



April 13, 2022

Project No. 19119232

**Ms. Maureen Hatfield**

Texas Commission on Environmental Quality  
MC-127  
VCP-CA Section, Team 1, Remediation Division  
P.O. Box 13087  
Austin, Texas 78711-3087

**Re: MONTHLY STATUS UPDATE – ENGLEWOOD INTERMODAL YARD – NAPL COLLECTION  
SYSTEM/CONCRETE CAP REPAIRS  
UNION PACIFIC RAILROAD HOUSTON WOOD PRESERVING WORKS FACILITY  
4910 LIBERTY ROAD FACILITY, HOUSTON, TEXAS  
POST-CLOSURE CARE PERMIT NO. HW-50343; INDUSTRIAL SWR NO. 31547**

Dear Ms. Hatfield:

Golder Associates USA Inc. (Golder), a member of WSP, on behalf of Union Pacific Railroad Company (UPRR), is pleased to provide this monthly status update for March 2022 for inspections conducted at the Englewood Intermodal Yard concrete cap area within the UPRR Houston Wood Preserving Works Facility (the Site). Monthly status updates were requested by the Texas Commission on Environmental Quality (TCEQ) in a letter dated March 20, 2018.

A non-aqueous phase liquid (NAPL) Collection System was installed in the Englewood Intermodal Yard in January 2019 to address the tar-like substance seeps within parking stalls B100 to B109 (for container trailers). The following is a summary of the observations from the weekly inspections of the NAPL Collection System and Englewood Intermodal Yard concrete pavement near the collection system for March 2022 (photographs from the weekly inspections are provided in Attachment A):

- During the March 9, 2022 inspection, the water levels in NAPL Collection System Sump 1 (B099/B100 stalls), Sump 2 (B103/B104 stalls), and Sump 3 (B107/B108 stalls) were at 4.5 inches, 7 inches, and 6 inches below the top of the sumps, respectively. UPRR remediation contractor OMI Environmental Solutions conducted a pump down of the sumps on March 16, 2022 (Photos No. 21 through 23). Approximately 10,000 gallons total was removed from the sumps for disposal at Delta Water Processing. The final waste manifests are provided in Attachment B. Immediately following the pump down, water levels in Sumps 1, 2, and 3 were 48 inches, 36 inches, and 45 inches below the top of the sumps, respectively. By the March 23, 2022 inspection levels in Sumps 1, 2, and 3 increased to 6 inches, 29 inches, and 28 inches below the top of the sumps, respectively, and remained there through the March 30, 2022 inspection. Weekly water levels for the sumps are provided on Table 1. The water in the sumps was observed as being brown in color. No sheens or odors were reported during the March inspections. Photos of the sumps during the weekly inspections are provided in Attachment A.

- The NAPL Collection System sumps (Sumps 1, 2, and 3) have continued to be checked weekly for DNAPL using an interface probe. No measurable NAPL has been detected in the sumps using the interface probe through March 2022. Even though no measurable DNAPL was noted, a dipper tool has continued to be used to further evaluate the presence of and recover DNAPL, if present, from the bottom of each of the sumps during the weekly inspections. No DNAPL was observed or encountered using the dipper tool during the weekly inspections in March. Approximately 0.45 gallons of tar-like material was recovered from Sump 3 during the pump down event on March 16, 2022 (Photo No. 24). A notation on the presence of NAPL in each sump, tabulation of depth and thickness of NAPL if detected, and a tabulation of total mass of NAPL recovered from each sump is provided on the enclosed Table 1.
- On March 13, 2022, a small amount of tar-like material was observed on the concrete surface in Stall B105 near the NAPL Collection System. For areas outside the NAPL Collection System, a small amount of tar-like material was observed on the concrete surface at the following location during the March 2022 weekly inspections:

Seep Observations Outside the NAPL Collection System Area	
Stall Number	Observation Date(s)
A011	March 13 <sup>th</sup> (Photo No. 13)
A022	March 13 <sup>th</sup> (Photo No. 14)
B013	March 13 <sup>th</sup> (Photo No. 15)
B056	March 13 <sup>th</sup> (Photo No. 16)*
B057	March 13 <sup>th</sup> (Photo No. 17)
B101	March 13 <sup>th</sup> (Photo No. 18)
B102	March 9 <sup>th</sup> and 13 <sup>th</sup> (Photos No. 9 and 19)

*\* Indicates first recorded observance of a NAPL seep at that location*

Tar-like material observed during the inspection events was recovered using a hand tool to scrape up the material. During March, the number of tar-like material seeps observed during inspections and the total amount of material removed from the concrete surface increased compared to the February weekly inspections. Less than 0.75 gallons of tar-like material was recovered for the month and placed in a drum for disposal. The drum is staged at the Container Storage Area (CSA).

