Incident ID	NAPP2123131376
District RP	
Facility ID	
Application ID	

# Closure

The responsible party must attach information demonstrating they have complied with all applicable closure requirements and any conditions or directives of the OCD. This demonstration should be in the form of a comprehensive report (electronic submittals in .pdf format are preferred) including a scaled site map, sampling diagrams, relevant field notes, photographs of any excavation prior to backfilling, laboratory data including chain of custody documents of final sampling, and a narrative of the remedial activities. Refer to 19.15.29.12 NMAC.

<b><u>Closure Report Attachment Checklist</u></b> : Each of the following	items must be included in the closure report.
$\square$ A scaled site and sampling diagram as described in 19.15.29.	11 NMAC
Photographs of the remediated site prior to backfill or photos must be notified 2 days prior to liner inspection)	s of the liner integrity if applicable (Note: appropriate OCD District office
Laboratory analyses of final sampling (Note: appropriate OD	C District office must be notified 2 days prior to final sampling)
Description of remediation activities	
may endanger public health or the environment. The acceptance of should their operations have failed to adequately investigate and re human health or the environment. In addition, OCD acceptance of	ations. The responsible party acknowledges they must substantially onditions that existed prior to the release or their final land use in OCD when reclamation and re-vegetation are complete.
email:Adrian.Baker@exxonmobil.com	Telephone:432-263-3808
OCD Only	
Received by: <u>Robert Hamlet</u>	Date: <u>3/14/2022</u>
	v of liability should their operations have failed to adequately investigate and water, human health, or the environment nor does not relieve the responsible /or regulations.
Closure Approved by: Robert Hamlet	Date: <u>3/14/2022</u>
Printed Name: Robert Hamlet	Title: Environmental Specialist - Advanced

District I 1625 N. French Dr., Hobbs, NM 88240 District II 811 S. First St., Artesia, NM 88210 District III 1000 Rio Brazos Road, Aztec, NM 87410 District IV 1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico Energy Minerals and Natural **Resources Department** 

**Oil Conservation Division** 1220 South St. Francis Dr. Santa Fe, NM 87505

Form C-141 Revised August 24, 2018 Submit to appropriate OCD District office

)

Incident ID	NAPP2123231376
District RP	
Facility ID	
Application ID	

## **Release Notification**

### **Responsible Party**

Responsible Party XTO Energy	OGRID 5380	
Contact Name Shelby Pennington	Contact Telephone 281-723-9353	
Contact email shelby.pennington@exxonmobil.com	Incident # (assigned by OCD)	
Contact mailing address 6401 Holiday Hill Rd Bldg 5, Midland, Texas, 79707		

### **Location of Release Source**

32.11862 Latitude

Longitude -103.90859 (NAD 83 in decimal degrees to 5 decimal places)

Site Name Tiger	Site Type Compressor Station
Date Release Discovered 08/07/2021	API# (if applicable)

Unit Letter	Section	Township	Range	County
Е	20	258	30E	Eddy

Surface Owner: State 🗴 Federal 🗌 Tribal 🗌 Private (Name: \_

## **Nature and Volume of Release**

Crude Oil	Volume Released (bbls)	Volume Recovered (bbls)
Produced Water	Volume Released (bbls)	Volume Recovered (bbls)
	Is the concentration of total dissolved solids (TDS) in the produced water >10,000 mg/l?	Yes No
▼ Condensate	Volume Released (bbls) 7.24	Volume Recovered (bbls) 4.75

1 1 ... 1 1 1 ...

Natural Gas Volume Released (Mcf) Volume Recovered (Mcf) Other (describe) Volume/Weight Released (provide units) Volume/Weight Recovered (provide units) Cause of Release Night mechanic responded to high-high alarm to find nipple below pressure relief valve releasing fluid both into

containment and onto pad. A vac truck recovered standing fluids. A third-party contractor has been retained for remediation activities.

Page	2
------	---

NA

### Oil Conservation Division

Incident ID	NAPP2123231376
District RP	
Facility ID	
Application ID	

Was this a major release as defined by 19.15.29.7(A) NMAC?	If YES, for what reason(s) does the responsible party consider this a major release? N/A
Yes 🗶 No	
If YES, was immediate n	otice given to the OCD? By whom? To whom? When and by what means (phone, email, etc)?
N/A	

### **Initial Response**

The responsible party must undertake the following actions immediately unless they could create a safety hazard that would result in injury

 $\checkmark$  The source of the release has been stopped.

★ The impacted area has been secured to protect human health and the environment.

Released materials have been contained via the use of berms or dikes, absorbent pads, or other containment devices.

▲ All free liquids and recoverable materials have been removed and managed appropriately.

If all the actions described above have not been undertaken, explain why:

Per 19.15.29.8 B. (4) NMAC the responsible party may commence remediation immediately after discovery of a release. If remediation has begun, please attach a narrative of actions to date. If remedial efforts have been successfully completed or if the release occurred within a lined containment area (see 19.15.29.11(A)(5)(a) NMAC), please attach all information needed for closure evaluation.

I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to OCD rules and regulations all operators are required to report and/or file certain release notifications and perform corrective actions for releases which may endanger public health or the environment. The acceptance of a C-141 report by the OCD does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to groundwater, surface water, human health or the environment. In addition, OCD acceptance of a C-141 report does not relieve the operator of responsibility for compliance with any other federal, state, or local laws and/or regulations.

Adrian Baker Printed Name:	SSHE Coordinator Title:
Signature: altrian Bays	Date:
email:	Telephone:
OCD Only	
Received by: Ramona Marcus	

Location:	Tiger Compressor Station	
Spill Date:	8/7/2021	
	Area 1	
Approximate A	rea = 26.6	7 cu.ft.
	VOLUME OF LEAK	-
Total Crude Oil	= 4.7	5 bbls
Total Produced	Water = 0.0	0 bbls
	Area 2	-
Approximate A	rea = 4974.7	0 sq. ft.
Average Satura	tion (or depth) of spill = 1.1	3 inches
Average Porosi	y Factor = 0.0	3

VOLUME OF LEAK		
Total Crude Oil =	2.49	bbls
Total Produced Water =	0.00	bbls

TOTAL VOLUME OF LEAK									
Total Crude Oil =	7.24	bbls							
Total Produced Water =	0.00	bbls							
TOTAL VOLUME RECOVERED									
Total Crude Oil =	4.75	bbls							
Total Produced Water =	0.00	bbls							

Page 3

Oil Conservation Division

	Page 5 of 33
Incident ID	NAPP2123131376
District RP	
Facility ID	
Application ID	

## Site Assessment/Characterization

This information must be provided to the appropriate district office no later than 90 days after the release discovery date.

What is the shallowest depth to groundwater beneath the area affected by the release?	>100 (ft bgs)
Did this release impact groundwater or surface water?	Yes X No
Are the lateral extents of the release within 300 feet of a continuously flowing watercourse or any other significant watercourse?	🗌 Yes 🕅 No
Are the lateral extents of the release within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark)?	🗌 Yes 🗶 No
Are the lateral extents of the release within 300 feet of an occupied permanent residence, school, hospital, institution, or church?	🗌 Yes 🕅 No
Are the lateral extents of the release within 500 horizontal feet of a spring or a private domestic fresh water well used by less than five households for domestic or stock watering purposes?	🗌 Yes 🗶 No
Are the lateral extents of the release within 1000 feet of any other fresh water well or spring?	Yes X No
Are the lateral extents of the release within incorporated municipal boundaries or within a defined municipal fresh water well field?	🗌 Yes 🗶 No
Are the lateral extents of the release within 300 feet of a wetland?	Yes X No
Are the lateral extents of the release overlying a subsurface mine?	Yes X No
Are the lateral extents of the release overlying an unstable area such as karst geology?	🗌 Yes 🔀 No
Are the lateral extents of the release within a 100-year floodplain?	🗌 Yes 🗶 No
Did the release impact areas <b>not</b> on an exploration, development, production, or storage site?	🗌 Yes 🗶 No

Attach a comprehensive report (electronic submittals in .pdf format are preferred) demonstrating the lateral and vertical extents of soil contamination associated with the release have been determined. Refer to 19.15.29.11 NMAC for specifics.

#### Characterization Report Checklist: Each of the following items must be included in the report.

- Scaled site map showing impacted area, surface features, subsurface features, delineation points, and monitoring wells.
- X Field data
- X
   Data table of soil contaminant concentration data
- Depth to water determination
- X Determination of water sources and significant watercourses within <sup>1</sup>/<sub>2</sub>-mile of the lateral extents of the release
- X Boring or excavation logs
- X Photographs including date and GIS information
- **X** Topographic/Aerial maps
- Laboratory data including chain of custody

If the site characterization report does not include completed efforts at remediation of the release, the report must include a proposed remediation plan. That plan must include the estimated volume of material to be remediated, the proposed remediation technique, proposed sampling plan and methods, anticipated timelines for beginning and completing the remediation. The closure criteria for a release are contained in Table 1 of 19.15.29.12 NMAC, however, use of the table is modified by site- and release-specific parameters.

Received by OCD: 11/5/202	1 12:00:19 PM State of New Mexico			Page 6				
				Incident ID	NAPP2123131376			
Page 4	Oil Conservation Divisi	on		District RP				
				Facility ID				
				Application ID				
regulations all operators are republic health or the environm failed to adequately investigal addition, OCD acceptance of and/or regulations.  Printed Name:	nation given above is true and complete to equired to report and/or file certain release ent. The acceptance of a C-141 report by the and remediate contamination that pose a a C-141 report does not relieve the operator <u>Adrian Baker</u> <u>Adrian Baker</u> <u>ion Bakes</u> er@exxonmobil.com	e notifications the OCD doe a threat to gro or of responsi	and perform co s not relieve the undwater, surfa bility for compl Environmen <u>11/02/2021</u>	rrective actions for rele operator of liability sho ce water, human health iance with any other feo tal Coordinator	ases which may endanger ould their operations have or the environment. In deral, state, or local laws			
OCD Only Received by:			Date:					

Oil Conservation Division

Incident ID	NAPP2123131376
District RP	
Facility ID	
Application ID	

Page 7 of 331

## Closure

The responsible party must attach information demonstrating they have complied with all applicable closure requirements and any conditions or directives of the OCD. This demonstration should be in the form of a comprehensive report (electronic submittals in .pdf format are preferred) including a scaled site map, sampling diagrams, relevant field notes, photographs of any excavation prior to backfilling, laboratory data including chain of custody documents of final sampling, and a narrative of the remedial activities. Refer to 19.15.29.12 NMAC.

<b><u>Closure Report Attachment Checklist</u></b> : Each of the following i	tems must be included in the closure report.
$\square$ A scaled site and sampling diagram as described in 19.15.29.1	11 NMAC
Photographs of the remediated site prior to backfill or photos must be notified 2 days prior to liner inspection)	of the liner integrity if applicable (Note: appropriate OCD District office
Laboratory analyses of final sampling (Note: appropriate ODC	C District office must be notified 2 days prior to final sampling)
Description of remediation activities	
and regulations all operators are required to report and/or file certai may endanger public health or the environment. The acceptance of	ations. The responsible party acknowledges they must substantially inditions that existed prior to the release or their final land use in DCD when reclamation and re-vegetation are complete.
OCD Only	
Received by:	Date:
	of liability should their operations have failed to adequately investigate and water, human health, or the environment nor does not relieve the responsible for regulations.
Closure Approved by:	Date:
Printed Name:	Title:

WSP USA

3300 North "A" Street Building 1, Unit 222 Midland, Texas 79705 432.704.5178

November 2, 2021

District II New Mexico Oil Conservation Division 811 South First Street Artesia, New Mexico 88210

### RE: Closure Request Tiger Compressor Station Incident Number NAPP2123231376 Eddy County, New Mexico

To Whom It May Concern:

WSP USA Inc. (WSP) on behalf of XTO Energy, Inc. (XTO), presents the following Closure Request detailing site assessment, excavation, and soil sampling activities at the Tiger Compressor Station (Site) in Unit E, Section 20, Township 25 South, Range 30 East, in Eddy County, New Mexico (Figure 1). The purpose of the site assessment, excavation, and soil sampling activities was to address impacts to soil following a release of condensate at the Site. Based on the excavation activities and soil sample laboratory analytical results, XTO is submitting this Closure Request, describing remediation that has occurred and requesting no further action (NFA) for Incident Number NAPP2123231376.

#### **RELEASE BACKGROUND**

On August 7, 2021, a nipple below the pressure relief valve was found to be releasing fluid both into the lined containment and onto the pad. Approximately 7.24 barrels (bbls) of condensate were released. A vacuum truck was immediately dispatched to the Site to recover free-standing fluids; approximately 4.75 bbls of condensate were recovered. XTO reported the release to the New Mexico Oil Conservation Division (NMOCD) on a Release Notification Form C-141 (Form C-141) on August 20, 2021. The release was assigned Incident Number NAPP2123231376.

#### SITE CHARACTERIZATION

WSP characterized the Site according to Table 1, *Closure Criteria for Soils Impacted by a Release*, of Title 19, Chapter 15, Part 29, Section 12 (19.15.29.12) of the New Mexico Administrative Code (NMAC). Depth to groundwater at the Site is greater than 100 feet below ground surface (bgs) based on a recent soil boring drilled for determination of regional groundwater depth. During February 2020, WSP installed a soil boring (C-04394) within 0.5 miles of the Site utilizing a truck mounted hollow stem auger rig. Soil boring C-04394 was drilled to a depth of 110 feet bgs. A WSP geologist logged and described soils continuously. No moisture or groundwater was encountered during drilling activities. The Well Record and Log is included in Attachment 1. The location of the

District II Page 2

borehole is approximately 0.5 miles southwest of the Site and is depicted on Figure 1. The borehole was left open for over 72 hours to allow for potential slow infill of groundwater. After the 72-hour waiting period without observing groundwater, it was confirmed that groundwater beneath the Site is greater than 110 feet bgs. The borehole was properly abandoned with hydrated bentonite chips.

The closest continuously flowing water or significant watercourse to the Site is an intermittent riverine, located approximately 2,260 feet southeast of the Site. The Site is greater than 200 feet from a lakebed, sinkhole, or playa lake and greater than 300 feet from an occupied residence, school, hospital, institution, church, or wetland. The Site is greater than 1,000 feet to a freshwater well or spring and is not within a 100-year floodplain or overlying a subsurface mine. The Site is not underlain by unstable geology (low potential karst designation area). Site receptors are identified on Figure 1.

#### **CLOSURE CRITERIA**

Based on the results of the Site Characterization, the following NMOCD Table 1 Closure Criteria (Closure Criteria) apply:

- Benzene: 10 milligrams per kilogram (mg/kg)
- Benzene, toluene, ethylbenzene, and total xylenes (BTEX): 50 mg/kg
- Total petroleum hydrocarbons (TPH)-gasoline range organics (GRO) and TPH-diesel range organics (DRO): 1,000 mg/kg
- TPH: 2,500 mg/kg
- Chloride: 20,000 mg/kg

#### SITE ASSESSMENT ACTIVITIES AND ANALYTICAL RESULTS

On August 26, 2021, WSP personnel visited the Site to evaluate the release extent based on information provided on the Form C-141 and visual observations. WSP personnel collected four preliminary assessment soil samples (SS01 through SS04) within the release extent from a depth of approximately 0.5 feet bgs to assess the lateral extent of the impacted soil. The preliminary soil samples were field screened for volatile aromatic hydrocarbons and chloride utilizing a calibrated photoionization detector (PID) and Hach<sup>®</sup> chloride QuanTab<sup>®</sup> test strips, respectively. The release extent and preliminary soil sample locations were mapped utilizing a handheld Global Positioning System (GPS) unit and are depicted on Figure 2.

The preliminary soil samples were placed directly into pre-cleaned glass jars, labeled with the location, date, time, sampler name, method of analysis, and immediately placed on ice. The soil samples were transported at or below 4 degrees Celsius (°C) under strict chain-of-custody (COC) procedures to Eurofins Laboratories (Eurofins) in Carlsbad, New Mexico, for analysis of BTEX

District II Page 3

following United States Environmental Protection Agency (EPA) Method 8021B; TPH-GRO, TPH-DRO, and TPH-oil range organics (ORO) following EPA Method 8015M/D; and chloride following EPA Method 300.0.

Laboratory analytical results for preliminary soil sample SS03 indicated that benzene, BTEX, TPH-GRO/TPH-DRO, TPH, and chloride concentrations were compliant with the Closure Criteria. Laboratory analytical results for preliminary soil samples SS01, SS02, and SS04 indicated that BTEX and TPH-GRO/TPH-DRO concentrations exceeded the Closure Criteria. Based on visible staining in the release area and laboratory analytical results for the preliminary soil samples, delineation and excavation activities were warranted.

#### DELINEATION SOIL SAMPLING ACTIVITIES AND ANALYTICAL RESULTS

Between September 30, 2021 and October 8, 2021, WSP personnel were at the Site to oversee delineation activities as indicated by visual observations and laboratory analytical results for the preliminary soil samples.

