Photo 8: Second sed pond and Outfall 002.



UPDES Inspection Checklist

| General Information | | | |
|--|---|-------------------------|---------------------|
| UPDES Permit #: | UT0022918 | | |
| Facility Name: | SUFCO Mine | | |
| Inspection Type: | Compliance Evaluation | Weather Conditions: | Mostly sunny, ~50°F |
| Inspection Date: | 4/23/2020 | Start Time: | 9:55 am |
| Inspector(s): | J. Studenka conducted remote inspection activities via conference call & emails. | | |
| Permit Effective Date: | 2-1-2018 | Permit Expiration Date: | 1-31-2023 |
| PART I. VERIFICATION, RECORDKEEPING, AND REPORTING EVALUATION CHECKLIST | | | |
| A. PERMIT VERIFICATION | | | |
| Responsible Official: | John Byars, Mine General Manager | | |
| Mailing Address: | 597 South SR 24 Salina, UT 84654 | | |
| Brief Facility Description: | Active coal mining operations, with mine water continuously pumped out through Outfall 003. Two Sedimentation ponds in series collect storm water runoff from the Production areas and discharge via Outfall 002. | | |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 1. Inspection observations verify information contained in permit. | | |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 2. Current copy of permit on site. | | |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 3. Name, mailing address, contact, and phone number of permittee correct. | | |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 4. Facility is as described in permit. If not, what is different? _____ _____ | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 5. Notification was given to EPA/State of any new, different, or increased discharge. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 6. Facility maintains accurate records of influent volume, when appropriate. | | |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 7. Number and location of discharge points are as described in permit. | | |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 8. Name of receiving water(s) is/are correct. Name: <u>North Fork Quitcupah Creek</u> | | |

UPDES Inspection Checklist

PART I. VERIFICATION, RECORDKEEPING, AND REPORTING EVALUATION CHECKLIST *CONTINUED*

A. PERMIT VERIFICATION *CONTINUED*

- Yes No N/A 9. All discharges are permitted.
- Yes No N/A 10. The facility used Federal/State Construction Grant funds to build the plant.

Comments:

No changes or compliance issues since last inspection in 2018.

Industrial facility, non-POTW

B. RECORDKEEPING AND REPORTING EVALUATION

- Yes No N/A 1. Records and reports maintained as required by permit.
- Yes No N/A 2. All required information is available, complete and current.
- Yes No N/A 3. Information is maintained for a minimum of 3 years (5 years for sewage sludge).
- Yes No N/A 4. If the facility monitors more frequently than required by permit (using approved methods), these results are reported.
- Yes No N/A 5. DMR's submitted via NetDMR as required by the permit.
- Yes No N/A 6. Monitoring records are adequate and include:
- Yes No N/A a. Flow, pH, DO, etc. as required by permit.
 - Yes No N/A b. Monitoring charts kept for 3 years (or 5 years for sewage sludge).
 - Yes No N/A c. Flow meter calibration records kept.
 - Yes No N/A d. Location data (latitude and longitude) of each outfall.
- Yes No N/A 7. Laboratory equipment calibration and maintenance records are adequate.
- Yes No N/A 8. *Plant records are adequate and include:
- Yes No N/A a. O & M Manuals
 - Yes No N/A b. "As built" Engineering Drawings
 - Yes No N/A c. Schedules and dates of equipment maintenance repairs
 - Yes No N/A d. Equipment supplies manual
 - Yes No N/A e. Equipment data cards?
**Required only for facilities built with Federal/State Construction Grant funds.*
- Yes No N/A 9. Pretreatment records adequate & contain inventory of industrial waste contributors including: *(Optional if separate Pretreatment inspections are conducted by DWQ)*
- Yes No N/A a. Monitoring data
 - Yes No N/A b. Inspection reports
 - Yes No N/A c. Compliance status records
 - Yes No N/A d. Enforcement actions