During September 2021, track marks from a container transport vehicle running over the seep in stall B102 were observed and barricades were set up surrounding the seep location to prevent further tracking. The barricades are checked and reset, as needed, during the weekly inspections. UPRR remediation contractor US Ecology pressure washed the tar-like material tracking in October 2021. Residual track marks were observed during the March inspections (Photos No. 9 and 19); however, no new track marks were observed during the month of March 2022.

- No brown water surface seeping or staining was observed during March. Residual staining on the asphalt surface following the pressure washing conducted in May 2021 was observed. However, no additional surface

staining was observed in March. UPRR will continue to have a remediation contractor pressure wash and/or collect the water in the areas where the brown staining and seeps are observed, as needed.

- Golder, on behalf of UPRR, submitted to the TCEQ the Englewood IM Yard Test Pit Evaluation Report dated June 2, 2021 summarizing the findings from the test pits installed in July 2020, including weekly inspections since the installation. As discussed in the Test Pit Report, the test pit inspections were to continue through the warmer months (through September 2021). UPRR will prepare a Test Pit Evaluation Report Addendum summarizing the test pit inspections from June through November 2021. During inspections in June and July 2021 the concrete patches covering test pits in stalls A010, A021, B013, B057, B096, and B108 were observed to be damaged. UPRR contractor US Ecology removed the damaged test pit concrete on October 22, 2021 and completed installation of new rebar and concrete on October 25, 2021. The new concrete patches continue to be monitored during the weekly inspections. Through March 2022, no NAPL seeps have been observed at the seven test pit locations (stalls A010, A021, A098, B013, B057, B096, and B108). The seeps observed in slots B013 and B057 during the inspection on March 16, 2022 are located in asphalt cracks (Photo Nos. 15 and 17), not at the test pit locations.
- A follow-up video camera survey of the stormwater sewer lines in the central area of the Englewood IM Yard was conducted on August 26, 2021 to evaluate the stormwater line near the test pit locations. Details of the follow-up video survey will be provided in the Test Pit Evaluation Report Addendum.
- The TCEQ issued a comment letter dated January 26, 2022 titled "*Comments on Interim Groundwater Monitoring Report (July 2020), dated April 30, 2021 Englewood Intermodal Yard (EIY) Test Pit Evaluation Report, dated June 2, 2021, Corrective Action Monitoring Report, 2021 First Semi-Annual Event, dated July 9, 2021*". In the comment letter, the TCEQ requested UPRR prepare an Interim Measures Work Plan (Work Plan) to address the NAPL seeps in the Englewood Intermodal Yard. The TCEQ requested that the Work Plan include a schedule and plan for implementation of additional interim measures to permanently address the NAPL seeps in the Englewood Intermodal Yard. UPRR is in the process of preparing the requested Work Plan.

Weekly site inspections of the NAPL Collection System and Englewood Intermodal Yard concrete pavement near the collection system will continue to be conducted. If you have any questions or need additional information, please feel free to call us at (512) 671-3434 or Mr. Kevin Peterburs of UPRR at (414) 267-4164.

Sincerely,

**Golder Associates USA Inc.**



Sarah Balke, G.I.T  
Consultant, Geologist



Eric C. Matzner, P.G.  
Principal / Program Leader

CC: Mr. Kevin Peterburs, UPRR – Milwaukee, WI  
Ms. Alma Jefferson, Waste Section Manager, TCEQ Region 12, Houston

Attachment Table 1 – NAPL Measurements – NAPL Collection System  
Attachment A – Weekly Inspection Photolog  
Attachment B – Waste Disposal Manifests





**TABLE 1**  
**NAPL Measurements - NAPL Collection System - Englewood Intermodal Yard**  
**UPRR Houston, tx - Wood Preserving Works**