Potholes PH01 through PH06 were advanced via backhoe to a depth of approximately 6 feet bgs within the release extent to further assess the lateral and vertical extent of impacted soil. Potholes PH04, and PH06 were advanced at the SS02 and SS03 preliminary soil sample locations, respectively. One borehole (BH01) was advanced via hand auger to a depth of approximately 4 feet bgs within the release extent. Delineation soil samples were collected from each pothole and borehole from depths ranging from 1-foot to 6 feet bgs. Soil from the potholes and borehole was field screened for volatile aromatic hydrocarbons and chloride utilizing PID and Hach<sup>®</sup> chloride QuanTab<sup>®</sup> test strips, respectively. Field screening results and observations for the potholes and borehole were logged on lithologic/soil sampling logs, which are included in Attachment 2.

Additionally, WSP collected lateral delineation surface samples SS01 through SS07 around the release extent to confirm the lateral extent of the release. The pothole, borehole, and surface delineation soil sample locations are depicted on Figure 3. The delineation soil samples were collected, handled, and analyzed as described above at Eurofins in Carlsbad, New Mexico.

Laboratory analytical results for the delineation soil samples collected from potholes PH01, PH02, PH04, PH05, and PH06 and borehole BH01 indicated that benzene, BTEX, TPH-GRO/TPH-DRO, TPH, and chloride concentrations were compliant with the Closure Criteria. Delineation soil sample PH03B, collected at 3 feet bgs from pothole PH03, indicated that TPH-GRO/TPH-DRO concentrations exceeded the Closure Criteria. Subsequent sample PH03C, collected at 4 feet bgs, was compliant with the Closure Criteria. Laboratory analytical results for surface delineation samples SS01 through SS07 indicated that benzene, BTEX, TPH-GRO/TPH-DRO, TPH, and chloride concentrations were compliant with the Closure Criteria.

District II Page 4

results, the lateral and vertical extent of the release was successfully defined, and excavation activities were completed.

#### **EXCAVATION SOIL SAMPLNG ACITIVITES AND ANALYTICAL RESULTS**

During October 2021, WSP personnel directed excavation activities based on observed staining in the release area, field screening activities, and laboratory analytical results for preliminary soil samples SS01, SS02, and SS04 and delineation soil sample PH03B, collected at 3 feet bgs. Excavation activities were performed using a track-mounted backhoe and transport vehicle. To direct excavation activities, WSP screened soil for volatile aromatic hydrocarbons and chloride utilizing a PID and Hach<sup>®</sup> chloride QuanTab<sup>®</sup> test strips, respectively. Following removal of impacted soil, WSP collected 5-point composite soil samples from the excavations. The 5-point composite samples were collected by placing five equivalent aliquots of soil into a 1-gallon, resealable plastic bag and homogenizing the samples by thoroughly mixing. Composite soil samples FS01, FS03, and FS04 were collected from the floor of the excavations from a depth of approximately 1.5 feet bgs. Due to the shallow depth of the excavation in these areas, the soil samples represented the floor and sidewalls of the excavation. Floor sample FS02 was collected from the deeper portion of the excavation from a depth of approximately 4 feet bgs. Due to the depth of excavation in this area, composite samples SW01 and SW02 were collected from the sidewalls of the excavation from a depth of ground surface to 4 feet bgs. The excavation soil samples were collected, handled, and analyzed following the same procedures as described above. The excavation extents and excavation soil sample locations are presented on Figure 4. Photographic documentation was conducted during the Site visits. A Photographic log is included in Attachment 3.

The excavations measured approximately 718 square feet. A total of approximately 16 cubic yards of impacted soil were removed during the excavation activities. The impacted soil was transported and properly disposed of at the R360 Facility in Hobbs, New Mexico. After completion of confirmation sampling, the excavation areas were backfilled.

Laboratory analytical results for excavation floor samples FS01 through FS04 and excavation sidewall samples SW01 and SW02 indicated that benzene, BTEX, TPH-GRO/TPH-DRO, TPH, and chloride concentrations were compliant with the Closure Criteria. Laboratory analytical results are summarized in Table 1 and laboratory analytical reports are included as Attachment 4.

#### **CLOSURE REQUEST**

Site assessment and excavation activities were conducted at the Site to address the August 20, 2021 release of condensate. Laboratory analytical results for the delineation soil samples collected from potholes PH01 through PH06, borehole BH01, and surface delineation samples SS01 through SS07 defined the lateral and vertical extent of the release. Based on the laboratory analytical results from the site assessment activities, impacted soil was excavated.



District II Page 5

Laboratory analytical results for excavation floor samples FS01 through FS04 and excavation sidewall samples SW01 through SW02, collected from the final excavation extent, indicated that benzene, BTEX, TPH-GRO/TPH-DRO, TPH, and chloride concentrations were compliant with the Closure Criteria and no further remediation was required. XTO backfilled the excavations with material purchased locally and recontoured the Site to match pre-existing site conditions.

Initial response efforts which included removal of freestanding fluids via hydrovac and excavation of impacted soil have mitigated impacts at this Site. Depth to groundwater is greater than 100 feet bgs and no other sensitive receptors were identified near the release extent. WSP and XTO believe these remedial actions are protective of human health, the environment, and groundwater. As such, XTO respectfully requests no further action for Incident Number NAPP2123231376.

If you have any questions or comments, please do not hesitate to contact Ms. Ashley Ager at (970) 385-1096.

Sincerely,

WSP USA Inc.

Kaeni Jennings

Kalei Jennings Associate Consultant

Ashley L. Ager

Ashley L. Ager, P.G. Managing Director, Geologist

cc: Adrian Baker, XTO Bureau of Land Management

Attachments:

- Figure 1 Site Location Map
- Figure 2 Preliminary Soil Sample Locations
- Figure 3 Delineation Soil Sample Locations
- Figure 4 Excavation Soil Sample Locations
- Table 1 Soil Analytical Results
- Attachment 1 Well Record and Log
- Attachment 2 Lithologic/Soil Sampling Log
- Attachment 3 Photographic Log
- Attachment 4 Laboratory Analytical Reports

Received by OCD: 11/5/2021 12:00:19 PM

# FIGUR









Received by OCD: 11/5/2021 12:00:19 PM

# TABLE

#### Table 1

Soil Analytical Results
<b>Tiger Compressor Station</b>
Incident Number NAPP2123231376
Eddy County, New Mexico

Sample ID	Sample Date	Sample Depth (ft bgs)	Benzene (mg/kg)	BTEX (mg/kg)	TPH-DRO (mg/kg)	TPH-GRO (mg/kg)	TPH-ORO (mg/kg)	Total GRO+DRO (mg/kg)	TPH (mg/kg)	Chloride (mg/kg)
NMOCD Table 1 C	losure Criteria (NM	AC 19.15.29)	10	50	NE	NE	NE	1,000	2,500	20,000
Preliminary Assess	ment Samples						-			
SS01	08/26/2021	0.5	5.93	419	448	3,660	<50.0	4,108	4,110	<5.04
SS02	08/26/2021	0.5	5.34	253	283	1,710	<49.9	1,993	1,990	< 5.00
SS03	08/26/2021	0.5	0.371	15	62	161	<49.8	223	223	<4.95
SS04	08/26/2021	0.5	5.31	260	254	2,130	<49.9	2,384	2,380	34.8
Delineation Soil Saı	nples									
PH01	09/30/2021	1	< 0.00199	0.288	287	299	<49,9	586	586	168
PH01B	09/30/2021	3	< 0.00200	0.0825	<50.0	<50.0	<50.0	<50.0	<50.0	346
PH01C	09/30/2021	4	< 0.00200	0.039	<49.9	<49.9	<49.9	<49.9	<50.0	174
PH01E	09/30/2021	6	6 <0.00200	< 0.00200	<49.8	<49.8	49.8 <49.8	<49.8	<50.0	39
PH02	09/30/2021	1	< 0.00202	0.00456	<50.0	<50.0	<50.0	<50.0	<50.0	182
PH02A	09/30/2021	2	<0.00199	0.0153	<49.9	<49.9	<49.9	<49.9	<50.0	285
PH02B	09/30/2021	3	< 0.00200	0.0157	<49.8	<49.8	<49.8	<49.8	<50.0	295
PH02E	09/30/2021	6	< 0.00199	0.00697	<49.8	<49.8	<49.8	<49.8	<50.0	18.7
PH03	09/30/2021	1	< 0.00199	0.378	214	147	<49,9	361	361	76.7
PH03B	09/30/2021	3	0.0283	10.5	655	1,360	<49.9	2,015	2,020	44
PH03C	09/30/2021	4	< 0.00200	0.0194	<50.0	<50.0	<50.0	<50.0	<50.0	183
PH03E	09/30/2021	6	< 0.00199	0.0116	<49.8	<49.8	<49.8	<49.8	<50.0	13.9
PH04	09/30/2021	1	< 0.00198	0.0109	<49.8	<49.8	<49.8	<49.8	<50.0	12.9
PH04A	09/30/2021	2	<0.00199	0.00502	<49.9	<49.9	<49.9	<49.9	<50.0	23.1
PH04B	09/30/2021	3	<0.00199	< 0.00200	<49.9	<49.9	<49.9	<49.9	<50.0	165
PH04E	09/30/2021	6	< 0.00201	< 0.00200	<50.0	<50.0	<50.0	<50.0	<50.0	444

.

#### Table 1

#### Soil Analytical Results Tiger Compressor Station Incident Number NAPP2123231376 Eddy County, New Mexico

Sample ID	Sample DateSample Depth (ft bgs)Benzene (mg/kg)BTEX (mg/kg)TPH-DRO (mg/kg)		_	TPH-GRO (mg/kg)	TPH-ORO (mg/kg)	Total GRO+DRO (mg/kg)	TPH (mg/kg)	Chloride (mg/kg)		
NMOCD Table 1 Cl	osure Criteria (NM	AC 19.15.29)	10	50	NE	NE	NE	1,000	2,500	20,000
PH05	10/01/2021	1	< 0.00200	< 0.00401	<49.9	<49.9	<49.9	<49.9	<49.9	37.3
PH05D	10/01/2021	5	< 0.00200	< 0.00401	<49.8	<49.8	<49.8	<49.8	<49.8	14.1
PH05E	10/01/2021	6	< 0.00202	< 0.00404	<50.0	<50.0	<50.0	<50.0	<50.0	14
PH06	10/01/2021	1	<0.00199	0.0476	<49.9	<49.9	<49.9	<49.9	<49.9	108
PH06A	10/01/2021	2	< 0.00198	0.204	<49.8	<49.8	<49.8	<49.8	<49.8	58.9
PH06B	10/01/2021	3	< 0.00198	0.006	<49.8	<49.8	<49.8	<49.8	<49.8	217
PH06E	10/01/2021	6	<0.00199	< 0.00398	<50.0	<50.0	<50.0	<50.0	<50.0	292
BH01	10/07/2021	1	<0.00199	0.044	124	<49.9	<49.9	124	124	111
BH01A	10/07/2021	2	< 0.00200	0.00518	<49.8	<49.8	<49.8	<49.8	<49.8	210
BH01B	10/07/2021	3	< 0.00198	< 0.00396	<49.9	<49.9	<49.9	<49.9	<49.9	147
BH01C	10/07/2021	4	< 0.00200	< 0.00399	<49.8	<49.8	<49.8	<49.8	<49.8	417
<b>Delineation Surface</b>	Soil Samples									
SS01	10/08/2021	0.5	< 0.00200	< 0.00401	<49.9	<49.9	<49.9	<49.9	<50.0	12.2
SS02	10/08/2021	0.5	< 0.00200	< 0.00400	<50.0	<50.0	<50.0	<50.0	<50.0	33.3
SS03	10/08/2021	0.5	< 0.00199	< 0.00398	<49.8	<49.8 <49.8		<49.8	<49.8	33.3
SS04	10/08/2021	0.5	< 0.00199	< 0.00398	<50.0	<50.0	<50.0	<50.0	<50.0	54.7
SS05	10/08/2021	0.5	< 0.00201	< 0.00402	58.6	<49.9	<49.9	58.6	58.6	29.4
SS06	10/08/2021	0.5	< 0.00198	< 0.00396	<49.8	<49.8	<49.8	<49.8	<49.8	83.1
SS07	10/08/2021	0.5	< 0.00199	< 0.00398	<49.9	<49.9	<49.9	<49.9	<49.9	86.1
Excavation Floor Sa	mples									
FS01	10/07/2021	1.5	< 0.00202	< 0.00403	<49.9	<49.9	<49.9	<49.9	<49.9	30.7
FS02	10/07/2021	4	< 0.00199	< 0.00398	69.7	<50.0	<50.0	69.7	69.7	130
FS03	10/07/2021	1.5	< 0.00202	0.0076	77.2	<49.8	<49.8	77.2	77.2	28.7

#### Table 1

#### Soil Analytical Results Tiger Compressor Station Incident Number NAPP2123231376 Eddy County, New Mexico

Sample ID	Sample Date	Sample Depth (ft bgs)	Benzene (mg/kg)	BTEX (mg/kg)	TPH-DRO (mg/kg)	TPH-GRO (mg/kg)	TPH-ORO (mg/kg)	Total GRO+DRO (mg/kg)	TPH (mg/kg)	Chloride (mg/kg)		
NMOCD Table 1 Clo	osure Criteria (NMA	AC 19.15.29)	10	50	NE	NE	NE	1,000	2,500	20,000		
FS04 10/07/2021		1.5	< 0.00200	< 0.00399	<49.8	<49.8	<49.8	<49.8	<49.8	56.1		
Excavation Sidewall	Excavation Sidewall Samples											
SW01	10/07/2021	0-4	< 0.00201	0.0638	86.7	<50.0	<50.0	86.7	86.7	115		
SW02	10/07/2021	0-4	< 0.00200	0.055	97.7	<49.8	<49.8	97.7	97.7	129		

#### Notes:

ft - feet/foot

mg/kg - milligrams per kilograms

BTEX - benzene, toluene, ethylbenzene, and total xylenes

TPH - total petroleum hydrocarbons

DRO - diesel range organics

GRO - gasoline range organics

ORO - oil range organics

NMOCD - New Mexico Oil Conservation Division

NMAC - New Mexico Administrative Code

< - indicates result is less than the stated laboratory method practical quantitation limit

NE - Not Established

BOLD - indicates results exceed the higher of the background sample result or applicable regulatory standard

Text impacted soil was excavated

Received by OCD: 11/5/2021 12:00:19 PM



# WELL RECORD & LOG office of the state engineer

www.ose.state.nm.us

	OFE BOD NO. (1)		)		WELLTHORSES			OSE EU E NOV	C)				
z	OSE POD NO. (WELL NO.) WELL TAG ID NO. POD 1 NA							OSE FILE NO(S). C-04394					
IIO	WELL OWNER NAME(S)												
CAT	XTO Energy,				PHONE (OPTIONAL) 432-221-7331								
ΓO										OTATE		ZIP	
ELL	WELL OWNER MAILING ADDRESS 6401 Holiday Hill Road									state TX	79707	ZIP	
[M C								Midland					
ANI	WELL		DE	GREES 32	MINUTES 06	SECC	0.68 N						
AL	LOCATION	LA	TITUDE				IN		REQUIRED: ONE TENT	TH OF A S	ECOND		
GENERAL AND WELL LOCATION	(FROM GPS)	LOI	NGITUDE	103	54	45	.59 W	* DATUM REG	QUIRED: WGS 84				
			NG WELL LOCATION TO					SS (SECTION, TO	WNSHJIP, RANGE) WH	ERE AVAI	LABLE		
1.	Unit I Sectior	19, To	ownship 25 South, R	lange 30 Eas	st, Eddy County	, New I	Mexico						
	LICENSE NO.		NAME OF LICENSED	DRILLER					NAME OF WELL DRI	LLING CO	OMPANY		
	1664									ascade D			
	DRILLING STAI	TED	DRILLING ENDED	DEPTH OF CC	OMPLETED WELL (F	T)	BORE HO	LE DEPTH (FT)	DEPTH WATER FIRS	ST ENCOU	NTERED (FT)		
	2/4/202	)	2/5/2020		NA			110		NA			
				_					STATIC WATER LEV	EL IN CO	MPLETED WE	LL (FT)	
Z	COMPLETED W	ELL IS:	ARTESIAN	V DRY HO	LE SHALLO	OW (UNC	ONFINED)			NA			
OIT	DRILLING FLUI	D:	✓ AIR	MUD	MUD ADDITIVES – SPECIFY:				I				
CASING INFORMATION	DRILLING MET	HOD:	ROTARY	HAMMER CABLE TOOL OTHER -				R – SPECIFY: Sonic					
ЧFО	DEPTH (fe	et bgl)		CASING MATERIAL AND/OR				CASING CASING WALL		IC NULL			
GII	DEPTH (leet bgl)         BORE HOLE           FROM         TO         DIAM			GRADE			ASING NECTION			NG WALL CKNESS	SLOT SIZE		
SIN			(inches)		each casing string sections of screen	casing string, and TVPE					nches)	(inches)	
& CA	0	110	6.5	Soil Boring				NA	NA	NA		NA	
S G													
CLU													
DRILLING													
2.1													
	DEPTH (fe	et bgl)	BORE HOLE	LI	IST ANNULAR S	ANNULAR SEAL MATERIAL AND			AMOUNT		METHO	D OF	
IAL	FROM	ТО	DIAM. (inches)	GRA	VEL PACK SIZE	E-RANG	E BY INTE	ERVAL	(cubic feet)		PLACEM	IENT	
MATERIAL													
MAT													
AR I													
UL.													
ANNULAR													
3.													
FOR	OSE INTERNA	L USE			1			WR-2	0 WELL RECORD &	& LOG (	Version 04/3	0/19)	
FILE	E NO.				POD NO	Э.	•	TRN 1	NO.		T		
LOC	ATION							WELL TAG I	D NO		PAGE	1 OF 2	