UPDES Inspection Checklist

PART I. VERIFICATION, RECORDKEEPING, AND REPORTING EVALUATION CHECKLIST *CONTINUED*

D. WHOLE EFFLUENT TOXICITY TESTING (WET) AND REPORTING

- | | |
|--|--|
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 1. WET sampling by permittee adequate to meet the conditions of the permit. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 2. Chain of Custody used. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 3. Method of shipment: <div style="text-align: center;">Overnight delivery service</div> <hr/> |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 4. Preservation adequate (iced to ~4-6°C) |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 5. Lab reports/Chain of Custody sheets indicate temperature of samples at time of receipt by lab. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 6. Indicate Temperature and sample received Date: <div style="text-align: center;">2.1°C, 3.3°C, & 4.6°C from October 2019 Samples</div> <hr/> |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 7. Permittee has copy of latest edition of testing methods or EPA Region 8 protocol. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 8. Permittee reviews WET lab reports for adherence to test protocols. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 9. Lab had provided quality control data. (<i>i.e.</i> Reference toxicant control charts) |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 10. Permittee has asked lab for Q/C data (if not included with report). |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 11. Permittee maintains copies of WET lab reports on site for the required 3 year period and makes them available to review by inspectors. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 12. Evaluation and review of WET data by permittee adequate such that no follow up at lab is necessary. |

Notes:

TRE lab utilized for WET testing

PART II. FACILITY SITE REVIEW CHECKLIST

A. OPERATION AND MAINTENANCE EVALUATION

- | | |
|--|---|
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 1. Facility properly operates and maintains all treatment units in use. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 2. Facility has standby power or other equivalent provisions. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 3. Adequate alarm system for power or equipment failures is available. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 4. Sludge disposal procedures are appropriate: a. Disposal of sludge evaluated separately by DWQ |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | b. State approval for sludge disposal received |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 5. All treatment units, other than backup units, are in service. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 6. Facility follows procedures for facility operation and maintenance. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 7. Sufficient sludge is disposed of to maintain treatment process equilibrium. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 8. Organization Plan (chart) for operations and maintenance. |

UPDES Inspection Checklist

PART II. FACILITY SITE REVIEW CHECKLIST *continued*

A. OPERATION AND MAINTENANCE EVALUATION *continued*

- Yes No N/A 9. Plan establishes operating schedules.
- Yes No N/A 10. Facility has written emergency plan for treatment control.
- Yes No N/A 11. Maintenance record system exists and includes:
- Yes No N/A a. As-built drawings
 - Yes No N/A b. Shop drawings
 - Yes No N/A c. Construction specifications
 - Yes No N/A d. Maintenance history
 - Yes No N/A e. Maintenance costs
 - Yes No N/A f. Report history
 - Yes No N/A g. Records of equipment repair and timely return to service.
- Yes No N/A 12. Adequate number of qualified operators on-hand (*include # for each grade below*).
- Treatment**
- Grade I _____ Grade II _____ Grade III _____ Grade IV _____
- Collections**
- Grade I _____ Grade II _____ Grade III _____ Grade IV _____
- Yes No N/A 13. Facility has established procedures for training new operators.
- Yes No N/A 14. Facility maintains adequate spare parts and supplies inventory.
- Yes No N/A A 15. Facility keeps instruction files for operation and maintenance of each item of major equipment.
- Yes No N/A 16. Operation and maintenance manual is available.
- Yes No N/A 17. Regulatory agency is notified of any bypassing.
- Yes No N/A 18. Was there a bypass, overflow or basement flooding by untreated wastewater in the system due to storm events? If so, how many days in the past year?
- (Dates) _____ None, N/A _____
- Yes No N/A 19. Overflow and Bypasses:
- Yes No N/A a. Hydraulic overflows and/or organic overloads are experienced.
 - Yes No N/A b. Untreated bypass discharge occurs during power failure.
 - Yes No N/A c. Untreated overflows occurred since last inspection.
- Reason: _____
- Yes No N/A d. Flows were observed in overflow or bypass channels.
 - Yes No N/A e. Checking for overflows is performed routinely.