Measured Date	Sump 1 (B099/B100) Freeboard (in)	Sump 2 (B103/B104) Freeboard (in)	Sump 3 (B107/B108) Freeboard (in)	Depth to DNAPL (in)	Comments
8/14/2019	2.5	28	29	Not measurable	
8/21/2019	0	27.5	26.5	Not measurable	
8/28/2019	44.5	47.9	45	Not measurable	Water from sumps pumped out
9/4/2019	19	42	41.5	Not measurable	
9/13/2019	0	39.5	38	Not measurable	
9/20/2019	0	3	2.5	Not measurable	
9/25/2019	0	42	42.5	Not measurable	Water from sumps pumped out
10/2/2019	2.5	42.5	42	Not measurable	Sheen visible in B107/B108 sump, less than 0.1 gal of DNAPL recovered
10/9/2019	3	42	41.5	Not measurable	Sheen visible in B107/B108 sump, less than 0.1 gal of DNAPL recovered
10/16/2019	0	39.5	39	Not measurable	Less than 0.1 gal of DNAPL recovered from B107/B108 Sump
10/24/2019	3	35	25	Not measurable	Less than 0.1 gal of DNAPL recovered from B107/B108 Sump
10/29/2019	0	24	23	Not measurable	Water from sumps pumped out
10/30/2019	0	40	39	Not measurable	Slight sheen visible in B107/B108 sump
11/6/2019	9	39	38.5	Not measurable	
11/13/2019	7	30	29	Not measurable	Less than 0.1 gal of DNAPL recovered from B107/B108 Sump
11/19/2019	4	26	25.5	Not measurable	
11/27/2019	0	25	23	Not measurable	
12/3/2019	2	25.5	25	Not measurable	Less than 0.1 gal of DNAPL recovered from B107/B108 Sump
12/11/2019	1.5	17	16.54	Not measurable	Less than 0.1 gal of DNAPL recovered from B107/B108 Sump
12/17/2019	5	19.5	17.5	Not measurable	
12/23/2019	10	21	20.5	Not measurable	
1/7/2020	9	13	12.5	Not measurable	
1/8/2020	9	13	12.5	Not measurable	Water from sumps pumped out
1/17/2020	0	32	31.5	Not measurable	
1/21/2020	2.5	26.5	26	Not measurable	
1/28/2020	0	0	0	Not measurable	
2/4/2020	2	11	10.5	Not measurable	
2/12/2020	0	0	0	Not measurable	
2/18/2020	1.5	11.5	10.25	Not measurable	Water from sumps pumped out on 2/20/2020
2/27/2020	2	42	36	Not measurable	
3/6/2020	1	36	36	Not measurable	
3/11/2020	2	36	35.5	Not measurable	
3/18/2020	0	35.5	35	Not measurable	
3/27/2020	0	29	28	Not measurable	
4/3/2020	1.5	29	28.5	Not measurable	
4/8/2020	0	23	22	Not measurable	
4/15/2020	0.5	23	22	Not measurable	
4/21/2020	0	21	21	Not measurable	
4/28/2020	0	23	22	Not measurable	
5/4/2020	-	-	-	Not Measured	Measurements were not taken; the inspector was unable to open the sumps
5/12/2020	0	20	19	Not measurable	
5/19/2020	0	15.75	14.25	Not measurable	Sump 1 pumped down (May 22nd)
5/27/2020	0	14	13	Not measurable	
6/1/2020	0	7	5	Not measurable	
6/10/2020	0	10	9	Not measurable	
6/17/2020	1	12	11	Not measurable	
6/25/2020	0	0	0	Not measurable	
6/30/2020	0	0	0	Not measured	
7/1/2020	48	46	47	Not measurable	Sumps 1, 2, & 3 pumped down
7/8/2020	34	24.5	24	Not measurable	Less than 0.1 gal of DNAPL recovered from B107/B108 Sump
7/15/2020	32	29.5	29	Not measurable	Sheen visible in B99/B100 sump & B107/B108 sump, less than 0.1 gal of DNAPL recovered B107/B108 sump
7/23/2020	0	23	22.5	Not measured	Less than 0.1 gal of DNAPL recovered from B107/B108 Sump
7/31/2020	0	11	10	Not measurable	
8/5/2020	0	7	5	Not measurable	
8/13/2020	1	11	10	Not measurable	
8/19/2020	0	7	6	Not measurable	
8/26/2020	0	10	9	Not measurable	
9/2/2020	43	37	38	Not measurable	Sumps 1, 2, & 3 pumped down (September 1); Sheen visible in B99/B100 sump & B107/B108 sump
9/9/2020	28	37	36	Not measurable	Sheen visible in B107/B108 sump
9/15/2020	1	35	33	Not measurable	
9/23/2020	0	0	0	Not measurable	
9/30/2020	1	10	9	Not measurable	
10/8/2020	4	12	11.5	Not measurable	
10/15/2020	0	11	10.5	Not measurable	Less than 0.1 gal of DNAPL recovered B107/B108 sump
10/21/2020	1	10.5	9.25	Not measurable	
10/28/2020	0	11	10	Not measurable	
11/4/2020	9	13	12	Not measurable	
11/11/2020	0.5	12	11	Not measurable	
11/18/2020	3.5	13	12	Not measurable	
11/24/2020	7	14	13.5	Not measurable	
11/30/2020	2	7	6	Not measurable	