	DEPTH (1	eet bgl)		COLOR AN	D TYPE OF MATERIAL EN	NCOLIN	TERED -		WA	FED	ESTIMATED
	FROM	ТО	THICKNESS (feet)	INCLUDE WATE	R-BEARING CAVITIES OI plemental sheets to fully de	R FRAC	TURE ZONES	5	BEAR (YES	ING?	YIELD FOR WATER- BEARING
	0	2.5	2.5	SAND dry	well graded, coarse-fine grain	n light k	rown_tan		Y	✔ N	ZONES (gpm)
	2.5	6	3.5	-	ly graded, light brown-brown				Y	✓ N	
	6	9	3		ly graded, light brown-brown				Y	✓ N	
	9	12	3		led, light brown-brown, fine			moder	Y	✓ N	
	12	16	4		led, light brown-brown, fine	-	-		Y	✓ N	
	12	27.5	11.5		ly graded, light brown-brown		-	one gi	Y	✓ N	
4. HYDROGEOLOGIC LOG OF WELL	27.5	36	8.5		light brown-tan, poorly grad				Y	✓ N	
FW				-				1	Y	✓ N	
0 0	36	44.5	8.5	-	, poorly graded, fine-very fir						
CLO	44.5	59.5	15	-	n-tan, no plasticity, non coh			city rec	Y	✔ N	
OGIC	59.5	71	11.5	-	nt brown-brown, moist, no pl				Y	✔ N	
OTO	71	82	11		dry, no plasticity, non cohesi				Y	✔ N	
GE	82	85	3		moist, brown-green gray, low	-	-		Y	✔ N	
DRC	85	87	2	SILTY sand, dr	y, light brown-brown, no pla	sticity, r	on cohesive		Y	🖌 N	
HY	87	95	8	SILTSTONE, dr	y, light brown-brown, clay p	ockets,	low plasticity		Y	✔ N	
4	95	101	6	CLAY, moist, brown-d	ark brown, high plasticity, co	ohesive,	some tan clay	lamina	Y	🖌 N	
	101	105	4	SANDSTONE, tan-ligh	t brown, dry, moderately con	nsolidate	ed, calcareous	cemen	Y	🖌 N	
	105	110	5	CLAY, moist, dark bro	wn-brown, high plasticity, co	ohesive,	trace tan sand,	lamin	Y	🖌 N	
									Y	N	
									Y	N	
									Y	N	
									Y	N	
	METHOD U	SED TO ES	TIMATE YIELD	OF WATER-BEARING	G STRATA:				L ESTIN		0.00
	<b>PUMI</b>		IR LIFT	BAILER OT	HER – SPECIFY: NA			WEL	L YIELD	(gpm):	0.00
NO	WELL TES				A COLLECTED DURING V IOWING DISCHARGE AN						
TEST; RIG SUPERVISIO	MISCELLA	NEOUS INF	ORMATION:	il horing hoolefilled w	ith cuttings and hydrated	honton	ita ahina. Las	. o dom	tad from	I TE on	cita coologist
PER			50	on borning backrinied w	the cuttings and hydrated	Denton	ne emps. Log	g auap			-site geologist.
INS :											
RIG											
EST;	DDINTNAN				VIDED ONSITE SUPERVIS		EWELL CON	STDU		ТИГР ТИ	IAN LICENSEE
5. T]	I KINI NAW	IE(3) OF DI	ALL NO SUPER		VIDED ONSITE SUPERVIS		WELL CON	SIRUC		IIILK II	IAN LICENSEE.
E)					F MY KNOWLEDGE AND IFY THAT THE WELL TAG						
SIGNATURE					OLDER WITHIN 30 DAYS						
LAN											
SIG											
6.		SIGNAT	URE OF DRILLE	R / PRINT SIGNEE 1	NAME	_				DATE	
							N/D 20 11			LOG	
	<u>r ose interi</u> e no.	NAL USE			POD NO.		WR-20 WEI TRN NO.	LL REC	JORD &	LOG (Ve	rsion 04/30/2019)
	CATION				1.00 1.0.	WETT					PAGE 2 OF 2
1						WELL	TAG ID NO.				

Received by OCD: 11/5/2021 12:00:19 PM

WSP USA       BH or PH Name:       PH01       Date: 9-3         508 West Stevens Street Carlsbad, New Mexico 88220       Site Name: Tiger CS       Site Name: Tiger CS         RP or Incident Number: NAPP2123231376       WSP Job Number: 31403236.022.0129         LITHOLOGIC / SOIL SAMPLING LOG       Logged By: BB       Method:         Lat/Long: 32.11862, -103.90859       Field Screening: Hach chloride strips, PID       Hole Diameter: N/A       Total De         Comments: All chloride field screenings include a 40% correction factor M-moist; D-dry; Y-yes; N-no; SAA-same as above       Sample       Depth       V       Lithology/Remarks         90; GU OF       0       GU OF       90; GU OF       0       CCHE       CALICHE, TAN-OFFWHITE, POORLY CON         M       476       15,000       N       PH01       1'       1       SP       SAND, BROWN-DARK BROWN, FINE GRAGRADED, TRACE ROOTS, STRONG H/C OF	Backhoe oth: 6 Feet
Site Value       Site Value       Site Value       Site Value       Site Name: Tiger CS         RP or Incident Number: NAPP2123231376       WSP Job Number: 31403236.022.0129         LitthoLOGIC / SOIL SAMPLING LOG       Logged By: BB       Method:         Lat/Long: 32.11862, -103.90859       Field Screening: Hach chloride strips, PID       Hole Diameter: N/A       Total De         Comments: All chloride field screenings include a 40% correction factor       M-moist; D-dry; Y-yes; N-no; SAA-same as above       Depth (ft bgs)       Depth (ft bgs)       Total De         9) io of do       io do       io do       io do       io do       io do       io do         9) io of do       io do <td< td=""><td>oth: 6 Feet</td></td<>	oth: 6 Feet
Carlsbad, New Mexico 88220         RP or Incident Number: NAPP2123231376         WSP Job Number: 31403236.022.0129         LITHOLOGIC / SOIL SAMPLING LOG       Logged By: BB       Method:         Lat/Long: 32.11862, -103.90859       Field Screening: Hach chloride strips, PID       Hole Diameter: N/A       Total Dependence         Comments: All chloride field screenings include a 40% correction factor       M-moist; D-dry; Y-yes; N-no; SAA-same as above       Total Dependence         an tig by 0 and 0	oth: 6 Feet
LITHOLOGIC / SOIL SAMPLING LOG       Logged By: BB       Method:         Lat/Long: 32.11862, -103.90859       Field Screening: Hach chloride strips, PID       Hole Diameter: N/A       Total Degender         Comments: All chloride field screenings include a 40% correction factor M-moist; D-dry; Y-yes; N-no; SAA-same as above       Method:       Total Degender         Image: Solution of the strips of the screening of the screen	oth: 6 Feet
Lat/Long: 32.11862, -103.90859       Field Screening: Hach chloride strips, PID       Hole Diameter: N/A       Total Department         Comments: All chloride field screenings include a 40% correction factor       M-moist; D-dry; Y-yes; N-no; SAA-same as above       Total Department       Total Department         an tig       ap       ap       ap       ap       Depth       Depth       Total Department         an tig       ap       ap       ap       ap       Comments: All chloride field screenings include a 40% correction factor         M-moist; D-dry; Y-yes; N-no; SAA-same as above       apopting       Depth       Depth       Depth       Depth       Compare the transformed as the	oth: 6 Feet
Hach chloride strips, PID         Comments: All chloride field screenings include a 40% correction factor         M-moist; D-dry; Y-yes; N-no; SAA-same as above       Sample       Depth       Depth       Lithology/Remarks         an tiep to OV       0       0       0       0       0       0       0       0         an tiep to OV       0       0       0       0       0       0       0       0       0       0         an tiep to OV       0	
Comments: All chloride field screenings include a 40% correction factor         M-moist; D-dry; Y-yes; N-no; SAA-same as above       Sample       Depth       Yo       Item to street       Lithology/Remarks         antision       bit of de b	
M-moist; D-dry; Y-yes; N-no; SAA-same as above anny solution anny solution ann	
Y     II     0     CCHE     CALICHE, TAN-OFFWHITE, POORLY CON       (FILL)     H/C ODOR, LIGHT BRWON STAINING, FIL       0.5     0.5       M     476     15,000     N     PH01     1'     1     SP     SAND, BROWN-DARK BROWN, FINE GRA	
Y     II     0     CCHE     CALICHE, TAN-OFFWHITE, POORLY CON       (FILL)     H/C ODOR, LIGHT BRWON STAINING, FIL       0.5     0.5       M     476     15,000     N     PH01     1'     1     SP     SAND, BROWN-DARK BROWN, FINE GRA	
Y     III     0     CCHE     CALICHE, TAN-OFFWHITE, POORLY CON       (FILL)     (FILL)     H/C ODOR, LIGHT BRWON STAINING, FIL       M     476     15,000     N     PH01     1'     1     SP     SAND, BROWN-DARK BROWN, FINE GRA	
Y     II     0     CCHE     CALICHE, TAN-OFFWHITE, POORLY CON       (FILL)     H/C ODOR, LIGHT BRWON STAINING, FIL       0.5     0.5       M     476     15,000     N     PH01     1'     1     SP     SAND, BROWN-DARK BROWN, FINE GRA	
M 476 15,000 N PH01 1' 1 SP SAND, BROWN-DARK BROWN, FINE GRA	
M 476 15,000 N PH01 1' 1 SP SAND, BROWN-DARK BROWN, FINE GRA	
M 476 15,000 N PH01 1' 1 SP SAND, BROWN-DARK BROWN, FINE GRA	L
GRADED, TRACE ROOTS, STRONG H/C C	
	DOR, NO STAINING
M 767 15,000 N PH01A 2' 1 2 SP SAA	
M 588 1,755 N PH01B 3' 3 SP SAA	
M 369 434 N PH01C 4' 4 SP SAND, BROWN-DARK BROWN, FINE GRA	INED, POORLY-
GRADED, TRACE ROOTS, MILD H/C ODO	R, NO STAINING
M 369 12 N PH01D 5' 5 SP SAND, BROWN-DARK BROWN, FINE GRA	INED, POORLY-
GRADED, TRACE ROOTS, TRACE H/C OD	
TRACE LOW PLASTICTY CLAY	
M <124 4.6 N PH01E 6' 6 SP SAND, BROWN-DARK BROWN, FINE GRA	INED. POORLY-
GRADED, TRACE ROOTS, NO H/C ODOR,	
TD @ 6 ft bgs	

	//		١		WS	P USA		BH or PH	Name:	PH02	Date: 9-30-2021
			2	5	08 West S	Stevens S	Street	Site Name	e: Tiger CS		
				Car	Isbad, Ne	w Mexico	88220	RP or Inci	dent Number:	NAPP212	3231376
								WSP Job	Number: 3140	)3236.022.	.0129
		LITH	OLOG	C / SOIL	SAMPL	ING LO	G	Logged B	y: BB		Method: Backhoe
Lat/Lor	ng: 32.118				Field Scre				neter: N/A		Total Depth: 6 Feet
	-				Hach chlo	ride strips,					
				enings includ		prrection fa	ctor				
M-mois	st; D-dry; Y	-yes; N-n	o; SAA	-same as abo	ove		-				
Moisture Content	Chloride (ppm)	Vapor (ppm)	Staining	Sample #	Sample Depth (ft bgs)	Depth (ft bgs)	USCS/Rock Symbol		Litł	hology/R	emarks
					-	0.5		CALICHE, TAN-0 H/C ODOR	OFFWHITE	, POOR	LY CONSOLIDATED, TRACE
Μ	<120	1.2	Ν	PH02	1'	1	SP	SAND, BROWN- GRADED, TRAC			NE GRAINED, POORLY- OR
М	526	3.0	Ν	PH02A	2'	2	SP	SAA			
М	644	1.9	Ν	PH02B	3'	3	SP	SAND, BROWN- GRADED, NO O		OWN, FII	NE GRAINED, POORLY-
М	<120	1.0	Ν	PH02C	4'	4	SP	SAA			
М	<120	1.2	Ν	PH02D	5'	5	SP	SAA FRACE LOW PL			
М	<120	2.5	Ν	PH02E	6'	6	SP	SAA	ASTICITIC		
$\vdash$							TD @ 6	ft bas			

	// '		١		WS	SP USA		BH or PH Name: PH03 Date: 9-30-2021				
\			2	5	08 West	Stevens S	Street	Site Name: Tiger CS				
				Car	lsbad, Ne	w Mexico	88220	RP or Incident Number: NAPP2123231376				
								WSP Job Number: 31403236.022.0129				
		LITH	OLOC	SIC / SOIL	SAMPL	ING LO	G	Logged By: BB Method: Backhoe				
Lat/Lo	ng: 32.118	862, -103.9	90859		Field Scre	ening:		Hole Diameter: N/A Total Depth: 7 Feet				
						ride strips,						
				enings includ -same as ab		prrection fa	ctor					
	-	<i>y y</i>	-, -				×					
Moisture Content	Chloride (ppm)	Vapor (ppm)	Staining	Sample #	Sample Depth (ft bgs)	Depth (ft bgs)	USCS/Rock Symbol	Lithology/Remarks				
			Y			0	CCHE	CALICHE, TAN-OFFWHITE, POORLY CONSOLIDATED, STRONG				
						ľ.	(FILL)	H/C ODOR, LIGHT BROWN STAINING, FILL				
					_	0.5						
М	<120	1,562	Ν	PH03	1'	1	SP	SAND, BROWN-DARK BROWN, FINE GRAINED, POORLY-				
101	\$120	1,002		11100	' <u>-</u>	<u> </u>	01	GRADED, TRACE ROOTS, STRONG H/C ODOR				
					-	Ĺ		, _,				
					_	F						
Μ	<120	1,800	Ν	PH03A	2'	2	SP	SAA				
					-	+						
					-	┢						
М	<120	1,800	Ν	PH03B	3'	3	SP	SAND, BROWN-DARK BROWN, FINE GRAINED, POORLY-				
		,				Ē		GRADED, STRONG H/C ODOR				
						L						
					-	L .						
Μ	<120	46.5	Ν	PH03C	4'	4	SP	SAND, BROWN-DARK BROWN, FINE GRAINED, POORLY-				
					-	+		GRADED, MILD H/C ODOR				
						┢						
М	<120	101.4	Ν	PH03D	5'	5	SP	SAA				
						Ē .						
					_	L						
	100			DUIDOE								
Μ	<120	113.6	Ν	PH03E	6'	6	SP	SAA				
					-	ł		CALICHE, OFF WHITE, WELL CONSOLIDATED, NO ODOR				
						t						
Μ	<120	10.6	Ν	PH03F	7'	7	CCHE	SAA				
					-	Ļ						
								t bao				
$\parallel$						1	D @ 7 ft	n bys				
				$\sim$								
						_						
							_					
							$\searrow$					

			Ν		WS	SP USA		BH or PH Name: PH04 Date: 10-01-2021
			2	5	08 West	Stevens S	Street	Site Name: Tiger CS
				Car	Isbad, Ne	w Mexico	88220	RP or Incident Number: NAPP2123231376
								WSP Job Number: 31403236.022.0129
		LITH	OLOG	GIC / SOIL	. SAMPL	ING LO	G	Logged By: BB Method: Backhoe
Lat/Lo	ng: 32.118				Field Scre		-	Hole Diameter: N/A Total Depth: 7 Feet
	-					ride strips,		
				enings includ -same as abo		prrection fa	ctor	
Moisture Content	Chloride (ppm)	Vapor (ppm)	Staining	Sample #	Sample Depth (ft bgs)	Depth (ft bgs)	USCS/Rock Symbol	Lithology/Remarks
			Y			0 0.5		CALICHE, TAN-OFFWHITE, POORLY CONSOLIDATED, STRONG H/C ODOR, LIGHT BROWN STAINING, FILL
М	<120	425	Ν	PH04	1'	1	SP	SAND, BROWN-DARK BROWN, FINE GRAINED, POORLY- GRADED, TRACE ROOTS, STRONG H/C ODOR
М	<120	210	Ν	PH04A	2'	2	SP	SAA
М	268	25.4	Ν	PH04B	3'	3	SP	SAND, BROWN-DARK BROWN, FINE GRAINED, POORLY- GRADED, MILD H/C ODOR
Μ	588	35.2	Ν	PH04C	4'	4	SP	SAA
М	476	20	Ν	PH04D	5'	5	SP	SAND, BROWN-DARK BROWN, FINE GRAINED, POORLY- GRADED, TRACE H/C ODOR
М	644	103.1	Ν	PH04E	6'	6	CCHE	CALICHE, OFF WHITE, MODERATELY CONSOLIDATED, MILD H/C ODOR
М	<120	8.7	Ν	PH04F	7'	7	CCHE	CALICHE, OFF WHITE, MODERATELY CONSOLIDATED, NO ODOR
$\vdash$					1	<b>I</b> ТІ	D @ 7 ft	t bgs
								-
1								