UPDES Inspection Checklist

PART II. FACILITY SITE REVIEW CHECKLIST *continued*

A. OPERATION AND MAINTENANCE EVALUATION *continued*

- Yes No N/A f. Any and all Overflows are reported to the appropriate State personal as specified in the permit.
- Yes No N/A 20. Will you or have you completed the annual Municipal Wastewater Planning Program (MWPP) for the calendar year?
Calendar year: _____
- Yes No N/A 21. Are there any new major developments (industrial, commercial, or residential) planned in the next 2-3 years such that flow in the system could significantly increase (10-20%) or >25,000 gal/day?
- Yes No N/A 22. Do you have a state approved pretreatment program?
(If no ask additional questions, if yes go to question 23)
- a. What industries currently discharge to your system?

- b. Does any industry currently discharge >25,000 gpd?
- c. Does any industry have the ability to upset your system?
- d. Does any industry contribute more than 5% of your BOD/TSS load?
- e. Does any industry pre-treat their wastewater?
23. Describe the physical condition of the sewer collection system: (lift stations, pipe condition, etc.)
 N/A

24. What sewage system improvements does the community have under consideration for the next 10 years?
 N/A

25. Explain what problems, other than plugging you have experienced during the last year.
 N/A

UPDES Inspection Checklist

PART II. FACILITY SITE REVIEW CHECKLIST *continued*

A. OPERATION AND MAINTENANCE EVALUATION *continued*

Yes No N/A

26. Is your community presently involved in formal planning for sewer system expansion/upgrading? If yes, explain.

N/A

27. How many times in the last year was there sewage in basements at any point in the collection system for any reason, except plugging of the lateral connections?

N/A

28. Do you have other communities connected to your system/facility? If so list.

N/A

Yes No N/A

29. Do you have an approved storm water prevention plan? (SWPPP)

30. When was it last updated?

March 2020

Notes:

Industrial facility, non-POTW

PART II. FACILITY SITE REVIEW CHECKLIST *CONTINUED*

B. SAFETY EVALUATION

Yes No N/A

1. Facility uses dike/bermed oil/chemical storage tanks.

Yes No N/A

2. Facility maintains up-to-date equipment repair records.

Yes No N/A

3. Dated tags show out-of-service equipment.

Yes No N/A

a. Facility/unit lock-out and tag-out procedures are being followed.

Yes No N/A

4. Facility schedules/performs routine and preventive maintenance.

UPDES Inspection Checklist

PART III. FLOW MEASUREMENT INSPECTION CHECKLIST *continued*

B. FLUMES

- | | |
|---|--|
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 5. Side walls of flume appear vertical and smooth. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 6. Sides of flume throat appear vertical and parallel. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 7. Flume head being measured at proper location. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 8. Measurement of flume head zeroed to flume crest. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 9. Flume properly sized to measure range of existing flow. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 10. Flume operating under free-flow conditions over existing range of flows. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 11. Flume submerged under certain flow conditions. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 12. Flume operation invariably free-flow. |

PART III. FLOW MEASUREMENT INSPECTION CHECKLIST *continued*

C. WEIRS - N/A- Not evaluated on site but no changes since last inspection.

- | | | | |
|---|---|-------------------------|-------------------|
| Type and Size Influent: | N/A | Type and Size Effluent: | ~3' straight edge |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 1. Weir appears to be level. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 2. Weir plate plumb and its top and edges appear sharp and clean. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 3. Downstream edge of weir is chamfered at 45°. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 4. Free access for air below the nappe of the weir. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 5. Upstream channel of weir straight for at least four times the depth of water level and free from disturbances. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 6. Distance from sides of weir to side of channel at least 2H. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 7. Area of approach channel at least (8 x nappe area) for upstream distance of 15H. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 8. If not, is velocity of approach too high? | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 9. Head measurements properly made by facility personnel. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 10. Leakage does not occur around weir. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 11. Use of proper flow tables by facility personnel. | | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 12. The stilling basin of the weir is of sufficient size and clear of debris. | | |

Notes: Industrial facility, non-POTW. Primary flow measuring devices only, no secondary devices.