**TABLE 1**  
**NAPL Measurements - NAPL Collection System - Englewood Intermodal Yard**  
**UPRR Houston, tx - Wood Preserving Works**

Measured Date	Sump 1 (B099/B100) Freeboard (in)	Sump 2 (B103/B104) Freeboard (in)	Sump 3 (B107/B108) Freeboard (in)	Depth to DNAPL (in)	Comments
12/10/2020	5	10.5	10	Not measurable	
12/18/2020	4	10	9	Not measurable	
12/23/2020	1	9	7.5	Not measurable	
12/31/2020	0	4	3.5	Not measurable	
1/6/2021	4	10.5	9	Not measurable	
1/15/2021	43	39	37.5	Not measurable	Sumps 1, 2, & 3 pumped down
1/22/2021	0	34	33	Not measurable	Sheen visible in B107/B108 sump
1/29/2021	2	31	30	Not measurable	Sheen visible in B107/B108 sump
2/4/2021	4	30	29.5	Not measurable	Sheen visible in B099/B100 sump
2/10/2021	0	27	25.5	Not measurable	
2/17/2021	0	0	0	Not measurable	
2/24/2021	2	10	9.5	Not measurable	
3/2/2021	0	0	0	Not measurable	
3/10/2021	0	10	9.75	Not measurable	
3/17/2021	0	2	1	Not measurable	
3/24/2021	0	3.5	2	Not measurable	
3/31/2021	0	6.5	7	Not measurable	
4/8/2021	0	7.5	7	Not measurable	
4/14/2021	0	6.5	6	Not measurable	Less than 0.1 gal of DNAPL recovered B107/B108 sump; Sheen visible in B103/104 and B107/B108 sumps
4/21/2021	0.5	9	8.5	Not measurable	
4/28/2021	0	8.5	8	Not measurable	
5/5/2021	0	7.5	7	Not measurable	
5/12/2021	0	8	7.5	Not measurable	
5/19/2021	0	0	0	Not measurable	
5/26/2021	0	2	0.5	Not measurable	
5/27/2021	41	32	26	Not measurable	Sumps 1,2, & 3 pumped down
6/2/2021	0	40	38	Not measurable	Sheen visible in B107/108 sump
6/9/2021	0	30	28.5	Not measurable	
6/16/2021	0	24	25	Not measurable	
6/23/2021	0	12	13	Not measurable	
6/30/2021	0	3	1	Not measurable	
7/7/2021	0	0	0	Not measurable	
7/14/2021	0	0	0	Not measurable	Sumps 1,2, & 3 pumped down (July 15)
7/21/2021	0	39	37	Not measurable	
7/29/2021	0	37	35.5	Not measurable	
8/4/2021	0	36	34	Not measurable	Sheen visible in B103/104 and B107/B108 sumps
8/11/2021	0	33	32	Not Measured	Depth to DNAPL measurements were not taken; the interface probe was not functioning properly
8/18/2021	0	25	23	Not measurable	
8/25/2021	0	20	22	Not measurable	
9/1/2021	0	20	17	Not measurable	
9/8/2021	3	14	11	Not measurable	
9/15/2021	0	3	4	Not measurable	Sumps 1,2, & 3 pumped down (September 17)
9/22/2021	31.5	46	46	Not measurable	Sheen visible in B107/B108 sump
9/29/2021	0	29	30.75	Not measurable	Sheen visible in B103/104 and B107/B108 sumps
10/7/2021	6	18	17.5	Not measurable	
10/13/2021	3.6	10.56	9.72	Not measurable	Sheen visible in B103/104 and B107/B108 sumps; brown discoloration and slight odor noted B099/B100 sump
10/20/2021	0	13.94	12.6	Not measurable	Sumps 1,2, & 3 pumped down (October 21)
10/27/2021	0	22	21	Not measurable	Sheen visible in B099/B100 sump
11/3/2021	10	20	21	Not measurable	
11/10/2021	12	16	15	Not measurable	
11/17/2021	8	16	15	Not measurable	
11/24/2021	7	14	13	Not measurable	
12/1/2021	7	15	14	Not measurable	
12/8/2021	6	12.5	12	Not measurable	
12/15/2021	7	15	15	Not measurable	
12/22/2021	-	-	-	Not Measured	Partial site inspection conducted 12/22/21; Sump measurements were not taken
12/29/2021	0	11.5	11	Not measurable	
1/5/2022	8.75	13.5	12.25	Not measurable	
1/12/2022	6	12	12	Not measurable	
1/19/2022	13.5	17	16	Not measurable	Sheen visible in B099/B100 sump
1/27/2022	3	9	9	Not measurable	
2/2/2022	-	-	-	Not Measured	Measurements were not taken; the inspector was unable to open the sumps
2/9/2022	9	15	15	Not measurable	
2/16/2022	8.5	17	16	Not measurable	
2/23/2022	5.5	14	13.5	Not measurable	
3/2/2022	5.5	15	14	Not measurable	
3/9/2022	4.5	7	6	Not measurable	
3/16/2022	48	36	45	Not measurable	Sumps 1,2, & 3 pumped down during inspection; less than 0.5 gal of DNAPL recovered B107/B108 sump
3/23/2022	6	29	28	Not measurable	
3/30/2022	5.5	28	28	Not measurable	