V					WS	P USA			BH or PH Name:	PH05	Date: 10-01-2021		
				F	508 Mast 9	Stavans S	Stroot		Site Name: Tiger CS	S			
				Car	508 West S Tisbad, Ne	w Mexico	88220		RP or Incident Numb		23231376		
									WSP Job Number: 3				
		LITH		GIC / SOIL	SAMDI		G		Logged By: BB		Method: Backhoe		
Lot/Lo	ng: 32.118			SIC / SUI	Field Scre		9		Hole Diameter: N/A		Total Depth: 6 Feet		
	-			aniana indud	Hach chlo	ride strips,			Hole Diameter. N/A				
				enings includ A-same as ab		prrection ra							
Moisture Content	Chloride (ppm)	Vapor (ppm)	Staining	Sample #	Sample Depth (ft bgs)	Depth (ft bgs)		Lithology/Remarks					
			Y		-	0 0.5	CCHE		ALICHE, TAN-OFFWHITE, POORLY CONSOLIDATED, TRACE /C ODOR, TRACE LIGHT BROWN STAINING				
М	319	0.8	Ν	PH05	1'	1	SP	SAND, BROWN-DARK BROWN, FINE GRAINED, POORLY- GRADED, NO ODOR					
Μ	319	4.7	Ν	PH05A	2'	2	SP	SAA					
Μ	319	4.1	Ν	PH05B	3'	3	SP	SAA					
М	319	9.7	Ν	PH05C	4'	4	SP	SAA					
М	<120	15.7	Ν	PH05D	5'	5	SP	SAA					
М	<120	4.8	N	PH05E	6'	6	CCHE CCHE	ODOR	E, OFF WHITE, M	MODERAT	FELY CONSOLIDATED, NO		
$\square$	<u> </u>			-	-	Т	D @ 6 ft	bgs					

								E	3H or PH Name:	PH06	Date: 10-01-2021
N N					WS	PUSA					
Ì			2	5	08 West S	Stevens S	Street	S	Site Name: Tiger CS	3	
				Car	Isbad, Ne	w Mexico	88220	-	RP or Incident Numb		
									VSP Job Number: 3	1403236.022	
1 - 1/1				SIC / SOIL			G		ogged By: BB		Method: Backhoe
Lat/Lo	ng: 32.118	62, -103.9	90859		Field Scre Hach chlo	-	PID	F	lole Diameter: N/A		Total Depth: 7 Feet
				enings includ	e a 40% co						
M-moi	st; D-dry; \	r∕-yes; N-n	o; SAA	-same as ab	ove			1			
Moisture Content	Chloride (ppm)	Vapor (ppm)	Staining	Sample #	Sample Depth (ft bgs)	Depth (ft bgs)			I	Lithology/F	Remarks
			Y			0.5	CCHE		, TAN-OFFWHI R, TRACE LIGH		LY CONSOLIDATED, STRONG N STAINING
Μ	369	1433	Ν	PH06	1'	1	SP		ROWN-DARK B , STRONG H/C		NE GRAINED, POORLY-
М	470	1660	Ν	PH06A	2'	2	SP	SAA			
М	705	371	Ν	PH06B	3'	3	SP	SAA			
М	476	33.4	Ν	PH06C	4'	4	SP		ROWN-DARK B , MILD H/C ODO		NE GRAINED, POORLY-
М	<120	23.9	Ν	PH06D	5'	5	SP	SAA			
М	<120	36	Ν	PH06E	6'	6	CCHE CCHE	H/C ODO		MODERAT	ELY CONSOLIDATED, TRACE
М	<120	16.4	Ν	PH06F	7'	7	CCHE	CALICHE ODOR	, OFF WHITE, N	MODERAT	ELY CONSOLIDATED, NO
				1	1	T	D @ 7 ft	t bgs			
1											
1											

.

										_		
			N		WS	PUSA		В	BH or PH Name:	BH01	Date: 10-07-2021	
			2	Ę	08 West S	Stevens S	Street	s	Site Name: Tiger CS	S		
				Car	Isbad, Ne	w Mexico	88220		P or Incident Numb		23231376	
									VSP Job Number: 3			
		LITH	OLOC	SIC / SOIL	SAMPL	ING LO	G	L	ogged By: BB, PB		Method: Hand Auger	
Lat/Loi	ng: 32.118	62, -103.9	90859		Field Scre	ening:		Н	lole Diameter: 3.5"		Total Depth: 4 Feet	
Comm	anta, All ak	alarida fia		enings includ	Hach chlo							
	st; D-dry; Y			enings includ	e a 40% co	nection la	CLOT					
Moisture Content	Chloride (ppm)	Vapor (ppm)	Staining	Sample #	Sample Depth (ft bgs)	Depth (ft bgs)	USCS/Rock Symbol			Lithology/	Remarks	
			Ν			0.5		HE CALICHE, TAN, POORLY CONSOLIDATED, MILD H/C ODOR				
Μ	157	500	Ν	BH01	1'	1	SP	SAND, BROWN-DARK BROWN, FINE GRAINED, POORLY- GRADED, MILD H/C ODOR				
М	190	123	Ν	BH01A	2'	2	SP					
М	308	251	N	BH01B	3'	3	SP	TRACE CLAY SAA, TRACE CLAY				
М	454	249	Ν	BH01C	4'	4	SP	SAA				
$\square$	<u> </u>					T	D @ 4 ft	bgs				

Received by OCD: 11/5/2021 12:00:19 PM

# wsp

	PHOTOGRAPHIC LOG	
XTO Energy, INC.	TIGER COMPRESSOR STATION Eddy County, New Mexico	NAPP2123231376

Photo No.Date1August 26, 2021Photo from initiation of the seleaseSite visit afterrelease was discovered. The releaseSite visit afterwas caused by a nipple below the<br/>pressure relief variation onto pad surface.Site visit after



Photo No.	Date
2	August 26, 2021
Photo from init	ial site visit after
release was disco	vered. The release
was caused by a	nipple below the
pressure relief va	lve releasing fluid
onto pao	d surface.



	PHOTOGRAPHIC LOG	
XTO Energy, INC.	TIGER COMPRESSOR STATION	NAPP2123231376
	Eddy County, New Mexico	





Mr. With Changes The

# wsp

	PHOTOGRAPHIC LOG	
XTO Energy, INC.	TIGER COMPRESSOR STATION	NAPP2123231376
	Eddy County, New Mexico	

Photo No.	Date	
5	October 7, 2021	
East facing photo of excavation near pothole PH02.		

Photo No.	Date	
6	October 7, 2021	
Northwest facing photo of		
	ar pothole PH03.	
Received by OCD: 11/5/2021 12:00:19 PM

Released to Imaging: 3/14/2022 1:38:16 PM

Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

# Environment Testing America

# **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

# Laboratory Job ID: 890-1190-1

Laboratory Sample Delivery Group: Eddy County Client Project/Site: Tiger CS

# For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 9/2/2021 3:14:44 PM

Jessica Kramer, Project Manager (432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access **Have a Question?** Ask-The Expert Visit us at:

www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Page 39 of 331

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	8
QC Sample Results	9
QC Association Summary	15
Lab Chronicle	17
Certification Summary	19
Method Summary	20
Sample Summary	21
Chain of Custody	22
Receipt Checklists	24



3

5 6 7

	Definitions/Glossary	
Client: WSP L	JSA Inc.	Job ID: 890-1190-1
Project/Site: T	iger CS	SDG: Eddy County
Qualifiers		
GC VOA		
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
S1-	Surrogate recovery exceeds control limits, low biased.	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	
GC Semi VOA	A	
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
S1-	Surrogate recovery exceeds control limits, low biased.	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	
HPLC/IC		
Qualifier	Qualifier Description	
U	Indicates the analyte was analyzed for but not detected.	
Glossary		
Abbreviation	These commonly used abbreviations may or may not be present in this report.	
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis	
%R	Percent Recovery	
CFL	Contains Free Liquid	
CFU	Colony Forming Unit	
CNF	Contains No Free Liquid	
DER	Duplicate Error Ratio (normalized absolute difference)	
Dil Fac	Dilution Factor	
DL	Detection Limit (DoD/DOE)	
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample	
DLC	Decision Level Concentration (Radiochemistry)	

EDL Estimated Detection Limit (Dioxin)

Limit of Detection (DoD/DOE) LOD LOQ Limit of Quantitation (DoD/DOE)

EPA recommended "Maximum Contaminant Level" MCL

MDA Minimum Detectable Activity (Radiochemistry)

MDC Minimum Detectable Concentration (Radiochemistry)

MDL Method Detection Limit ML

Minimum Level (Dioxin) MPN Most Probable Number

MQL Method Quantitation Limit

NC Not Calculated

Not Detected at the reporting limit (or MDL or EDL if shown) ND

NEG Negative / Absent POS Positive / Present

PQL Practical Quantitation Limit PRES Presumptive

QC Quality Control

RER Relative Error Ratio (Radiochemistry)

Reporting Limit or Requested Limit (Radiochemistry) RL

RPD Relative Percent Difference, a measure of the relative difference between two points

TEF Toxicity Equivalent Factor (Dioxin)

TEQ Toxicity Equivalent Quotient (Dioxin)

TNTC Too Numerous To Count

Job ID: 890-1190-1 SDG: Eddy County

#### Job ID: 890-1190-1

#### Laboratory: Eurofins Xenco, Carlsbad

#### Narrative

Job Narrative 890-1190-1

#### Receipt

The samples were received on 8/27/2021 4:20 PM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 1.4°C

#### GC VOA

Method 8021B: The following samples were diluted due to the nature of the sample matrix: SS01 (890-1190-1), SS02 (890-1190-2), SS03 (890-1190-3) and SS04 (890-1190-4) at 20.0, 20.0, 20.0 and 20.0. Elevated reporting limits (RLs) are provided.

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-7288 and analytical batch 880-7310 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-7363 and analytical batch 880-7359 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Dil Fac

20

500

500

500

500

500

500

#### **Client Sample Results**

RL

0.0399

0.994

0.994

1.99

0.994

1.99

1.99

Limits

70 - 130

70 - 130

Unit

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

D

Prepared

08/31/21 08:55

09/01/21 09:00

09/01/21 09:00

09/01/21 09:00

09/01/21 09:00

09/01/21 09:00

09/01/21 09:00

Prepared

08/31/21 08:55

08/31/21 08:55

Job ID: 890-1190-1
SDG: Eddy County

## Client Sample ID: SS01

Date Collected: 08/26/21 15:30 Date Received: 08/27/21 16:20

Sample Depth: 0.5

Analyte

Benzene

Toluene

o-Xylene

Ethylbenzene

**Xylenes**, Total

**Total BTEX** 

Surrogate

m-Xylene & p-Xylene

4-Bromofluorobenzene (Surr)

1,4-Difluorobenzene (Surr)

Client: WSP USA Inc. Project/Site: Tiger CS

Lab Sample	ID:	890-1190-1
		Matrix: Solid

Analyzed

08/31/21 16:17

09/01/21 15:21

09/01/21 15:21

09/01/21 15:21

09/01/21 15:21

09/01/21 15:21

09/01/21 15:21

Lab Sample ID: 890-1190-2

Matrix: Solid

4 5

Method: 8021B - Volatile Organic Compounds (GC)

Result Qualifier

5.93

112

16.8

247

42.9

290

419

%Recovery Qualifier

347 S1+

139

S1+

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Gasoline Range Organics	3660	F1	50.0	mg/Kg		09/01/21 08:19	09/01/21 12:44	1	2
(GRO)-C6-C10 Diesel Range Organics (Over	448		50.0	mg/Kg		09/01/21 08:19	09/01/21 12:44	1	•
C10-C28) Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		09/01/21 08:19	09/01/21 12:44	1	
Total TPH	4110	F1	50.0	mg/Kg		09/01/21 08:19	09/01/21 12:44	1	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac	
1-Chlorooctane	87		70 130			00/01/21 08.10	00/01/21 12:44	1	

Method: 300.0 - Anions, Ion Chromatogr	aphy - Soluble					
o-Terphenyl	74	70 - 130	09/01/21 08:19	09/01/21 12:44	1	
1-Chlorooctane	87	70 - 130	09/01/21 08:19	09/01/21 12:44	1	

Analyte	Result Qualifie		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.04 U	5.04	mg/Kg			08/31/21 16:47	1

# Client Sample ID: SS02

Date Collected: 08/26/21 15:35 Date Received: 08/27/21 16:20

Sample Depth: 0.5

Method: 8021B - Volatile Organ	nic Compounds (	GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	5.34		0.0398	mg/Kg		08/31/21 08:55	08/31/21 16:37	20
Toluene	63.4		0.396	mg/Kg		09/01/21 09:00	09/01/21 15:42	200
Ethylbenzene	10.8		0.396	mg/Kg		09/01/21 09:00	09/01/21 15:42	200
m-Xylene & p-Xylene	150		0.792	mg/Kg		09/01/21 09:00	09/01/21 15:42	200
o-Xylene	27.7		0.396	mg/Kg		09/01/21 09:00	09/01/21 15:42	200
Xylenes, Total	178		0.792	mg/Kg		09/01/21 09:00	09/01/21 15:42	200
Total BTEX	253		0.792	mg/Kg		09/01/21 09:00	09/01/21 15:42	200
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	145	S1+	70 - 130			08/31/21 08:55	08/31/21 16:37	20
1,4-Difluorobenzene (Surr)	313	S1+	70 - 130			08/31/21 08:55	08/31/21 16:37	20

# **Client Sample Results**

Job ID: 890-1190-1 SDG: Eddy County

Matrix: Solid

5

Lab Sample ID: 890-1190-2

Lab Sample ID: 890-1190-3

Matrix: Solid

20

20

## **Client Sample ID: SS02**

Date Collected: 08/26/21 15:35 Date Received: 08/27/21 16:20

Sample Depth: 0.5

Client: WSP USA Inc.

