

Region 6 - Enforcement & Compliance Assurance Division
INSPECTION REPORT

Inspection Date(s):	11/07/2019	
Media Program:	Water, Clean Water Act, National Pollution Discharge Elimination System	
Regulatory Program(s)	Oil and Gas, Produced Water	
Company Name:	LBOC, LLC	
Facility Name:	Barton-Proetz	
Facility Physical Location:	33.312938N, -92.499848W	
(city, state, zip code)	El Dorado, Arkansas 71730	
Mailing address:	787 All Gulf Road	
(city, state, zip code)	Norphlet, Arkansas 71759	
County/Parish:	Union	
Facility Phone Number	870-546-3457	870-546-0577
Facility Contact:	Charles Long	N/A
	N/A	
FRS Number:	N/A	
Identification/Permit Number:	ARU001273	
Media Identifier Number:	N/A	
NAICS:	211111	
SIC:	1311	
Personnel participating in inspection:		
Kent W. Sanborn	U.S. EPA, Region 6, ECDWE	918-557-1615
EPA Lead Inspector Signature/Date		
	Kent W. Sanborn	Date
Supervisor Signature/Date		6 DEC 2019
	Guy Tidmore	Date

Section I – INTRODUCTION

PURPOSE OF THE INSPECTION

EPA Region 6 inspector Kent W. Sanborn arrived at the LBOC, LLC Barton-Proetz tank battery near Calion, Arkansas at about 10:00 am on November 7, 2019 for an unannounced inspection. There were no company representatives at the site. The inspection was conducted to determine the facility's compliance with the Clean Water Act (CWA). The scope of the inspection was to determine if the facility was in compliance with the CWA, and to identify and document unauthorized discharges of produced wastewater (brine) to a water of the United States. The inspection was a follow-up to previous inspections that documented unauthorized discharges of produced water at the facility.

FACILITY DESCRIPTION

The discharge of produced water, or brine originated from the facility associated with the Barton-Proetz tank battery, where brine was stored. The discharge of produced water had reached a small lake or bayou that flowed into Lewter Creek. Lewter Creek flows into the Ouachita River. I observed that the secondary containment pit at the tank battery either overflowed or a valve was opened to allow brine and some oil to be discharged. The brine storage tank was leaking to the pit during the inspection.

Section II - OBSERVATIONS

I initially arrived at the LBOC, LLC, Barton-Proetz lease at about 10:00 am on November 7, 2019. Photos 1 and 2 show the location and source of the discharge of produced water, or brine. The tank battery pit had a large amount of oil and brine during the inspection in it (Photo 3). I observed recent dirt work around the tank battery that showed the containment had been repaired recently. The drain valve at the battery was shown in Photo 4. I observed that oil and brine ran from the battery via the valve or an overflow line towards an area with two pits shown in Photo 5. The left pit was shown in Photo 6. That pit was full of fluids. I observed that most of the current discharge fluids went into the pit on the right side (Photo 7). Oil staining was present along the flow path to the right sided pit. With a calibrated YSI Pro 30 conductivity meter, I took Total Dissolved Solids (TDS) readings at the pit shown in Photo 8 and it measured 18,975 milligrams per liter (mg/L). Another view of the right-sided pit was shown in Photo 9. The lake or bayou was clearly seen in the background of the photo several yards west. The pit had a trench located on the northwest side (Photo 10) that lead the flow to a smaller pool, which was closer to the lake. I observed oil staining in the trench leading to the smaller pool. Photo 11 showed the shallow pool close to the lake and the TDS in that pool measured 4,862 mg/L (Photo 12). The pool had an exit or cut that was shown in Photo 13. That exit became a shallow trench that lead to the lake or bayou (Photos 14 and 15). The discharge or produced water entered the lake as shown in Photo 16. TDS at the entry point measured 2,253 mg/L (Photo 17). The lake/bayou eventually drained into Lewter Creek (Photos 18 and 19). I observed that Lewter Creek flowed into the Ouachita River a short distance away from the point of entry.