Note:  
Freeboard in sumps is measured as depth to water from top rim of sump, measured in inches





**ATTACHMENT A**



## Weekly Inspection Photolog

<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>1</b>	<b>Inspection Date:</b> 3/2/2022		
<b>Description:</b>  Slots A010, no tar-like material seeps observed where test pit conducted (July 2020), looking southwest.  Lat: 29.785392, Long: -95.318655			
<b>Photo No.</b> <b>2</b>	<b>Inspection Date:</b> 3/2/2022		
<b>Description:</b>  Slot B013, no active tar-like material seeps observed at historical seep location or where test pit conducted (July 2020), looking northeast.  Lat: 29.785217 Long: - 95.318261			





<b>Client Name:</b> Union Pacific Railroad		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> 3	<b>Inspection Date:</b> 3/2/2022	<div> <div> <b>Description:</b>   Slot B057, no active tar-like material seeps observed at historical seep location or where test pit conducted (July 2020), looking north.   Lat: 29.7847472  Long: - 95.3195417 </div>  </div>	
<b>Photo No.</b> 4	<b>Inspection Date:</b> 3/2/2022	<div> <div> <b>Description:</b>   Sump 1 (B099/B100), 5.5 inches of freeboard in sump, no sheen or odor noted.   Lat: 29.7844000  Long: - 95.3205861 </div>  </div>	





<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>5</b>	<b>Inspection Date:</b> 3/2/2022	<div> <p><b>Description:</b></p> <p>Sump 2 (B103/B104), 15 inches of freeboard in sump. No sheen or odor noted.</p> <p>Lat: 29.7842861 Long: - 95.3208611</p> </div> 	
<b>Photo No.</b> <b>6</b>	<b>Inspection Date:</b> 3/2/2022	<div> <p><b>Description:</b></p> <p>Sump 3 (B107/B108), 14 inches of freeboard in sump. No sheen or odor noted. No tar-like material recovered.</p> <p>Lat: 29.784172 Long: -95.320998</p> </div> 	



<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>7</b>	<b>Inspection Date:</b> 3/9/2022		
<b>Description:</b>  Slot A021, no tar-like material seeps observed where test pit conducted (July 2020), looking southwest.  Lat: 29.785392, Long: -95.318655			
<b>Photo No.</b> <b>8</b>	<b>Inspection Date:</b> 3/9/2022		
<b>Description:</b>  Slot B096, no tar-like material seeps observed where test pit conducted (July 2020), looking northeast.  Lat: 29.7842528 Long: - 95.3206250			