Project/Site: Tiger CS

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	1710		49.9	mg/Kg		09/01/21 08:19	09/01/21 13:48	1
Diesel Range Organics (Over C10-C28)	283		49.9	mg/Kg		09/01/21 08:19	09/01/21 13:48	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		09/01/21 08:19	09/01/21 13:48	1
Total TPH	1990		49.9	mg/Kg		09/01/21 08:19	09/01/21 13:48	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	87		70 - 130			09/01/21 08:19	09/01/21 13:48	1
o-Terphenyl	82		70 - 130			09/01/21 08:19	09/01/21 13:48	1
Method: 300.0 - Anions, Ion Chro	omatography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
			5.00	mg/Kg			08/31/21 16:52	

#### **Client Sample ID: SS03**

Date Collected: 08/26/21 16:15 Date Received: 08/27/21 16:20 Sample Depth: 0.5

Method: 8021B - Volatile Or	ganic Compounds (G	SC)						
Analyte	Result (	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.371		0.0396	mg/Kg		08/31/21 08:55	08/31/21 16:58	20
Toluene	0.883		0.0396	mg/Kg		08/31/21 08:55	08/31/21 16:58	20
Ethylbenzene	1.62		0.0396	mg/Kg		08/31/21 08:55	08/31/21 16:58	20
m-Xylene & p-Xylene	9.71		0.0792	mg/Kg		08/31/21 08:55	08/31/21 16:58	20
o-Xylene	2.44		0.0396	mg/Kg		08/31/21 08:55	08/31/21 16:58	20
Xylenes, Total	12.2		0.0792	mg/Kg		08/31/21 08:55	08/31/21 16:58	20
Total BTEX	15.0		0.0792	mg/Kg		08/31/21 08:55	08/31/21 16:58	20
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac

Surrogate	%Recovery	Qualifier	Limits		Prepared	Analyzed
4-Bromofluorobenzene (Surr)	133	S1+	70 - 130		08/31/21 08:55	08/31/21 16:58
1,4-Difluorobenzene (Surr)	116		70 - 130	(	08/31/21 08:55	08/31/21 16:58

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	161		49.8	mg/Kg		09/01/21 08:19	09/01/21 14:09	1
Diesel Range Organics (Over C10-C28)	62.0		49.8	mg/Kg		09/01/21 08:19	09/01/21 14:09	1
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		09/01/21 08:19	09/01/21 14:09	1
Total TPH	223		49.8	mg/Kg		09/01/21 08:19	09/01/21 14:09	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	74		70 - 130			09/01/21 08:19	09/01/21 14:09	1
o-Terphenyl	78		70 - 130			09/01/21 08:19	09/01/21 14:09	1
- Method: 300.0 - Anions, Ion Chro	omatography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<4.95	11	4.95	mg/Kg			08/31/21 16:57	1

Method: 8021B - Volatile Organic Compounds (GC)

Result Qualifier

5.31

# **Client Sample Results**

RL

0.0403

Unit

mg/Kg

D

Prepared

08/31/21 08:55

Job ID: 890-1190-1 SDG: Eddy County

## **Client Sample ID: SS04**

Date Collected: 08/26/21 16:20 Date Received: 08/27/21 16:20

Sample Depth: 0.5

Analyte

Benzene

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab Sample	ID:	890-1190-4
		Matrix: Solid

Analyzed

08/31/21 17:18

5

Dil Fac

20

Chloride	34.8		5.00	mg/Kg			08/31/21 17:03	1
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Method: 300.0 - Anions, Ion Chro	omatography -	Soluble						
o-Terphenyl	81		70 - 130			09/01/21 08:19	09/01/21 14:30	1
1-Chlorooctane	85		70 - 130			09/01/21 08:19	09/01/21 14:30	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
Total TPH	2380		49.9	mg/Kg		09/01/21 08:19	09/01/21 14:30	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		09/01/21 08:19	09/01/21 14:30	1
C10-C28)				0.0				
Diesel Range Organics (Over	254		49.9	mg/Kg		09/01/21 08:19	09/01/21 14:30	1
Gasoline Range Organics (GRO)-C6-C10	2130		49.9	mg/Kg		09/01/21 08:19	09/01/21 14:30	1
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Method: 8015B NM - Diesel Rang								
1,4-Difluorobenzene (Surr)	364	S1+	70 - 130			08/31/21 08:55	08/31/21 17:18	20
4-Bromofluorobenzene (Surr)	212	S1+	70 - 130			08/31/21 08:55	08/31/21 17:18	20
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
Total BTEX	260		0.794	mg/Kg		09/01/21 09:00	09/01/21 16:03	200
Xylenes, Total	169		0.794	mg/Kg		09/01/21 09:00	09/01/21 16:03	200
o-Xylene	24.8		0.397	mg/Kg		09/01/21 09:00	09/01/21 16:03	200
m-Xylene & p-Xylene	144		0.794	mg/Kg		09/01/21 09:00	09/01/21 16:03	200
Ethylbenzene	10.7		0.397	mg/Kg		09/01/21 09:00	09/01/21 16:03	200
Toluene	78.6		0.397	mg/Kg		09/01/21 09:00	09/01/21 16:03	200

#### Method: 8021B - Volatile Organic Compounds (GC) Matrix: Solid

-				Percent Surrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1		
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		
880-5629-A-1-D MS	Matrix Spike	96	96		1
880-5629-A-1-E MSD	Matrix Spike Duplicate	114	68 S1-		
890-1187-A-1-E MS	Matrix Spike	182 S1+	93		- 5
890-1187-A-1-F MSD	Matrix Spike Duplicate	157 S1+	103		
890-1190-1	SS01	139 S1+	347 S1+		
890-1190-2	SS02	145 S1+	313 S1+		
890-1190-3	SS03	133 S1+	116		
890-1190-4	SS04	212 S1+	364 S1+		
LCS 880-7262/1-A	Lab Control Sample	104	77		
LCS 880-7288/1-A	Lab Control Sample	107	109		
LCSD 880-7262/2-A	Lab Control Sample Dup	109	86		
LCSD 880-7288/2-A	Lab Control Sample Dup	109	108		
MB 880-7262/5-A	Method Blank	105	100		
MB 880-7288/5-A	Method Blank	105	102		
Surrogate Legend					
BFB = 4-Bromofluorobenz	zene (Surr)				
DFBZ = 1,4-Difluorobenze	ene (Surr)				

# Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

				Percent Surrogate Recovery (Acceptance Li
		1CO1	OTPH1	
ab Sample ID	Client Sample ID	(70-130)	(70-130)	
0-1190-1	SS01	87	74	
0-1190-1 MS	SS01	89	69 S1-	
0-1190-1 MSD	SS01	91	72	
0-1190-2	SS02	87	82	
)-1190-3	SS03	74	78	
0-1190-4	SS04	85	81	
S 880-7363/2-A	Lab Control Sample	126	141 S1+	
SD 880-7363/3-A	Lab Control Sample Dup	87	96	
B 880-7363/1-A	Method Blank	67 S1-	67 S1-	

#### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Job ID: 890-1190-1

SDG: Eddy County

Prep Type: Total/NA

Prep Type: Total/NA

Lab Sample ID: MB 880-7262/5-A

# **QC Sample Results**

Client: WSP USA Inc. Project/Site: Tiger CS

## Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid								onone o			
Matrix: Solid									Prep Ty		
Analysis Batch: 7384									Prep	Batch	: 7262
A 1 4 -					11 14				<b>A</b>		DI
Analyte		Qualifier	RL		Unit	~		repared	Analyze		Dil Fac
Benzene	<0.00200		0.00200		mg/Kg			1/21 09:00			
Toluene	< 0.00200		0.00200		mg/Kg			1/21 09:00			1
Ethylbenzene	<0.00200		0.00200		mg/Kg			1/21 09:00			
m-Xylene & p-Xylene	<0.00400		0.00400		mg/Kg			1/21 09:00			
o-Xylene			0.00200		mg/Kg			1/21 09:00			
Xylenes, Total	<0.00400		0.00400		mg/Kg			1/21 09:00			
Total BTEX	<0.00400	U	0.00400		mg/Kg	9	09/0	1/21 09:00	09/01/21 1	2:55	
	МВ	МВ									
Surrogate	%Recovery	Qualifier	Limits				P	repared	Analyze	ed	Dil Fa
4-Bromofluorobenzene (Surr)	105		70 - 130					1/21 09:00			
1,4-Difluorobenzene (Surr)	100		70 - 130				09/0	1/21 09:00	09/01/21 1	2:55	
Lab Sample ID: LCS 880-726	52/1-A						Client	Sample	ID: Lab Co	ntrol Sa	ample
Matrix: Solid									Prep Ty	/pe: To	tal/N/
Analysis Batch: 7384									Prep	Batch	: 726
			Spike	LCS	LCS				%Rec.		
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits		
				0.07243		mg/Kg		72	70 - 130		
			0.100	0.07243							
Benzene			0.100 0.100	0.07243		mg/Kg		100	70 - 130		
Benzene Toluene								100 101	70 <sub>-</sub> 130 70 - 130		
Benzene Toluene Ethylbenzene			0.100	0.1000		mg/Kg					
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene			0.100 0.100	0.1000 0.1008		mg/Kg mg/Kg mg/Kg		101	70 - 130		
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene			0.100 0.100 0.200	0.1000 0.1008 0.1893		mg/Kg mg/Kg		101 95	70 - 130 70 - 130		
Benzene Toluene Ethylbenzene n-Xylene & p-Xylene p-Xylene	LCS LCS		0.100 0.100 0.200 0.100	0.1000 0.1008 0.1893		mg/Kg mg/Kg mg/Kg		101 95	70 - 130 70 - 130		
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene <b>Surrogate</b>	%Recovery Qua		0.100 0.100 0.200 0.100 <i>Limits</i>	0.1000 0.1008 0.1893		mg/Kg mg/Kg mg/Kg		101 95	70 - 130 70 - 130		
Benzene Foluene Ethylbenzene n-Xylene & p-Xylene p-Xylene Surrogate			0.100 0.100 0.200 0.100	0.1000 0.1008 0.1893		mg/Kg mg/Kg mg/Kg		101 95	70 - 130 70 - 130		
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr)	%Recovery Qua		0.100 0.100 0.200 0.100 <i>Limits</i>	0.1000 0.1008 0.1893		mg/Kg mg/Kg mg/Kg		101 95	70 - 130 70 - 130		
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	%Recovery Qua 104 77		0.100 0.100 0.200 0.100 <i>Limits</i> 70 - 130	0.1000 0.1008 0.1893		mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88	70 - 130 70 - 130 70 - 130		
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72	%Recovery Qua 104 77		0.100 0.100 0.200 0.100 <i>Limits</i> 70 - 130	0.1000 0.1008 0.1893		mg/Kg mg/Kg mg/Kg mg/Kg	ent Sam	101 95 88	70 - 130 70 - 130 70 - 130 70 - 130	-	
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid	%Recovery Qua 104 77		0.100 0.100 0.200 0.100 <i>Limits</i> 70 - 130	0.1000 0.1008 0.1893		mg/Kg mg/Kg mg/Kg mg/Kg	ent Sam	101 95 88	70 - 130 70 - 130 70 - 130 70 - 130 <b>- ab Control</b> <b>Prep Ty</b>	/pe: To	tal/NA
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid	%Recovery Qua 104 77		0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130	0.1000 0.1008 0.1893 0.08763		mg/Kg mg/Kg mg/Kg mg/Kg	ent Sam	101 95 88	70 - 130 70 - 130 70 - 130 .ab Control Prep Ty Prep	-	tal/N/ : 7262
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384	%Recovery Qua 104 77		0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 <b>Spike</b>	0.1000 0.1008 0.1893 0.08763	LCSD	mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88	70 - 130 70 - 130 70 - 130 <b>.ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec.	/pe: To Batch	tal/N/ : 7262 RPI
Benzene Foluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384	%Recovery Qua 104 77		0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 <b>Spike</b> Added	0.1000 0.1008 0.1893 0.08763 LCSD Result	LCSD Qualifier	mg/Kg mg/Kg mg/Kg mg/Kg	ent Sam	101 95 88 ople ID: L	70 - 130 70 - 130 70 - 130 <b>- ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits	Pe: To Batch RPD	tal/N/ : 7262 RPI Limi
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene	%Recovery Qua 104 77		0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 <b>Spike</b> Added 0.100	0.1000 0.1008 0.1893 0.08763 LCSD Result 0.07059		mg/Kg mg/Kg mg/Kg mg/Kg Unit mg/Kg		101 95 88 pple ID: L <u>%Rec</u> 71	70 - 130 70 - 130 70 - 130 <b>.ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130	RPD 3	tal/N/ : 7262 RPI Limi 33
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene	%Recovery Qua 104 77		0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 <b>Spike</b> Added 0.100 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> Result 0.07059 0.08551		mg/Kg mg/Kg mg/Kg mg/Kg <b>Unit</b> mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> <u>%Rec</u> 71 86	70 - 130 70 - 130 70 - 130 <b>.ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130	<b>RPD</b> 3 16	tal/N/ : 726: RPI Lim 3 3
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene	%Recovery Qua 104 77		0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 <b>Spike</b> Added 0.100	0.1000 0.1008 0.1893 0.08763 LCSD Result 0.07059		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 pple ID: L <u>%Rec</u> 71	70 - 130 70 - 130 70 - 130 <b>.ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130	RPD 3	tal/N/ : 726: RPI Lim 3 3
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene	%Recovery Qua 104 77		0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 <b>Spike</b> Added 0.100 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> Result 0.07059 0.08551		mg/Kg mg/Kg mg/Kg mg/Kg <b>Unit</b> mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> <u>%Rec</u> 71 86	70 - 130 70 - 130 70 - 130 <b>Ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	<b>RPD</b> 3 16 10 11	tal/N/ : 726: RPI Limi 3: 3: 3: 3: 3: 3: 3: 3: 3: 3: 3: 3: 3:
Benzene Foluene Ethylbenzene m-Xylene & p-Xylene p-Xylene <b>Surrogate</b> 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Foluene Ethylbenzene m-Xylene & p-Xylene	%Recovery Qua 104 77		0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 <b>Spike</b> Added 0.100 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> Result 0.07059 0.08551 0.09127		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> <u>%Rec</u> 71 86 91	70 - 130 70 - 130 70 - 130 <b>.ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130	Pe: To Batch RPD 3 16 10	tal/N/ : 726: RPI Limi 3: 3: 3: 3: 3: 3: 3: 3: 3: 3: 3: 3: 3:
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene	<u>%Recovery</u> Qua 104 77 262/2-A	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 <b>Spike</b> Added 0.100 0.100 0.100 0.200	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> <b>Result</b> 0.07059 0.08551 0.09127 0.1691		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85	70 - 130 70 - 130 70 - 130 <b>Ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	<b>RPD</b> 3 16 10 11	tal/N/ : 7262 RPI Limi 3: 3: 3: 3: 3: 3:
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene	Qua  262/2-A 	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 70 - 130 0.100 0.100 0.100 0.200 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> <b>Result</b> 0.07059 0.08551 0.09127 0.1691		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85	70 - 130 70 - 130 70 - 130 <b>Ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	<b>RPD</b> 3 16 10 11	tal/N/ : 7262 RPI Limi 3: 3: 3: 3: 3: 3:
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate	Qua 104 77 262/2-A LCSD LCS %Recovery Qua	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 70 - 130 0.100 0.100 0.100 0.200 0.100 0.200 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> <b>Result</b> 0.07059 0.08551 0.09127 0.1691		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85	70 - 130 70 - 130 70 - 130 <b>Ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	<b>RPD</b> 3 16 10 11	tal/N/ : 7262 RPI Limi 3: 3: 3: 3: 3: 3:
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr)	<u>%Recovery</u> Qua 104 77 262/2-A LCSD LCS %Recovery Qua 109	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 70 - 130 0.100 0.100 0.100 0.200 0.100 0.200 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> <b>Result</b> 0.07059 0.08551 0.09127 0.1691		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85	70 - 130 70 - 130 70 - 130 <b>Ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	<b>RPD</b> 3 16 10 11	tal/N/ : 726: RPI Lim 3 3 3 3
Benzene Foluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Foluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofluorobenzene (Surr)	Qua 104 77 262/2-A LCSD LCS %Recovery Qua	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 70 - 130 0.100 0.100 0.100 0.200 0.100 0.200 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> <b>Result</b> 0.07059 0.08551 0.09127 0.1691		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85	70 - 130 70 - 130 70 - 130 <b>Ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	<b>RPD</b> 3 16 10 11	tal/N/ : 7262 RPI Limi 3: 3: 3: 3: 3: 3:
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	%Recovery         Qua           104         77           262/2-A	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 70 - 130 0.100 0.100 0.100 0.200 0.100 0.200 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> <b>Result</b> 0.07059 0.08551 0.09127 0.1691		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85 80	70 - 130 70 - 130 70 - 130 <b>Ab Control</b> <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	<b>RPD</b> 3 16 10 11 9	tal/N/ : 7262 RPI Limi 34 34 34 34 34
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene p-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) 1,4-Difluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 880-5629-A-	%Recovery         Qua           104         77           262/2-A	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 70 - 130 0.100 0.100 0.100 0.200 0.100 0.200 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> <b>Result</b> 0.07059 0.08551 0.09127 0.1691		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85 80	70 - 130 70 - 130 70 - 130 70 - 130 <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	Pe: To Batch RPD 3 16 10 11 9 Matrix	tal/N/ RPI Limi 3: 3: 3: 3: 3: 3: 3: 3: 3: 3: 3: 5: 5: 5: 5: 5: 5: 5: 5: 5: 5: 5: 5: 5:
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 880-5629-A Matrix: Solid	%Recovery         Qua           104         77           262/2-A	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 70 - 130 0.100 0.100 0.100 0.200 0.100 0.200 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>LCSD</b> <b>Result</b> 0.07059 0.08551 0.09127 0.1691		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85 80	70 - 130 70 - 130 70 - 130 70 - 130 <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	Appe: To Batch RPD 3 16 10 11 9 Matrix ype: To	tal/NA : 7262 RPE Limi 36 36 36 36 36 36 36 36 36 36 36 36 36
Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-72 Matrix: Solid Analysis Batch: 7384 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) 1,4-Difluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 880-5629-A- Matrix: Solid Analysis Batch: 7384	%Recovery         Qua           104         77           262/2-A	lifier	0.100 0.200 0.100 <i>Limits</i> 70 - 130 70 - 130 70 - 130 70 - 130 0.100 0.100 0.100 0.200 0.100 0.200 0.100	0.1000 0.1008 0.1893 0.08763 0.08763 <b>Ecsult</b> 0.07059 0.08551 0.09127 0.1691 0.08001		mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg mg/Kg		101 95 88 <b>ople ID: L</b> 71 86 91 85 80	70 - 130 70 - 130 70 - 130 70 - 130 <b>Prep Ty</b> <b>Prep</b> %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	Pe: To Batch RPD 3 16 10 11 9 Matrix	tal/NA : 7262 RPC Limit 35 35 35 35 35 35

Job ID: 890-1190-1 SDG: Eddy County

**Client Sample ID: Method Blank** 

0.0998

0.04812 F1

mg/Kg

48

70 - 130

Eurofins Xenco, Carlsbad

<0.00200 U F1

Benzene

Client: WSP USA Inc.