UPDES Inspection Checklist

PART III. FLOW MEASUREMENT INSPECTION CHECKLIST *continued*

D. ELECTROMAGNETIC METERS – N/A

| | |
|--|---|
| Type and Size Influent: _____ <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | Type and Size Effluent: _____ 1. Is there a straight length of pipe or channel before and after the flowmeter of at least 6 diameters? 2. If a magnetic flowmeter is used, are there sources of electric noise in the near vicinity? 3. Magnetic flowmeter is properly grounded. 4. Is the full pipe requirement met? |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | |

PART III. FLOW MEASUREMENT INSPECTION CHECKLIST *continued*

E. VENTURI METERS – N/A

| | |
|--|--|
| Type and Size Influent: _____ <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | Type and Size Effluent: _____ 1. Venturi meter is installed downstream from a straight and uniform section of pipe. |
|--|--|

PART III. FLOW MEASUREMENT INSPECTION CHECKLIST *continued*

F. OTHER TYPES OF FLOW DEVICES – N/A

Type: Float Bubbler Ultrasonic Electrical meters

Location: Influent Effluent

Manufacturer: _____

Model: _____

What are the most common problems that the operator has had with the flowmeter?

Type: Float Bubbler Ultrasonic Electrical meters

Location: Influent Effluent

Manufacturer: _____

Model: _____

What are the most common problems that the operator has had with the flowmeter?

Notes: Industrial facility, non-POTW. Primary flow measuring devices only, no secondary devices.

UPDES Inspection Checklist

PART III. FLOW MEASUREMENT INSPECTION CHECKLIST *continued*

G. CALIBRATION AND MAINTENANCE OF TOTALIZERS AND SECONDARY FLOW MEASUREMENT DEVICES-N/A

- | | |
|--|---|
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 1. Flow totalizer properly calibrated. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 2. Flow secondary measurement equipment adequate to handle expected ranges of flow rates. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 3. Frequency of routine inspection by proper operator: _____ Day/Week/Month/Year |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 4. Frequency of maintenance inspection by plant personnel: _____ Day/Week/Month/Year |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 5. Flowmeter calibration records kept _____ Year |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 6. Calibration frequency adequate. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 7. What is the most common problem(s) that the facility has had with the secondary flow measurement device? _____ _____ |

Accuracy of Flow Measurement
(Secondary Device against Primary Device)

Size and Type of Primary Device: _____

Reading from Primary Device (Feet/inches): _____

Equivalent to Actual Flow (MGD): _____

Facility recorded flow from Secondary Device: _____

Percent Error: _____ Correction Error: _____

Fill in the above only if the primary device has been correctly installed, or if the correction factor is known.

Notes: **N/A-Primary flow measuring devices only, no secondary devices.**

UPDES Inspection Checklist

PART IV. LABORATORY QUALITY ASSURANCE CHECKLIST

A. LABORATORY INFORMATION

Yes No N/A

1. Commercial laboratory used:

Name: SGS Labs

Address: On File

Huntington, UT

Contact: On File

Phone Number: On File

Parameters: *Check all that apply*

- | | |
|--|--|
| <input type="checkbox"/> BOD | <input type="checkbox"/> Total Phosphorus |
| <input type="checkbox"/> CBOD | <input type="checkbox"/> Orthophosphate |
| <input checked="" type="checkbox"/> TSS | <input type="checkbox"/> Total Kjeldahl Nitrogen |
| <input checked="" type="checkbox"/> TDS | <input type="checkbox"/> Nitrate, NO3 |
| <input type="checkbox"/> Ammonia | <input type="checkbox"/> Nitrite, NO2 |
| <input checked="" type="checkbox"/> Oil & Grease | <input checked="" type="checkbox"/> Metals |
| <input type="checkbox"/> E.coli | <input type="checkbox"/> TTO |

PART IV. LABORATORY QUALITY ASSURANCE CHECKLIST

B. SAMPLE HANDLING PROCEDURES – N/A – Off site certified lab not evaluated

Yes No N/A

1. Laboratory has sample custodian and a back-up custodian.

Yes No N/A

2. Access to laboratory area restricted to authorized personnel only.

Yes No N/A

3. Sample security area available within laboratory that is dry, clean, and isolated; has sufficient refrigerated space; and can be locked securely.