<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>9</b>	<b>Inspection Date:</b> 3/9/2022		
<b>Description:</b>  Slot B102, small amount of tar-like material observed within concrete join, residual staining on concrete surface noted.  Lat: 29.7842203 Long: - 95.320827			
<b>Photo No.</b> <b>10</b>	<b>Inspection Date:</b> 3/9/2022		
<b>Description:</b>  Sump 1 (B099/B100), 4.5 inches of freeboard in sump, no sheen or odor noted.  Lat: 29.7844000 Long: - 95.3205861			



Client Name: Union Pacific Railroad		Site Location: Englewood Houston, Texas	Project No. 19119232
Photo No. 11	Inspection Date: 3/9/2022		
Description:  Sump 2 (B103/B104), 7 inches of freeboard in sump. No sheen or odor noted.  Lat: 29.7842861 Long: - 95.3208611			
Photo No. 12	Inspection Date: 3/9/2022		
Description:  Sump 3 (B107/B108), 6 inches of freeboard in sump. No sheen or odor noted. No tar-like material recovered.  Lat: 29.784172 Long: -95.320998			



<b>Client Name:</b> <b>Union Pacific Railroad</b>	<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
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<b>Photo No.</b> <b>13</b>	<b>Inspection Date:</b> 3/16/2022
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**Description:**

Slot A011, very small amount of tar-like material seeping at asphalt crack, material was removed.

Lat: 29.785467  
Long: -95.318347



<b>Photo No.</b> <b>14</b>	<b>Inspection Date:</b> 3/16/2022
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**Description:**

Slot A022, very small amount of tar-like material seeping at asphalt crack, material was removed.



Lat: 29.785392,  
Long: -95.318655





<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>15</b>	<b>Inspection Date:</b> 3/16/2022		
<b>Description:</b>  Slot B013, very small amount of tar-like material seeping at historical seep location in asphalt crack, no seeps observed where test pit conducted (July 2020), material was removed.  Lat: 29.785217 Long: - 95.318261			
<b>Photo No.</b> <b>16</b>	<b>Inspection Date:</b> 3/16/2022		
<b>Description:</b>  Slot B056, very small amount of tar-like material seeping at asphalt crack, material was removed.  Lat: 29.784784 Long: -95.319620			





<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>17</b>	<b>Inspection Date:</b> 3/16/2022		
<b>Description:</b>  Slot B057, very small amount of tar-like material seeping at historical seep location in asphalt cracks, no seeps observed where test pit conducted (July 2020), material was removed.  Lat: 29.7847472 Long: - 95.3195417			
<b>Photo No.</b> <b>18</b>	<b>Inspection Date:</b> 3/16/2022		
<b>Description:</b>  Slot B101, very small amount of tar-like material seeping at asphalt crack, material was removed.  Lat: 29.784275 Long: - 95.320813			



<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>19</b>	<b>Inspection Date:</b> 3/16/2022		
<b>Description:</b>  Slot B102, small amount of tar-like material seeping at joint, material was removed.  Lat: 29.7842203 Long: - 95.320827			
<b>Photo No.</b> <b>20</b>	<b>Inspection Date:</b> 3/16/2022		
<b>Description:</b>  Slot B105, very small amount of tar-like material seeping at asphalt crack, material was removed.  Lat: 29.7841472 Long: - 95.3208777			



<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>21</b>	<b>Inspection Date:</b> 3/16/2022		
<b>Description:</b>  Sump 1 (B099/B100), after pump down event; 48 inches of freeboard in sump. No sheen or odor noted.  Lat: 29.7844000 Long: - 95.3205861			
<b>Photo No.</b> <b>22</b>	<b>Inspection Date:</b> 3/16/2022		
<b>Description:</b>  Sump 2 (B103/B104), after pump down event; 36 inches of freeboard in sump. No sheen or odor noted.  Lat: 29.7842861 Long: - 95.3208611			



<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
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<b>Photo No.</b> <b>23</b>	<b>Inspection Date:</b> 3/16/2022
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**Description:**

Sump 3 (B107/B108), after pump down event; 48 inches of freeboard in sump. No sheen or odor noted. Approximately 0.5 gallons of tar-like material recovered.

Lat: 29.784172  
Long: -95.320998



<b>Photo No.</b> <b>24</b>	<b>Inspection Date:</b> 3/16/2022
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**Description:**

Sump 3 (B107/B108), Approximately 0.45 gallons of tar-like material recovered during pump down event.