Project/Site: Tiger CS

# **QC Sample Results**

Job ID: 890-1190-1 SDG: Eddy County

#### Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 880-5629-A-	-1-D MS								Client	Sample ID: N		
Matrix: Solid										Prep Typ	e: To	tal/N
Analysis Batch: 7384										Prep I	<b>Batch</b>	: 726
	Sample	Sam	ple	Spike	MS	MS				%Rec.		
Analyte	Result	Qua	lifier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Toluene	< 0.00200	U F1		0.0998	0.06939	F1	mg/Kg		69	70 - 130		
Ethylbenzene	<0.00200	U F1		0.0998	0.06915	F1	mg/Kg		68	70 - 130		
m-Xylene & p-Xylene	<0.00399	U F1		0.200	0.1322	F1	mg/Kg		66	70 <sub>-</sub> 130		
o-Xylene	<0.00200	U F1		0.0998	0.06388	F1	mg/Kg		63	70 - 130		
	MS	мs										
Surrogate	%Recovery	Qua	lifier	Limits								
4-Bromofluorobenzene (Surr)	96			70 - 130								
1,4-Difluorobenzene (Surr)	96			70 - 130								
Lab Sample ID: 880-5629-A-	-1-F MSD							Client 9	Sample ID	: Matrix Spik	e Dur	olica
Matrix: Solid										Prep Typ		
Analysis Batch: 7384										Prep I		
Analysis Datch. 7504	Sample	Sam	nlo	Spike	MSD	MSD				%Rec.	Jaton	RF
Analyte	Result		•	Added		Qualifier	Unit	D	%Rec	Limits	RPD	Lin
Benzene				0.101	0.05315		mg/Kg		53	70 - 130	10	
Toluene	<0.00200			0.101	0.03313		mg/Kg		55 77	70 - 130 70 - 130	12	
	<0.00200								79			:
Ethylbenzene				0.101	0.08067		mg/Kg			70 - 130	15	
m-Xylene & p-Xylene	< 0.00399			0.202	0.1589		mg/Kg		79	70 - 130	18	
o-Xylene	<0.00200	U F1		0.101	0.07367		mg/Kg		72	70 - 130	14	
	MSD											
Surrogate	%Recovery	Qua	lifier	Limits								
4-Bromofluorobenzene (Surr)	114			70 - 130								
1,4-Difluorobenzene (Surr)	68	S1-		70 - 130								
Lab Sample ID: MB 880-728	8/ <b>5-A</b>								Client S	ample ID: Me	thod	Blar
Matrix: Solid										Prep Typ	e: To	tal/N
Analysis Batch: 7310										Prep I	<b>Batch</b>	: 728
		MB	MB									
Analyte	R	esult	Qualifier	F	٦L	Uni	t	D	Prepared	Analyzed		Dil F
Benzene	<0.0	0200	U	0.002	00	mg	Кg	08	/31/21 08:55	08/31/21 12:	45	
Toluene	<0.0	0200	U	0.0020	00	mg	Кg	08	/31/21 08:55	08/31/21 12:	45	
Ethylbenzene	<0.0	0200	U	0.0020	00	mg	Кg	08	/31/21 08:55	08/31/21 12:	45	
m-Xylene & p-Xylene	<0.0	0400	U	0.0040	00	mg	ΊKg	08	/31/21 08:55	08/31/21 12:	45	
o-Xylene	<0.0	0200	U	0.0020	00	mg		08	/31/21 08:55	08/31/21 12:	45	
Xylenes, Total		0400		0.0040		mg	-	08	/31/21 08:55			
Total BTEX		0400		0.004		mg			/31/21 08:55		45	
		ΜВ	МВ									
Surrogate	%Reco	overy	Qualifier	Limits					Prepared	Analyzed		Dil F
4-Bromofluorobenzene (Surr)		105		70 - 130	)			08	3/31/21 08:55	08/31/21 12:	45	
1,4-Difluorobenzene (Surr)		102		70 - 130	)			08	8/31/21 08:55	08/31/21 12:	45	
Lab Sample ID: LCS 880-72	88/1-A							Clie	nt Sample	ID: Lab Con	trol S	amn
Matrix: Solid								5.10		Prep Typ		
Analysis Batch: 7310										Prep I		
Analysis Datoll. 1910				Spike	1.05	LCS				%Rec.	Jacon	. 120
Analyte				Added		Qualifier	Unit	D	%Rec	Limits		
Benzene				0.100	0.08465	Guanner		<u> </u>	85	70 - 130		
				0.100	0.00405		mg/Kg		00	10 - 150		

Eurofins Xenco, Carlsbad

70 - 130

80

Toluene

0.08005

mg/Kg

0.100

#### **QC Sample Results**

#### Job ID: 890-1190-1 SDG: Eddy County

#### Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: LCS 880-72 Matrix: Solid	88/1-A						Client	Sample	ID: Lab C Prep 1	ontrol S Гуре: To	
Analysis Batch: 7310									Pre	p Batch	: <b>7288</b>
			Spike	LCS	LCS				%Rec.		
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits		
Ethylbenzene			0.100	0.07981		mg/Kg		80	70 - 130		
m-Xylene & p-Xylene			0.200	0.1630		mg/Kg		82	70 - 130		
o-Xylene			0.100	0.08289		mg/Kg		83	70 - 130		
	LCS	LCS									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	107		70 - 130								
1,4-Difluorobenzene (Surr)	109		70 - 130								
Lab Sample ID: LCSD 880-7	′288/2 <b>-</b> ∆					Clie	nt San	nle ID:	Lab Contro	l Samnl	
Matrix: Solid	200/2-4					Oner	in Our	ipic ib.		Гуре: То	
Analysis Batch: 7310										p Batch	
Analysis Batch. 7510			Spike	LCSD	LCSD				%Rec.	p Datch	RPD
Analyte			Added		Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene			0.100	0.08632		mg/Kg		86	70 - 130	2	35
Toluene			0.100	0.08065		mg/Kg		81	70 - 130	- 1	35
Ethylbenzene			0.100	0.08073		mg/Kg		81	70 - 130	1	35
m-Xylene & p-Xylene			0.200	0.1661		mg/Kg		83	70 <sub>-</sub> 130	2	35
o-Xylene			0.100	0.08411		mg/Kg		84	70 - 130	1	35
	LCSD	LCSD									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	109		70 - 130								
1,4-Difluorobenzene (Surr)	108		70 - 130								
Lab Sample ID: 890-1187-A- Matrix: Solid Analysis Batch: 7310	-1-E MS							Client		: Matrix Type: To p Batch	tal/NA

	Sample	Sample	Spike	MS	MS				%Rec.	
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	<0.00202	U F1	0.100	0.05518	F1	mg/Kg		55	70 _ 130	
Toluene	<0.00202	U F1	0.100	0.04081	F1	mg/Kg		40	70 - 130	
Ethylbenzene	0.0105	F1	0.100	0.04669	F1	mg/Kg		36	70 - 130	
m-Xylene & p-Xylene	0.0247	F1	0.200	0.1601	F1	mg/Kg		68	70 - 130	
o-Xylene	0.0159	F1	0.100	0.08001	F1	mg/Kg		64	70 - 130	

	MS	MS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	182	S1+	70 - 130
1,4-Difluorobenzene (Surr)	93		70 - 130

#### Lab Sample ID: 890-1187-A-1-F MSD Matrix: Solid

#### Analysis Batch: 7310 Prep Batch: 7288 Sample Sample Spike MSD MSD %Rec. RPD Result Qualifier %Rec Limit Analyte Added Result Qualifier Limits RPD Unit D Benzene <0.00202 UF1 0.100 0.05962 F1 mg/Kg 59 70 - 130 8 35 <0.00202 UF1 Toluene 0.100 0.04353 F1 43 70 - 130 mg/Kg 6 35 Ethylbenzene 0.0105 F1 0.100 0.05419 F1 mg/Kg 44 70 - 130 15 35 m-Xylene & p-Xylene 0.0247 F1 0.201 0.1898 mg/Kg 82 70 - 130 17 35 0.100 o-Xylene 0.0159 F1 0.09155 mg/Kg 75 70 - 130 13 35

Eurofins Xenco, Carlsbad

Prep Type: Total/NA

Client Sample ID: Matrix Spike Duplicate

5 6

Client: WSP USA Inc.

Project/Site: Tiger CS

#### Job ID: 890-1190-1 SDG: Eddy County

**Client Sample ID: Lab Control Sample** 

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Type: Total/NA

#### Method: 8021B - Volatile Organic Compounds (GC) (Continued)

	MSD	MSD	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	157	S1+	70 - 130
1,4-Difluorobenzene (Surr)	103		70 - 130

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-7363/1-A Matrix: Solid	<b>N</b>					Client Sample ID: Method Bla Prep Type: Total/I			
Analysis Batch: 7359							Prep Bate		
Analysis Datch. 7555	МВ	МВ					Trep Batt		
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Gasoline Range Organics	<50.0	U	50.0	mg/Kg		09/01/21 08:19	09/01/21 11:41	1	
(GRO)-C6-C10									
Diesel Range Organics (Over	<50.0	U	50.0	mg/Kg		09/01/21 08:19	09/01/21 11:41	1	
C10-C28)									
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		09/01/21 08:19	09/01/21 11:41	1	
Total TPH	<50.0	U	50.0	mg/Kg		09/01/21 08:19	09/01/21 11:41	1	
	МВ	МВ							
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac	
1-Chlorooctane	67	S1-	70 - 130			09/01/21 08:19	09/01/21 11:41	1	
o-Terphenyl	67	S1-	70 - 130			09/01/21 08:19	09/01/21 11:41	1	

# Lab Sample ID: LCS 880-7363/2-A Matrix: Solid

Analysis Batch: 7359							Prep Batch: 7363	
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	853.0		mg/Kg		85	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	1213		mg/Kg		121	70 - 130	
C10-C28)								

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	126		70 - 130
o-Terphenyl	141	S1+	70 - 130

#### Lab Sample ID: LCSD 880-7363/3-A Matrix: Solid

Analysis Batch: 7359						Prep Batch: 7363			
	Spike	LCSD	LCSD				%Rec.		RPD
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics	1000	864.0		mg/Kg		86	70 - 130	1	20
(GRO)-C6-C10									
Diesel Range Organics (Over	1000	1068		mg/Kg		107	70 - 130	13	20
C10-C28)									

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	87		70 - 130
o-Terphenyl	96		70 - 130

Lab Sample ID: 890-1190-1 MS

# **QC Sample Results**

MS MS

5638 F1

1239

Result Qualifier

Unit

mg/Kg

mg/Kg

D

%Rec

199

79

Spike

Added

995

995

Limits

70 - 130

Matrix: Solid

(GRO)-C6-C10

Analyte

C10-C28)

Surrogate

1-Chlorooctane

Analysis Batch: 7359

Gasoline Range Organics

Diesel Range Organics (Over

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Sample Sample

3660 F1

MS MS

%Recovery Qualifier

89

448

Result Qualifier

Job ID: 890-1190-1 SDG: Eddy County

Client Sample ID: SS01

%Rec.

Limits

70 - 130

70 - 130

Prep Type: Total/NA

Prep Batch: 7363

5
7
8
9

o-Terphenyl	69	S1-	70 - 130									
	NSD								Client Sa	nple ID:	SS01	
Matrix: Solid									Prep 1	ype: To	tal/NA	
Analysis Batch: 7359									Pre	p Batch	: 7363	
	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD	
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit	
Gasoline Range Organics	3660	F1	998	5715	F1	mg/Kg		206	70 - 130	1	20	÷
(GRO)-C6-C10												
Diesel Range Organics (Over	448		998	1276		mg/Kg		83	70 - 130	3	20	
C10-C28)												
	MSD	MSD										
Surrogate	%Recovery	Qualifier	Limits									
1-Chlorooctane	91		70 - 130									
o-Terphenyl	72		70 - 130									

#### Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-7257/1-A Matrix: Solid Analysis Batch: 7344									Client	Sample ID: N Prep 1		Blank oluble
	МВ	МВ										
Analyte	Result	Qualifier		RL		Unit		D	Prepared	Analyze	d	Dil Fac
Chloride	<5.00	U		5.00		mg/ł	٢g			08/31/21 1	5:44	1
Lab Sample ID: LCS 880-7257/2-A								Clier	nt Sample	e ID: Lab Co	ntrol S	ample
Matrix: Solid										Prep 1	ype: S	oluble
Analysis Batch: 7344												
			Spike		LCS	LCS				%Rec.		
Analyte			Added		Result	Qualifier	Unit	D	%Rec	Limits		
Chloride			250		264.7		mg/Kg		106	90 - 110		
Lab Sample ID: LCSD 880-7257/3-A							CI	ient Sa	mple ID:	Lab Control	Samp	le Dup
Matrix: Solid										Prep 1	ype: S	oluble
Analysis Batch: 7344												
-			Spike		LCSD	LCSD				%Rec.		RPD
Analyte			Added		Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Chloride			250		264.2		mg/Kg		106	90 - 110	0	20

# QC Sample Results

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1190-1 SDG: Eddy County

#### Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: 890-1187- Matrix: Solid	A-1-C MS							Client	Sample ID Prep	: Matrix Type: S	- 1 - C
Analysis Batch: 7344											
	Sample	Sample	Spike	MS	MS				%Rec.		
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Chloride	98.8		249	366.4		mg/Kg		107	90 - 110		
-											
Lab Sample ID: 890-1187- Matrix: Solid Analysis Batch: 7344	A-1-D MSD					CI	ient S	ample ID	D: Matrix Sp Prep	pike Dup Type: S	
Matrix: Solid	A-1-D MSD Sample	Sample	Spike	MSD	MSD	CI	ient S	ample ID			
Matrix: Solid	Sample	Sample Qualifier	Spike Added		MSD Qualifier	CI	ient S	ample ID %Rec	Prep		oluble

# **QC Association Summary**

Client: WSP USA Inc. Project/Site: Tiger CS

Job ID: 890-1190-1 SDG: Eddy County

# **GC VOA**

## Prep Batch: 7262

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1190-1	SS01	Total/NA	Solid	5035	
890-1190-2	SS02	Total/NA	Solid	5035	
890-1190-4	SS04	Total/NA	Solid	5035	
MB 880-7262/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-7262/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-7262/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-5629-A-1-D MS	Matrix Spike	Total/NA	Solid	5035	
880-5629-A-1-E MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	

#### Prep Batch: 7288

880-5629-A-1-D MS	Matrix Spike	Total/NA	Solid	5035	_	_
880-5629-A-1-E MSD	Matrix Spike Duplicate	Total/NA	Solid	5035		8
Prep Batch: 7288						9
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	
890-1190-1	SS01	Total/NA	Solid	5035	/	
890-1190-2	SS02	Total/NA	Solid	5035		
890-1190-3	SS03	Total/NA	Solid	5035		
890-1190-4	SS04	Total/NA	Solid	5035		
MB 880-7288/5-A	Method Blank	Total/NA	Solid	5035		
LCS 880-7288/1-A	Lab Control Sample	Total/NA	Solid	5035		
LCSD 880-7288/2-A	Lab Control Sample Dup	Total/NA	Solid	5035		
890-1187-A-1-E MS	Matrix Spike	Total/NA	Solid	5035		13
890-1187-A-1-F MSD	Matrix Spike Duplicate	Total/NA	Solid	5035		
<u> </u>						

#### Analysis Batch: 7310

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1190-1	SS01	Total/NA	Solid	8021B	7288
890-1190-2	SS02	Total/NA	Solid	8021B	7288
890-1190-3	SS03	Total/NA	Solid	8021B	7288
890-1190-4	SS04	Total/NA	Solid	8021B	7288
MB 880-7288/5-A	Method Blank	Total/NA	Solid	8021B	7288
LCS 880-7288/1-A	Lab Control Sample	Total/NA	Solid	8021B	7288
LCSD 880-7288/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	7288
890-1187-A-1-E MS	Matrix Spike	Total/NA	Solid	8021B	7288
890-1187-A-1-F MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	7288

#### Analysis Batch: 7384

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1190-1	SS01	Total/NA	Solid	8021B	7262
890-1190-2	SS02	Total/NA	Solid	8021B	7262
890-1190-4	SS04	Total/NA	Solid	8021B	7262
MB 880-7262/5-A	Method Blank	Total/NA	Solid	8021B	7262
LCS 880-7262/1-A	Lab Control Sample	Total/NA	Solid	8021B	7262
LCSD 880-7262/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	7262
880-5629-A-1-D MS	Matrix Spike	Total/NA	Solid	8021B	7262
880-5629-A-1-E MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	7262

#### GC Semi VOA

#### Analysis Batch: 7359

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1190-1	SS01	Total/NA	Solid	8015B NM	7363
890-1190-2	SS02	Total/NA	Solid	8015B NM	7363
890-1190-3	SS03	Total/NA	Solid	8015B NM	7363