Yes No N/A

4. Lab personnel receive and log in all incoming samples.

Yes No N/A

5. Established chain-of-custody procedures followed.

Yes No N/A

6. Samples properly stored by lab personnel.

Notes: Industrial facility, non-POTW.

UPDES Inspection Checklist

PART IV. LABORATORY QUALITY ASSURANCE CHECKLIST

C. LABORATORY PROCEDURES- N/A – Off site NELAC lab not evaluated

- | | |
|--|---|
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 1. Written laboratory QA manual available. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 2. EPA-approved written analytical testing procedures used and protocols are easily accessible by laboratory personnel. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 3. Calibration and maintenance of instruments and equipment satisfactory. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 4. Samples are analyzed in accordance to 40 CFR 136. |
| <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A | 5. Are DMR/QA tests required? If so, Results of last DMR/QA test available: Date: _____ N/A _____ |
| <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A | 6. Facility lab does analyses for other permittees? If yes, list the facilities and permit numbers. Facility: _____ Permit Number: _____ |

PART IV. LABORATORY QUALITY ASSURANCE CHECKLIST

D. LABORATORY FACILITIES AND EQUIPMENT – N/A - Off site certified lab not evaluated

- | | |
|---|--|
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 1. Proper grade laboratory pure water available for specific analysis. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 2. Adequate bench, instrumentation, storage, and recordkeeping space available. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 3. Clean and orderly work area available to help avoid contamination. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 4. Instruments/equipment in good condition. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 5. Use proper safety equipment when necessary. <i>Check all that apply.</i> <input type="checkbox"/> Lab coats <input type="checkbox"/> Goggles <input type="checkbox"/> Gloves <input type="checkbox"/> Fume hoods <input type="checkbox"/> Safety glasses |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 6. Proper volumetric glassware used. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 7. Glassware properly cleaned. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 8. Discard standards after recommended shelf-life has expired. |

Notes:

UPDES Inspection Checklist

PART IV. LABORATORY QUALITY ASSURANCE CHECKLIST– N/A - Off site certified lab not evaluated

E. LABORATORY'S PRECISION, ACCURACY, AND CONTROL PROCEDURES

- | | |
|---|---|
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 1. Analyzed multiple replicates (blanks, duplicates, spikes, and splits) for each type of control check and information recorded. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 2. Plotted precision and accuracy control methods used to determine whether valid, questionable, or invalid data are being generated from day to day. |

F. DATA HANDLING AND REPORTING

- | | |
|---|--|
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 1. Uniformly apply round-off rules. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 2. Establish significant figures for each analysis. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 3. Report forms developed to provide complete data documentation and permanent records and to facilitate data processing. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 4. Data reported in proper form and units. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 5. Laboratory records readily available to regulatory agency for required time of 3 years. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 6. Laboratory notebook or pre-printed data forms bound permanently or online electronic record keeping practices utilized to provide good documentation. |

G. LABORATORY PERSONNEL

- | | |
|---|--|
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 1. Enough analysts present to perform the analyses necessary. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 2. Analysts have on hand the necessary references for EPA procedures being used. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 3. Analysts trained in procedures performed through formal or informal training or certification programs. |

Notes: Off site certified lab not evaluated.

UPDES Inspection Checklist

PART V. WHOLE EFFLUENT TOXICITY (WET)

Yes No N/A

1. Whole Effluent Toxicity (WET) testing is required by the permit.

2. Which species are required by permit used? *Indicate below*

Daphnia magna

Ceriodaphnia dubia

Pimephales promelas (Fathead minnow)

Other

List: _____

Yes No N/A

3. Has approval for alternating species been granted?

4. Test Type:

Acute Frequency _____

Chronic Frequency _____

Quarterly _____

5. Dilution water source:

Lab _____

Yes No N/A

a. Dilution water meets EPA requirements

Yes No N/A

b. If reconstituted, is water same hardness as receiving water(s)?