Section III – AREAS OF CONCERN

There were elevated levels of TDS observed at the facility, along the flow path of brine from the facility and in Lewter Creek. I observed consistent evidence that multiple discharges of brine and oily fluids had been released to the pits away from the secondary containment area. Both pits overflow and fluids, including brine, flow to the small lake associated with Lewter Creek, and there is no indication that either pit is kept dry or empty of fluids. The tank battery had leaking tanks and fluids in it during the inspection as well.

Section IV – FOLLOW UP

A follow up inspection will be conducted as needed. This facility will be referred to EPA water enforcement.

Section V – LIST OF APPENDICES

Appendix 1 – Photo Log – 19 photos taken 11/7/2019.

Appendix 1

Photographic Log (19 photos)



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 1

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 1 (DSC_0059)

Orientation: West

Date of Photo: 11/7/2019

Time of Photo: 11:16 am

Latitude: 33.312967N

Longitude: -92.499987W

Photographer: K.W. Sanborn

Description: I observed that produced water, or brine was discharged from this lease and tank battery.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 2

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 2 (DSC_0058)

Orientation: West

Date of Photo: 11/7/2019

Time of Photo: 11:16 am

Latitude: 33.312967N

Longitude: -92.499987W

Photographer: K.W. Sanborn

Description: The tank battery where the discharge occurred had recent dirt work to improve the secondary containment.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 3

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 3 (DSC_0060)

Orientation: Northwest

Date of Photo: 11/7/2019

Time of Photo: 11:16 am

Latitude: 33.312967N

Longitude: -92.499987W

Photographer: K.W. Sanborn

Description: The secondary containment pit was full of oil and brine during the inspection. I observed that the brine storage tanks at the tank battery leaked into the pit during the inspection.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 4

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 4 (DSC_0063)

Orientation: Northwest

Date of Photo: 11/7/2019

Time of Photo: 11:17 am

Latitude: 33.312967N

Longitude: -92.499987W

Photographer: K.W. Sanborn

Description: It was unclear whether the pit overflowed or was drained out of the valve, seen here, to discharge the fluids, including brine and oil, from the secondary containment area. There was significant amounts of oil staining observed outside of the secondary containment area at the valve during the inspection.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 5

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 5 (DSC_0061)

Orientation: Southwest

Date of Photo: 11/7/2019

Time of Photo: 11:17 am

Latitude: 33.312967N

Longitude: -92.499987W

Photographer: K.W. Sanborn

Description: The brine and oil discharge was directed at two pit areas not a part of the secondary containment area of the pit. The one on the left shown here was nearly full and most of the fluid entered the pond/pit to the right, further along the flow path towards Lewter Creek.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 6

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 6 (DSC_0062)

Orientation: Southwest

Date of Photo: 11/7/2019

Time of Photo: 11:17 am

Latitude: 33.312967N

Longitude: -92.499987W

Photographer: K.W. Sanborn

Description: The left pit shown here was full of brine, rainwater, and some oil on top. I observed it did not have a flow path/exit, during the inspection.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 7

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 7 (DSC_0064)

Orientation: Southwest

Date of Photo: 11/7/2019

Time of Photo: 11:17 am

Latitude: 33.312967N

Longitude: -92.499987W

Photographer: K.W. Sanborn

Description: The entrance to the pond or pit on the right was shown here. I observed oil residue remains in the neck of the pit from the recent discharge.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 8

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 8 (DSC_0065)

Orientation: South

Date of Photo: 11/7/2019

Time of Photo: 11:18 am

Latitude: 33.312942N

Longitude: -92.500152W

Photographer: K.W. Sanborn

Description: With a calibrated YSI Pro 30 Conductivity Meter, I took a Total Dissolved Solids (TDS) reading of the right side pit/pond and it measured 18,975 milligrams per liter (mg/L).