# **QC Association Summary**

Client: WSP USA Inc. Project/Site: Tiger CS

#### GC Semi VOA (Continued)

#### Analysis Batch: 7359 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1190-4	SS04	Total/NA	Solid	8015B NM	7363
MB 880-7363/1-A	Method Blank	Total/NA	Solid	8015B NM	7363
LCS 880-7363/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	7363
LCSD 880-7363/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	7363
890-1190-1 MS	SS01	Total/NA	Solid	8015B NM	7363
890-1190-1 MSD	SS01	Total/NA	Solid	8015B NM	7363

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1190-1	SS01	Total/NA	Solid	8015NM Prep	-
890-1190-2	SS02	Total/NA	Solid	8015NM Prep	
890-1190-3	SS03	Total/NA	Solid	8015NM Prep	
890-1190-4	SS04	Total/NA	Solid	8015NM Prep	
MB 880-7363/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-7363/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-7363/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1190-1 MS	SS01	Total/NA	Solid	8015NM Prep	
890-1190-1 MSD	SS01	Total/NA	Solid	8015NM Prep	

#### HPLC/IC

#### Leach Batch: 7257

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1190-1	SS01	Soluble	Solid	DI Leach	
890-1190-2	SS02	Soluble	Solid	DI Leach	
890-1190-3	SS03	Soluble	Solid	DI Leach	
890-1190-4	SS04	Soluble	Solid	DI Leach	
MB 880-7257/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-7257/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-7257/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
890-1187-A-1-C MS	Matrix Spike	Soluble	Solid	DI Leach	
890-1187-A-1-D MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	

#### Analysis Batch: 7344

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1190-1	SS01	Soluble	Solid	300.0	7257
890-1190-2	SS02	Soluble	Solid	300.0	7257
890-1190-3	SS03	Soluble	Solid	300.0	7257
890-1190-4	SS04	Soluble	Solid	300.0	7257
MB 880-7257/1-A	Method Blank	Soluble	Solid	300.0	7257
LCS 880-7257/2-A	Lab Control Sample	Soluble	Solid	300.0	7257
LCSD 880-7257/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	7257
890-1187-A-1-C MS	Matrix Spike	Soluble	Solid	300.0	7257
890-1187-A-1-D MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	7257

#### Job ID: 890-1190-1 SDG: Eddy County

5 6

9

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger CS

#### **Client Sample ID: SS01** Date Collected: 08/26/21 15:30

Date Received: 08/27/21 16:20

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			7262	09/01/21 09:00	MR	XEN MID
Total/NA	Analysis	8021B		500	7384	09/01/21 15:21	KL	XEN MID
Total/NA	Prep	5035			7288	08/31/21 08:55	KL	XEN MID
Total/NA	Analysis	8021B		20	7310	08/31/21 16:17	KL	XEN MID
Total/NA	Prep	8015NM Prep			7363	09/01/21 08:19	DM	XEN MID
Total/NA	Analysis	8015B NM		1	7359	09/01/21 12:44	AJ	XEN MID
Soluble	Leach	DI Leach			7257	08/31/21 13:50	СН	XEN MID
Soluble	Analysis	300.0		1	7344	08/31/21 16:47	SC	XEN MID

#### **Client Sample ID: SS02**

Date Collected: 08/26/21 15:35 Date Received: 08/27/21 16:20

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			7262	09/01/21 09:00	MR	XEN MID
Total/NA	Analysis	8021B		200	7384	09/01/21 15:42	KL	XEN MID
Total/NA	Prep	5035			7288	08/31/21 08:55	KL	XEN MID
Total/NA	Analysis	8021B		20	7310	08/31/21 16:37	KL	XEN MID
Total/NA	Prep	8015NM Prep			7363	09/01/21 08:19	DM	XEN MID
Total/NA	Analysis	8015B NM		1	7359	09/01/21 13:48	AJ	XEN MID
Soluble	Leach	DI Leach			7257	08/31/21 13:50	СН	XEN MID
Soluble	Analysis	300.0		1	7344	08/31/21 16:52	SC	XEN MID

#### **Client Sample ID: SS03**

#### Date Collected: 08/26/21 16:15 Date Received: 08/27/21 16:20

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			7288	08/31/21 08:55	KL	XEN MID
Total/NA	Analysis	8021B		20	7310	08/31/21 16:58	KL	XEN MID
Total/NA	Prep	8015NM Prep			7363	09/01/21 08:19	DM	XEN MID
Total/NA	Analysis	8015B NM		1	7359	09/01/21 14:09	AJ	XEN MID
Soluble	Leach	DI Leach			7257	08/31/21 13:50	СН	XEN MID
Soluble	Analysis	300.0		1	7344	08/31/21 16:57	SC	XEN MID

# **Client Sample ID: SS04**

Date Collected: 08/26/21 16:20 Date Received: 08/27/21 16:20

_	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			7262	09/01/21 09:00	MR	XEN MID
Total/NA	Analysis	8021B		200	7384	09/01/21 16:03	KL	XEN MID
Total/NA	Prep	5035			7288	08/31/21 08:55	KL	XEN MID
Total/NA	Analysis	8021B		20	7310	08/31/21 17:18	KL	XEN MID

# Lab Sample ID: 890-1190-3

Lab Sample ID: 890-1190-4

Matrix: Solid

Matrix: Solid

Matrix: Solid

Eurofins Xenco, Carlsbad

#### Job ID: 890-1190-1 SDG: Eddy County

# Lab Sample ID: 890-1190-1 Matrix: Solid

Lab Sample ID: 890-1190-2

Released to Imaging: 3/14/2022 1:38:16 PM

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1190-1 SDG: Eddy County

Matrix: Solid

Lab Sample ID: 890-1190-4

#### Client Sample ID: SS04 Date Collected: 08/26/21 16:20

Date Received: 08/27/21 16:20

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	8015NM Prep			7363	09/01/21 08:19	DM	XEN MID
Total/NA	Analysis	8015B NM		1	7359	09/01/21 14:30	AJ	XEN MID
Soluble	Leach	DI Leach			7257	08/31/21 13:50	СН	XEN MID
Soluble	Analysis	300.0		1	7344	08/31/21 17:03	SC	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

10

## **Accreditation/Certification Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1190-1 SDG: Eddy County

#### Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

uthority	Pr	ogram	Identification Number	Expiration Date
exas	N	ELAP	T104704400-20-21	06-30-22
• ,		ut the laboratory is not certif	ied by the governing authority. This list ma	ay include analytes for v
the agency does not of Analysis Method	fer certification. Prep Method	Matrix	Analyte	
0,		Matrix Solid	Analyte Total TPH	

# **Method Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1190-1 SDG: Eddy County

lethod	Method Description	Protocol	Laboratory
021B	Volatile Organic Compounds (GC)	SW846	XEN MID
015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
0.00	Anions, Ion Chromatography	MCAWW	XEN MID
)35	Closed System Purge and Trap	SW846	XEN MID
15NM Prep	Microextraction	SW846	XEN MID
l Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### Protocol References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Client: WSP USA Inc. Project/Site: Tiger CS

#### Job ID: 890-1190-1 SDG: Eddy County

Client Sample ID	Matrix	Collected	Received	Depth	
SS01	Solid	08/26/21 15:30	08/27/21 16:20		
SS02	Solid	08/26/21 15:35	08/27/21 16:20	0.5	
SS03	Solid	08/26/21 16:15	08/27/21 16:20	0.5	
SS04	Solid	08/26/21 16:20	08/27/21 16:20	0.5	
					1
	SS01 SS02 SS03	SS01     Solid       SS02     Solid       SS03     Solid	SS01         Solid         08/26/21 15:30           SS02         Solid         08/26/21 15:35           SS03         Solid         08/26/21 16:15	SS01         Solid         08/26/21 15:30         08/27/21 16:20           SS02         Solid         08/26/21 15:35         08/27/21 16:20           SS03         Solid         08/26/21 16:15         08/27/21 16:20	SS01         Solid         08/26/21 15:30         08/27/21 16:20         0.5           SS02         Solid         08/26/21 15:35         08/27/21 16:20         0.5           SS03         Solid         08/26/21 16:15         08/27/21 16:20         0.5

<b>Environment Testing</b> Xenco		Houston, TX (281) 240-4200, Dallas, TX (214) 902-0300 Midland, TX (432) 704-5440, San Antonio, TX (210) 509-3334 EL Paso, TX (915) 585-3443, Lubbock, TX (806) 784-1296 Hobbs, NM (575) 392-7550, Carlsbad, NM (575) 988-3199	, TX (214) 902-0300 nio, TX (210) 509-3334 k, TX (806) 794-1296 l, NM (575) 988-3199	Work Order No:	1	2
				www.xenco.com	co.com Page	of
1.	Bill to: (if different)		an Baker	Work	Work Order Comments	
USA	Company Name:	XTO timero	100	Program: UST/PST _ PRP_ Brownfields _ RRC _		
	Address:	SIX4 NG	N Greene St	State of Project: Reporting: Level II   Level III   PST/UST   TRRP	I D PST/UST D TRRP	
2826-201-408 - 112 - 112 - 112 - 112 - 112 - 112 - 112 - 112	Email: Dunna b			Deliverables: EDD	ADaPT D Other:	
tion or	Around		ANALYSIS R	EQUEST	Preservat	Preservative Codes
5	Rush	Pres.			None: NO	DI Water: H <sub>2</sub> O
		) 1)			Cool: Cool	MeOH: Me
Anne Biper 0	TAT starts the day received by	Noc			HCL: HC	HNO3: HN
PO# CC 292765700 1 100000000000000000000000000000000	Wet Ine: Yes No	151			H <sub>3</sub> PO <sub>4</sub> : HP	
Yes No Thermomete	INVA	A 1 99			NaHSO4: NABIS	
Yes No NA		EP	890-1190 Chain of Custody	of Custody	Na <sub>2</sub> S <sub>2</sub> O <sub>3</sub> : NaSO <sub>3</sub>	
Seals: Yes No		(E			NaOH+Ascorbic Acid: SAPC	Acid: SAPC
Sample Identification Matrix Sampled Sampled	Depth Grab/	BTE TPH Chio			Sample Comments	omments
8/24/21	1.5' Anis				NADD2123231376	231396
1 ve/ve/8 5	1					
Kell K. 16/2 5 11423	× × ×					
		Las I				
Total 200.7 / 6010 200.8 / 6020: 8RCRA	13PPM Texas 11	Al Sb As Ba Be B Cd	Ca Cr Co Cu Fe Pb	Mg Mn Mo Ni K Se	SiO <sub>2</sub> Na Sr Ti Sn L	I V Zn
Metal(s) to be analyzed	P / SPLP 6010: 8RC	TCLP/SPLP 6010: 8RCRA Sb As Ba Be Cd Cr Co Cu	Cr Co Cu Pb Mn Mo Ni	Se Ag TI U	Hg: 1631 / 245.1 / 7470 /	7471
Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Eurofins Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of envice. Eurofins Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Service. Eurofins Xenco. A minimum charge of \$85.00 will be applied to each project and a charge of \$5 for each sample submitted to Eurofins Xenco. but not analyzed. These terms will be enforced unless previously negotiations (it is the same terms will be enforced unless previously negotiations).	valid purchase order from ( tot assume any responsibilit and a charge of \$5 for each	lient company to Eurofins Xenc r for any losses or expenses inc ample submitted to Eurofins Xe	o, its affiliates and subcontractors. urred by the client if such losses a snco, but not analyzed. These term	tors. It assigns standard terms and conditions ses are due to circumstances beyond the control terms will be enforced unless previously negotiated	ditions control negotiated.	
Relinquished by: (Signature) Received by: (Signature)	Signature)	Date/Time	Relinquished by: (Signature)	ure) Received by: (Signature)	ure)	Date/Time
· Curra Brans We Cent		8-27-21 14202				
0		4				
5		5				Revised Date: 08/25/2020 Rev. 2020 2

#### 9/2/2021

Page 59 of 331

Chain of Custody

# Received by OCD: 11/5/2021 12:00:19 PM

	Custody Seals Intact Custody Seal No ∆ Yes ∆ No	Relinquished by	Relinquished by	Reinquished by Clare Cup 8.30.21	Empty Kit Relinquished by	Deliverable Requested   II III IV Other (specify)	Possible Hazard Identification Unconfirmed	Note. Since laboratory accreditations are subject to change Eurofins Xonco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC attention immediately. If all requested accreditations are current to date return the signed Chain of Custody attesting to said complicance to Eurofins Xenco LLC.						SS04 (890-1190-4)	SS03 (890-1190-3)	SS02 (890-1190-2)	SS01 (890-1190-1)		Sample Identification - Client ID (Lab ID)		Site	Project Name: Tiger CS	Email	Phone 432-704-5440(Tel)	State, Zip TX, 79701	City Midland	Address 1211 W Florida Ave	Company Eurofins Xenco	Client Contact: Shipping/Receiving	Client Information (Sub Contract Lab)	Carlsbad NM 88220 Phone 575-988-3199 Fax: 575-988-3199	1089 N Canal St.	
		Date/Time.	Date/Time			Primary Deliverable Rank		being analyzed the signed Chain of Cu						8/26/21	8/26/21	8/26/21	8/26/21	$\mathbb{N}$	Sample Date		SSOW#	Project #: 89000048	WO #	PO#.		TAT Requested (days)	Due Date Requested 8/30/2021		Phone	Sampler <sup>.</sup>			
					Date	able Rank		of method a amples must stody attestir						16 20 Mountain	16 15 Mountain	15 35 Mountain	15 30 Mountair	X	Sample Time							ıys)	ă					hain	1
			-			2		nalyte & accredit be shipped back ig to said complic		-								0	Type (C=comp, G=grab)	Sample												offine	1 1
		Company	Company	Company				ation compliar to the Eurofin ance to Eurof						Solid	Solid	Solid	Solid	Preservation Code:	(W=water S=solid O=waste/oll, BT=Tissue, A=Air	Matrix									E-Mail jessic	Lab PM Krame	log l		
					Time.	S	S	nce upon s Xenco ins Xenc										X	Field Fil Perform	2 5000000000000000000000000000000000000	100250-005-005		253.0207041-0-0	<b>)</b>	entiteliterent				E-Mail lessica.kramer@eurofinset.com	Lab PM Kramer Jessica			
	Caol	Rece	Rece	Rec	·	Special Instructions/QC	∏ R	out suf LLC lat o LLC.						×	×	×	×		8015MOC	98-61	Stander La	dahistani	ilindddau yr	TPH	lan a Anna h- tha	uanab-si		Accreditations Required (See not NELAP - Louisiana, NELA	mer@	essica		Í	
	er Tem	Received by:	Received by	lyeday		Instru	Disp eturn	ocontra						×	×	×	х		300_ORG	GFM_28	D/DI_L	EACH	Chiori	de				Requi	)eurof				
	Cooler Temperature(s)		201			ctions	l <b>e Disposal ( A f</b> Return To Client	ct labor / or oth						×	×	×	×		8021B/50	35FP_C	alc B	EX	·····					red (Se na, NF	inset o				
ļ	0		ali		$\mathbb{N}$	~ ~ 1	'A fee lent	atories er instn	-									edenon e									Anal	e note): ELAP	com				
ł	ando		(	$\langle \rangle \rangle \rangle$		Requi	e may	. This uctions					-	-													alysis	<sup>te):</sup> P - Texas			_		
4	Cangother-Remarks			$\mathbb{N}$	$\backslash$	Requirements	be a	sample will be																			Reo	as					
	marks.			$  \setminus ]$		nts	<mark>assessed if san</mark> Disposal By Lab	provid										a ann									Requested		State o New	Carrie			
				,	Viethod		sed if al By	entis f ed An										Consequents									ed		State of Origin New Mexico	- Tracki			
	ŀ	D	Da	<u>_</u> 7₽	Method of Shipment:		samı Lab	orwardı y chanç		+																-			0 7	Carrier Tracking No(s)			
		Date/Time	Date/Time	Date/Time	oment		yles a	ed unde ges to a		+				+																s) <sup>,</sup>			
	ĺ	ÿ	Ű.	[-] 2			□ re ret	er chain Recredit										ingener Lange															
			-				<b>tained long</b> Archive For	ation st		1		annateria d		- <b>4</b> 24-	ر ب <del>ک</del> سی		an e See a se	X	Total Nu	imber c	authorse the	tainer	and the other	тот	im co c		P	<u>م</u> ہے	פיס	<u>8</u> 0			
				à			Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)  Return To Client  Insposal By Lab  Archive For Mon	itody li tatus sh											<i>w</i>		Other <sup>.</sup>	EDA					Preservation Codes	Job # 890-1190-1	<sub>Page</sub> Page 1 of 1	COC No <sup>-</sup> 890-375 -		🔅 eurofins	
			-	A di			er tha	f the lat ould be											pecia			4	ater	MeUH Amchlor Ascorbic Acid	Nitric Acid NaHSO4		ation	¥0-1	of 1	5 1		ofin	
				2			in 1 n	e broug											l Inst			N1				\ <del>-</del> -	Codes						
1			୍ଷ	S S			2	ht										I				N≷	< C ·	ᆟ프로	DTQ ZZZ						Am	7) 5	
Ver 0		ompa	mpa	npa			S B	to Et									1	111	5	- I		Βİ	<u>0</u> 89	<i>"</i> к к	a2 sh	s ș e	- 1	- 1			leri	viro	
Ver 06/08/2		Company	Company	Company			<b>nth)</b> Months	oes not cun to Eurofins										$\ $	ions/N			pH 4-5 other (spec	ICAA	a2S2O3 2SO4 2P Dodec	AsivaOz Na2O4S Na2SO3	Hexane None					America	vironmen	
Ver 06/08/2021		Company	ompany	npany			<b>nth)</b> Months	oes not currently to Eurofins Xenco										$\left  \right $	Special Instructions/Note			pH 4-5 other (specify)	MCAA	a2S2O3 2SO4 SP Dodecabydrad	a204S a2SO3	lexane one					nerica	Finvironmant Tacting	

Page 23 of 25

13

9/2/2021

5

Job Number: 890-1190-1 SDG Number: Eddy County

List Source: Eurofins Xenco, Carlsbad

#### Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1190 List Number: 1

Creator: Clifton, Cloe Question Answer Comment The cooler's custody seal, if present, is intact. True Sample custody seals, if present, are intact. True True The cooler or samples do not appear to have been compromised or tampered with. Samples were received on ice. True Cooler Temperature is acceptable. True Cooler Temperature is recorded. True COC is present. True COC is filled out in ink and legible. True COC is filled out with all pertinent information. True Is the Field Sampler's name present on COC? True There are no discrepancies between the containers received and the COC. True True Samples are received within Holding Time (excluding tests with immediate HTs) True Sample containers have legible labels. Containers are not broken or leaking. True Sample collection date/times are provided. True Appropriate sample containers are used. True Sample bottles are completely filled. True N/A Sample Preservation Verified. True There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs N/A

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

Eurofins Xenco, Carlsbad Released to Imaging: 3/14/2022 1:38:16 PM

14

Job Number: 890-1190-1 SDG Number: Eddy County

List Source: Eurofins Xenco, Midland

List Creation: 08/31/21 01:22 PM

#### Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1190 List Number: 2 Creator: Copeland, Tatiana

<6mm (1/4").