Yes No N/A

6. Any modification authorization?

CO2 Headspace

Chronic Sampling Frequency

Dechlorination

Zeolite resin (ammonia removal)

Yes No N/A

7. Results indicate an absence of toxicity? If not indicate dates of failures and species:

Dates

Species

Yes No N/A

8. Evidence of accelerated testing if toxicity present?

Yes No N/A

9. TIE/TRE in progress?

Yes No N/A

10. Whole Effluent Toxicity (WET) testing is conducted by the onsite laboratory.

Yes No N/A

11. Commercial laboratory used for WET

Name: TRE Labs

Address: On File

Ft. Collins, CO

Contact: Dr. Rami Naddy, PhD

Phone: On File

UPDES Inspection Checklist

PART V. WHOLE EFFLUENT TOXICITY (WET) *continued*

- | | |
|--|---|
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 12. WET testing protocols are clearly described. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 13. WET culturing procedures are adequately documented for each organism tested. |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 14. Report format meets EPA requirements? (<i>See Weber et. Al. 1998, 1989</i>) |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 15. Does lab report indicate which statistical method was used for chronic tests? |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 16. Does permittee submit complete WET lab report to EPA/State? |
| <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A | 17. Is the Lab State Certified? |
| | Certification Date _____ Annually thru Utah BLI Program |

PART VI. COMPLIANCE SCHEDULE STATUS REVIEW (*if applicable*) N/A

- | | |
|--|---|
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 1. The Permittee is meeting the terms of the compliance schedule. |
| <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A | 2. Is the facility subject to a compliance schedule in its permit or by an Order? If the facility is subject to an Order, note Docket Number _____ |
| | 3. What Milestone(s) remain in the schedule? _____ _____ |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 4. Facility in compliance with unachieved milestones? |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 5. Facility has missed milestone dates. |
| <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A | 6. Facility will still meet final compliance date. |

UPDES Inspection Checklist

GUIDE – VISUAL OBSERVATION – UNIT PROCESS

Rating Codes: S = Satisfactory U = Unsatisfactory M = Marginal
 IN = In Operation Out = Out of Operation N/A = Not Applicable

| Condition or Appearance | | Rating | Comments |
|-------------------------|---------------------------------|--------|---|
| GENERAL | Grounds | N/A | Remote inspection activities only, no site visit this time. Relied on past inspections and facility photos. |
| | Buildings | | |
| | Potable water supply protection | | |
| | Safety features | | |
| | By-passes | | |
| PRELIMINARY | Maintenance of collection lines | | |
| | Pump stations | | |
| | Ventilation | | |
| | Bar screen(s) | | |
| | Comminutor | | |
| | Grit chamber | | |
| | Disposal of screenings and grit | | |
| PRIMARY | Settling tanks | | |
| | Scum removal | | |
| | Sludge removal | | |
| | Effluent | | |
| SLUDGE | Digesters | | |
| | Sludge pumps | | |
| | Drying beds | | |
| | Disposal of sludge | | |
| OTHER | Flow meter and recorder | | |
| | Records | S | Requested records reviewed remotely. |
| | Lab controls | | |
| | Treatment lagoons | | |
| | Chlorinators | | |
| | Contact tank and contact time | | |

UPDES Inspection Checklist

NOTATIONS BY EVALUATOR

Check each of the following items in terms of their estimated adverse effect on the performance of the plant

| Item | Major | Minor | None | Item | Major | Minor | None |
|-----------------------|-------|-------|------|-------------------------|-------|-------|------|
| Staff complement | | | X | Overloads | | | NA |
| Personnel training | | | X | Hydraulic | | | NA |
| Operating budget | | | X | Periodic | | | |
| Laboratory control | | | X | Continuous | | | |
| Instrumentation | | | X | Organic | | | NA |
| Industrial waste | | | X | Periodic | | | |
| Equipment failure | | | X | Continuous | | | |
| Treatment process | | | X | Overload causes | | | NA |
| Sludge handling | | | NA | Infiltration | | | |
| Equipment maintenance | | | NA | Combined sewers | | | |
| Spare parts inventory | | | NA | Rapid population growth | | | |
| Power failure | | | X | Increased service area | | | |
| Other | | | | Other | | | |

Describe briefly the major problems indicated above or other pertinent information:

No problems identified. Facility has had a good compliance record for many years with good operations staff.