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 9

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 9 (DSC_0066)

Orientation: West

Date of Photo: 11/7/2019

Time of Photo: 11:18 am

Latitude: 33.312942N

Longitude: -92.500152W

Photographer: K.W. Sanborn

Description: This was a view from the right sided pit. This pit drained to the small lake or bayou seen in the background.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 10

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 10 (DSC_0067)

Orientation: West

Date of Photo: 11/7/2019

Time of Photo: 11:18 am

Latitude: 33.312942N

Longitude: -92.500152W

Photographer: K.W. Sanborn

Description: The right-side pit shown here and in Photo 9 flowed out via the small narrow trench seen on the right side of this photo toward the small lake in the background. I observed oil staining throughout the flow path.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 11

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 11 (DSC_0068)

Orientation: Southwest

Date of Photo: 11/7/2019

Time of Photo: 11:19 am

Latitude: 33.313006N

Longitude: -92.500364W

Photographer: K.W. Sanborn

Description: The trench in Photo 10 emptied into this shallow pool prior to entering the lake or bayou.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 12

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 12 (DSC_0069)

Orientation: Southwest

Date of Photo: 11/7/2019

Time of Photo: 11:20 am

Latitude: 33.313006N

Longitude: -92.500364W

Photographer: K.W. Sanborn

Description: The TDS of the small pool shown in Photo 11 measured 4,862 mg/L.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 13

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 13 (DSC_0071)

Orientation: South

Date of Photo: 11/7/2019

Time of Photo: 11:20 am

Latitude: 33.313094N

Longitude: -92.500364W

Photographer: K.W. Sanborn

Description: The shallow pool flowed to the right as shown here toward the small lake.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 14

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 14 (DSC_0070)

Orientation: Southwest

Date of Photo: 11/7/2019

Time of Photo: 11:20 am

Latitude: 33.313094N

Longitude: -92.500677W

Photographer: K.W. Sanborn

Description: The exit from the small pool entered the lake or bayou here.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 15

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 15 (DSC_0075)

Orientation: East

Date of Photo: 11/7/2019

Time of Photo: 11:22 am

Latitude: 33.313094N

Longitude: -92.500677W

Photographer: K.W. Sanborn

Description: This was a reverse angle view from the lake showing the trench from the shallow pool to the small lake or bayou.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 16

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 16 (DSC_0073)

Orientation: Northwest

Date of Photo: 11/7/2019

Time of Photo: 11:21 am

Latitude: 33.313094N

Longitude: -92.500677W

Photographer: K.W. Sanborn

Description: I observed the point of entry of brine fluids into to the small lake or bayou here.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 17

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 17 (DSC_0076)

Orientation: West

Date of Photo: 11/7/2019

Time of Photo: 11:22 am

Latitude: 33.313094N

Longitude: -92.500677W

Photographer: K.W. Sanborn

Description: the TDS at the point of entry to the lake was 2,253 mg/L. The TDS measurement was not taken at the deepest part of the lake due to the size of the lake. Brine is more dense than freshwater and sinks, therefore the TDS at the point of entry was measured during the inspection from a shallower portion of the small lake or bayou.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 18

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo File Name: Photo 18 (211.jpg)

Orientation: West

Date of Photo: 11/7/2019

Time of Photo: 10.25 am

Latitude: 33.3113N

Longitude: -92.4999W

Photographer: K.W. Sanborn

Description: This was a view of the small lake or bayou where it flowed to Lewter Creek.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

Photograph Log

Photo No. 19

33.312938N, -92.499848W		
City: El Dorado	County: Union	State: Arkansas



Photo file Name: Photo 19 (212.jpeg)

Orientation: East

Date of Photo: 11/7/2019

Time of Photo: 10:25 am

Latitude: 33.3113N

Longitude: -92.4999W

Photographer: K.W. Sanborn

Description: This was a reverse angle view of Photo 18. I observed fluids, including water entering Lewter Creek from the small lake or bayou.