Lat: 29.784172  
Long: -95.320998





Client Name: Union Pacific Railroad		Site Location: Englewood Houston, Texas	Project No. 19119232
Photo No. 25	Inspection Date: 3/23/2022		
Description:  Slot B013, no active tar-like material seeps observed at historical seep location or where test pit conducted (July 2020), looking northeast.  Lat: 29.785217 Long: - 95.318261			
Photo No. 26	Inspection Date: 3/23/2022		
Description:  Slot B057, no active tar-like material seeps observed at historical seep location or where test pit conducted (July 2020), looking northeast.  Lat: 29.7847472 Long: - 95.3195417			



<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
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<b>Photo No.</b> <b>27</b>	<b>Inspection Date:</b> 3/23/2022
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**Description:**

Slot B096, no tar-like material seeps observed where test pit conducted (July 2020), looking northeast.

Lat: 29.7842528  
Long: - 95.3206250



<b>Photo No.</b> <b>28</b>	<b>Inspection Date:</b> 3/23/2022
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**Description:**



Sump 1 (B099/B100), 6 inches of freeboard in sump. No sheen or odor noted.

Lat: 29.7844000  
Long: - 95.3205861









Client Name: Union Pacific Railroad		Site Location: Englewood Houston, Texas	Project No. 19119232
Photo No. 29	Inspection Date: 3/23/2022		
Description:  Sump 2 (B103/B104), 29 inches of freeboard in sump. No sheen or odor noted.  Lat: 29.7842861 Long: - 95.3208611			
Photo No. 30	Inspection Date: 3/23/2022		
Description:  Sump 3 (B107/B108), 28 inches of freeboard in sump. No sheen or odor noted. No tar-like material recovered.  Lat: 29.784172 Long: -95.320998			

<b>Client Name:</b> <b>Union Pacific Railroad</b>		<b>Site Location:</b> Englewood Houston, Texas	<b>Project No.</b> 19119232
<b>Photo No.</b> <b>31</b>	<b>Inspection Date:</b> 3/30/2022		
<b>Description:</b>  Slots A010, no tar-like material seeps observed where test pit conducted (July 2020), pavement wet from ongoing rain event, looking southwest.  Lat: 29.785392, Long: -95.318655			
<b>Photo No.</b> <b>32</b>	<b>Inspection Date:</b> 3/30/2022		
<b>Description:</b>  Slot A021, no tar-like material seeps observed where test pit conducted (July 2020), pavement wet from ongoing rain event, looking southwest.  Lat: 29.785392, Long: -95.318655			



Client Name: Union Pacific Railroad		Site Location: Englewood Houston, Texas	Project No. 19119232
Photo No. 33	Inspection Date: 3/30/2022		
Description:  View of slots B109-B097, no tar-like material seeps observed NAPL collection system visible in background, pavement wet from ongoing rain event, looking east.  Lat: 29.784358 Long: -95.320611			
Photo No. 34	Inspection Date: 3/30/2022		
Description:  Sump 1 (B099/B100), 5.5 inches of freeboard in sump. No sheen or odor noted. Pavement wet from ongoing rain event.  Lat: 29.7844000 Long: - 95.3205861			

Client Name: Union Pacific Railroad		Site Location: Englewood Houston, Texas	Project No. 19119232
Photo No. 35	Inspection Date: 3/30/2022		
Description:  Sump 2 (B103/B104), 28 inches of freeboard in sump. No sheen or odor noted. Pavement wet from ongoing rain event.  Lat: 29.7842861 Long: - 95.3208611			
Photo No. 36	Inspection Date: 3/30/2022		
Description:  Sump 3 (B107/B108), 28 inches of freeboard in sump. No sheen or odor noted. No tar-like material recovered. Pavement wet from ongoing rain event.  Lat: 29.784172 Long: -95.320998			



**ATTACHMENT B**

## Waste Disposal Manifests



<b>NON-HAZARDOUS WASTE MANIFEST</b>		1. Generator ID Number		2. Page 1 of 1	3. Emergency Response Phone 1-888-877-7267	4. Waste Tracking Number UPRR-008122-1	
5. Generator's Name and Mailing Address UPRR 406015 HAN! Manifest Receiving 6525 Corporate Drive Indianapolis IN 46278 Generator's Phone: 414-267-4164				Generator's Site Address (if different than mailing address) UPRR 5500 Wallisville Rd Houston, TX 77020			
6. Transporter 1 Company Name				U.S. EPA ID Number			
7. Transporter 2 Company Name				U.S. EPA ID Number			
8. Designated Facility Name and Site Address Delta Water Processing LLC 10511 Beckum Hwy Houston, TX 77049 (281) 404-4423				U.S. EPA ID Number TX97222			
9. Waste Shipping Name and Description				10. Containers		11. Total Quantity	12. Unit Wt./Vol.
				No.	Type		
1. NON Regulated NON Hazardous Hydrocarbon Water				1	TT	5250	G NONE
2.							
3.							
4.							
13. Special Handling Instructions and Additional Information WR#008122 Profile: LEGAD103P							
14. GENERATOR'S CERTIFICATION: I certify the materials described above on this manifest are not subject to federal regulations for reporting proper disposal of Hazardous Waste.							
Generator's/Officer's Printed/Typed Name Tyler A. Parker				Signature 		Month Day Year 03 16 22	
15. International Shipments <input type="checkbox"/> Import to U.S. <input type="checkbox"/> Export from U.S.				Port of entry/exit: Date leaving U.S.:			
16. Transporter Acknowledgment of Receipt of Materials							
Transporter 1 Printed/Typed Name LIONEL HUBBARD				Signature 		Month Day Year	
Transporter 2 Printed/Typed Name				Signature		Month Day Year	
17. Discrepancy							
17a. Discrepancy Indication Space <input type="checkbox"/> Quantity <input type="checkbox"/> Type <input type="checkbox"/> Residue <input type="checkbox"/> Partial Rejection <input type="checkbox"/> Full Rejection							
Manifest Reference Number:							
17b. Alternate Facility (or Generator)				U.S. EPA ID Number			
Facility's Phone:				Month Day Year			
17c. Signature of Alternate Facility (or Generator)				Month Day Year			
18. Designated Facility Owner or Operator Certification of receipt of materials covered by the manifest except as noted in item 17a							
Printed/Typed Name SARAH ARMSTRONG				Signature 		Month Day Year 3 16 22	

DESIGNATED FACILITY TO GENERATOR

**NON-HAZARDOUS  
WASTE MANIFEST**

1. Generator ID Number

2. Page 1 of 1

3. Emergency Response Phone

4. Waste Tracking Number

5. Generator's Name and Mailing Address

UPRR CLOTHES ATTN: Manifest Receiving  
6520 Corporate Drive  
Indianapolis IN 46228

Generator's Site Address (if different than mailing address)

UPRR  
6500 Wallisville Rd  
Houston, TX 77020

6. Transporter 1 Company Name

Qch 19

U.S. EPA ID Number

7. Transporter 2 Company Name

U.S. EPA ID Number

8. Designated Facility Name and Site Address

Delta Water Processing LLC  
18511 Baymont Hwy  
Houston TX 77019 (281) 404-4423

U.S. EPA ID Number

Facility's Phone: Houston TX 77019 (281) 404-4423

TX 97222

9. Waste Shipping Name and Description

1. Non-Regulated Non-Hazardous  
Hydrocarbon Wastes

10. Containers

No.

Type

11. Total  
Quantity

12. Unit  
WL/Vol.

TT

3850

G

NONE

13. Special Handling Instructions and Additional Information

WTA# 008122

Profile# LEGAD103P

14. GENERATOR'S CERTIFICATION: I certify the materials described above on this manifest are not subject to federal regulations for reporting proper disposal of Hazardous Waste.

Generator's/Officer's Printed/Typed Name

Tyler A. Parker

Signature

Month Day Year

03 16 22

15. International Shipments

☐ Import to U.S.

☐ Export from U.S.

Port of entry/exit:

Date leaving U.S.:

Transporter Signature (for exports only):

16. Transporter Acknowledgment of Receipt of Materials

Transporter 1 Printed/Typed Name

LIONEL HUBBARD

Signature

Month Day Year

3 16 22

Transporter 2 Printed/Typed Name

Signature

Month Day Year

17. Discrepancy

17a. Discrepancy Indication Space

☐ Quantity

☐ Type

☐ Residue

☐ Partial Rejection

☐ Full Rejection

Manifest Reference Number:

U.S. EPA ID Number

17b. Alternate Facility (or Generator)

Facility's Phone:

17c. Signature of Alternate Facility (or Generator)

Month Day Year

18. Designated Facility Owner or Operator: Certification of receipt of materials covered by the manifest except as noted in Item 17a

Printed/Typed Name

M. M. M.

Signature

Month Day Year

3 16 22

DESIGNATED FACILITY TO GENERATOR