Creator: Copeland, Tatlana		
Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	2.2 / 2.7
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	True	

Received by OCD: 11/5/2021 12:00:19 PM

# 31 2 3 4 5 6 7 8 9 10 11

# 🔅 eurofins

# Environment Testing America

# ANALYTICAL REPORT

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

# Laboratory Job ID: 890-1349-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger cs

# For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/5/2021 4:43:26 PM

Jessica Kramer, Project Manager (432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access **Have a Question?** Ask-The Expert Visit us at: www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Page 64 of 331

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	18
QC Sample Results	20
QC Association Summary	28
Lab Chronicle	33
Certification Summary	38
Method Summary	39
Sample Summary	40
Chain of Custody	41
-	46

# **Definitions/Glossary**

Client: WSP USA Inc. Project/Site: Tiger cs Job ID: 890-1349-1

SDG: 31403236.022.0129

# Qualifiers

GC VOA		
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	_
F2	MS/MSD RPD exceeds control limits	5
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	
GC Semi VO	Α	
Qualifier	Qualifier Description	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	8
HPLC/IC		
Qualifier	Qualifier Description	9
*_	LCS and/or LCSD is outside acceptance limits, low biased.	
U	Indicates the analyte was analyzed for but not detected.	
Glossary		
Abbreviation	These commonly used abbreviations may or may not be present in this report.	

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)

- TEQ Toxicity Equivalent Quotient (Dioxin)
- TNTC Too Numerous To Count

# **Case Narrative**

Job ID: 890-1349-1 SDG: 31403236.022.0129

#### Job ID: 890-1349-1

#### Laboratory: Eurofins Xenco, Carlsbad

Narrative

Job Narrative 890-1349-1

#### Receipt

The samples were received on 10/1/2021 4:40 PM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 5.0°C

#### GC VOA

Method 8021B: Surrogate recovery for the following sample was outside control limits: (880-6736-A-61-F). Evidence of matrix interferences is not obvious.

Method 8021B: Surrogate recovery for the following samples were outside control limits: PH03B (890-1349-15) and (880-6736-A-61-E MSD). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: Surrogate recovery for the following samples were outside control limits: PH03C (890-1349-16) and PH04B (890-1349-22). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

Method 300\_ORGFM\_28D: The laboratory control sample (LCS) associated with preparation batch 880-8857 and 880-8857 and analytical batch 880-8879 was outside acceptance criteria. Re-extraction and/or re-analysis could not be performed; therefore, the data have been reported. The batch matrix spike/matrix spike duplicate (MS/MSD) was within acceptance limits and may be used to evaluate matrix performance.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Matrix: Solid

Job ID: 890-1349-1 SDG: 31403236.022.0129

Lab Sample ID: 890-1349-1

# **Client Sample ID: PH01** Date Collected: 09/30/21 11:00

Client: WSP USA Inc.

Project/Site: Tiger cs

Surrogate

4-Bromofluorobenzene (Surr)

Date Received: 10/01/21 16:40 Sample Depth: 1

	inic Compo	unas (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Benzene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 00:50	
Toluene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 00:50	
Ethylbenzene	0.104		0.00199	mg/Kg		10/04/21 09:44	10/05/21 00:50	
m-Xylene & p-Xylene	0.0370		0.00398	mg/Kg		10/04/21 09:44	10/05/21 00:50	
o-Xylene	0.147		0.00199	mg/Kg		10/04/21 09:44	10/05/21 00:50	
Xylenes, Total	0.184		0.00398	mg/Kg		10/04/21 09:44	10/05/21 00:50	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
4-Bromofluorobenzene (Surr)	201	S1+	70 - 130			10/04/21 09:44	10/05/21 00:50	
1,4-Difluorobenzene (Surr)	79		70 - 130			10/04/21 09:44	10/05/21 00:50	
Method: Total BTEX - Total BT	<b>FEX Calcula</b>	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Total BTEX	0.288		0.00200	mg/Kg			10/04/21 15:27	
Method: 8015 NM - Diesel Rar	nge Organic	s (DRO) (G	C)					
Analyte	• •	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Total TPH	586		50.0	mg/Kg			10/05/21 10:03	
Method: 8015B NM - Diesel Ra	ange Organ	ics (DRO) (	(GC)					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Gasoline Range Organics	299		49.9	mg/Kg		10/04/21 13:45		
(GRO)-C6-C10								
Diesel Range Organics (Over C10-C28)	287		49.9	mg/Kg		10/04/21 13:45	10/04/21 22:34	
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/04/21 22:34	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1-Chlorooctane	120		70 - 130			10/04/21 13:45	10/04/21 22:34	
o-Terphenyl	124		70 - 130			10/04/21 13:45	10/04/21 22:34	
Method: 300.0 - Anions, Ion C	hromatogra	phy - Solu	ble					
	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Analyte								
	168	*_	4.95	mg/Kg			10/05/21 08:52	
Analyte Chloride Client Sample ID: PH01B		*_	4.95	mg/Kg		Lab Samp	10/05/21 08:52	
Chloride Client Sample ID: PH01B ate Collected: 09/30/21 11:40		*-	4.95	mg/Kg		Lab Samp		349-
Chloride Client Sample ID: PH01B ate Collected: 09/30/21 11:40 ate Received: 10/01/21 16:40		*_	4.95	mg/Kg		Lab Samp	le ID: 890-1	349-
Chloride Client Sample ID: PH01B ate Collected: 09/30/21 11:40		*	4.95	mg/Kg		Lab Samp	le ID: 890-1	349-
Chloride Client Sample ID: PH01B ate Collected: 09/30/21 11:40 ate Received: 10/01/21 16:40	168 Inic Compo	unds (GC)	4.95	mg/Kg		Lab Samp	le ID: 890-1	349-3 :: Soli
Chloride Client Sample ID: PH01B ate Collected: 09/30/21 11:40 ate Received: 10/01/21 16:40 ample Depth: 3 Method: 8021B - Volatile Orga	168 Inic Compo		4.95	mg/Kg		Lab Samp	le ID: 890-1	349-3 :: Soli
Chloride Client Sample ID: PH01B ate Collected: 09/30/21 11:40 ate Received: 10/01/21 16:40 ample Depth: 3	168 Inic Compo	unds (GC) Qualifier			D		le ID: 890-1 Matrix	349-3 c: Soli Dil Fa
Chloride Client Sample ID: PH01B ate Collected: 09/30/21 11:40 ate Received: 10/01/21 16:40 ample Depth: 3 Method: 8021B - Volatile Orga Analyte	168 Inic Compor Result	unds (GC) Qualifier	RL	Unit	D	Prepared	le ID: 890-1 Matrix Analyzed	349- c: Soli
Chloride Chloride Chloride ate Collected: 09/30/21 11:40 ate Received: 10/01/21 16:40 ample Depth: 3 Method: 8021B - Volatile Orga Analyte Benzene Toluene	168 Inic Compo Result <0.00200	unds (GC) Qualifier	RL	Unit mg/Kg	D	<b>Prepared</b> 10/04/21 09:44 10/04/21 09:44	le ID: 890-1 Matrix <u>Analyzed</u> 10/05/21 01:10	349-3 C: Solid Dil Fa
Chloride lient Sample ID: PH01B ate Collected: 09/30/21 11:40 ate Received: 10/01/21 16:40 ample Depth: 3 Method: 8021B - Volatile Orga Analyte Benzene Toluene Ethylbenzene	168 mic Compo Result <0.00200 0.00301 0.00439	unds (GC) Qualifier	<b>RL</b> 0.00200 0.00200	Unit mg/Kg mg/Kg mg/Kg	<u>D</u>	<b>Prepared</b> 10/04/21 09:44 10/04/21 09:44 10/04/21 09:44	<b>Analyzed</b> 10/05/21 01:10 10/05/21 01:10	349- c: Soli
Chloride Chloride Client Sample ID: PH01B ate Collected: 09/30/21 11:40 ate Received: 10/01/21 16:40 ample Depth: 3 Method: 8021B - Volatile Orga Analyte Benzene	168 anic Compo Result <0.00200 0.00301	unds (GC) Qualifier	<b>RL</b> 0.00200 0.00200 0.00200	Unit mg/Kg mg/Kg	<u>D</u>	<b>Prepared</b> 10/04/21 09:44 10/04/21 09:44 10/04/21 09:44	Analyzed 10/05/21 01:10 10/05/21 01:10 10/05/21 01:10 10/05/21 01:10	

Eurofins Xenco, Carlsbad

Limits

70 - 130

%Recovery Qualifier

5

# **Client Sample Results**

Job ID: 890-1349-1
SDG: 31403236.022.0129

## Lab Sample ID: 890-1349-3 Matrix: Solid

Date Collected: 09/30/21 11:40 Date Received: 10/01/21 16:40 Sample Depth: 3

**Client Sample ID: PH01B** 

Client: WSP USA Inc. Project/Site: Tiger cs

Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1,4-Difluorobenzene (Surr)	76		70 - 130			10/04/21 09:44	10/05/21 01:10	
Method: Total BTEX - Total B	EX Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Total BTEX	0.0825		0.00200	mg/Kg			10/04/21 15:27	
Method: 8015 NM - Diesel Rar	nge Organic	s (DRO) (0	SC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:03	
Method: 8015B NM - Diesel R	ange Organ	ics (DRO)	(GC)					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/04/21 13:45	10/04/21 23:38	
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/04/21 13:45	10/04/21 23:38	
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/04/21 13:45	10/04/21 23:38	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1-Chlorooctane	114		70 - 130			10/04/21 13:45	10/04/21 23:38	
o-Terphenyl	127		70 - 130			10/04/21 13:45	10/04/21 23:38	
Method: 300.0 - Anions, Ion C	hromatogra	phy - Solu	ıble					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Chloride	346	*_	5.04	mg/Kg			10/05/21 09:14	
lient Sample ID: PH01C						Lob Somn	le ID: 890-1	240

Method: 8021B - Volatile O	rganic Compo	unds (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 01:31	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 01:31	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 01:31	1
m-Xylene & p-Xylene	0.0264		0.00399	mg/Kg		10/04/21 09:44	10/05/21 01:31	1
o-Xylene	0.0126		0.00200	mg/Kg		10/04/21 09:44	10/05/21 01:31	1
Xylenes, Total	0.0390		0.00399	mg/Kg		10/04/21 09:44	10/05/21 01:31	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	131	S1+	70 - 130			10/04/21 09:44	10/05/21 01:31	1
1,4-Difluorobenzene (Surr)	75		70 - 130			10/04/21 09:44	10/05/21 01:31	1
- Method: Total BTEX - Total	BTEX Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0390		0.00200	mg/Kg			10/04/21 15:27	1
- Method: 8015 NM - Diesel F	Range Organic	s (DRO) (0	SC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:03	1

Eurofins Xenco, Carlsbad

**Released to Imaging: 3/14/2022 1:38:16 PM** 

Matrix: Solid

Matrix: Solid

Job ID: 890-1349-1 SDG: 31403236.022.0129

Lab Sample ID: 890-1349-4

#### **Client Sample ID: PH01C** Date Collected: 09/30/21 11:50

# Date Received: 10/01/21 16:40

Sample Depth: 4

Client: WSP USA Inc.

Project/Site: Tiger cs

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/04/21 23:59	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/04/21 23:59	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/04/21 23:59	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	115		70 - 130			10/04/21 13:45	10/04/21 23:59	1
o-Terphenyl	125		70 - 130			10/04/21 13:45	10/04/21 23:59	1

# Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result Qualifi		Unit	D	Prepared	Analyzed	Dil Fac
Chloride	174 *-	4.98	mg/Kg			10/05/21 09:21	1

# **Client Sample ID: PH01E**

#### Date Collected: 09/30/21 12:20 Date Received: 10/01/21 16:40 Sample Depth: 6

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 01:51	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 01:51	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 01:51	1
m-Xylene & p-Xylene	<0.00400	U	0.00400	mg/Kg		10/04/21 09:44	10/05/21 01:51	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 01:51	1
Xylenes, Total	<0.00400	U	0.00400	mg/Kg		10/04/21 09:44	10/05/21 01:51	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	133	S1+	70 - 130			10/04/21 09:44	10/05/21 01:51	1
1,4-Difluorobenzene (Surr)	78		70 - 130			10/04/21 09:44	10/05/21 01:51	1
Method: Total BTEX - Total B	TEX Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00200	U	0.00200	mg/Kg			10/04/21 15:27	1
Method: 8015 NM - Diesel Rai	nge Organic	s (DRO) (0	SC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	1
Method: 8015B NM - Diesel R	ange Organ	ics (DRO)	(GC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.8	U	49.8	mg/Kg		10/04/21 13:45	10/05/21 00:20	1
Diesel Range Organics (Over C10-C28)	<49.8	U	49.8	mg/Kg		10/04/21 13:45	10/05/21 00:20	1
	<10.0	U	49.8	mg/Kg		10/04/21 13:45	10/05/21 00:20	1
Oll Range Organics (Over C28-C36)	<49.8	0						
	<49.6 %Recovery		Limits			Prepared	Analyzed	Dil Fac
Oll Range Organics (Over C28-C36)  Surrogate 1-Chlorooctane			Limits 70 - 130			<b>Prepared</b> 10/04/21 13:45	Analyzed 10/05/21 00:20	Dil Fac

		Client	Sample Re	esults				
Client: WSP USA Inc. Project/Site: Tiger cs						SDG	Job ID: 890- 31403236.02 :	
Client Sample ID: PH01E Date Collected: 09/30/21 12:20 Date Received: 10/01/21 16:40 Sample Depth: 6						Lab Samp	le ID: 890-1 Matrix	349-6 : Solid
_ Method: 300.0 - Anions, Ion C Analyte	-	phy - Solı Qualifier	ıble RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	39.0	*_	4.95	mg/Kg			10/05/21 09:28	1
Client Sample ID: PH02 Date Collected: 09/30/21 12:40 Date Received: 10/01/21 16:40 Sample Depth: 1						Lab Samp	le ID: 890-1 Matrix	349-7 :: Solid
Method: 8021B - Volatile Orga					_	<b>_</b> .		
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed 10/05/21 02:12	Dil Fac
Benzene Toluene	<0.00202		0.00202	mg/Kg		10/04/21 09:44		1
	<0.00202		0.00202 0.00202	mg/Kg		10/04/21 09:44	10/05/21 02:12 10/05/21 02:12	1
Ethylbenzene m-Xylene & p-Xylene	<0.00202			mg/Kg			10/05/21 02:12	1
	< 0.00403	0	0.00403	mg/Kg			10/05/21 02:12	1
o-Xylene	0.00456		0.00202 0.00403	mg/Kg			10/05/21 02:12	1
Xylenes, Total	0.00456		0.00403	mg/Kg		10/04/21 09.44	10/05/21 02.12	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	135	S1+	70 - 130			10/04/21 09:44	10/05/21 02:12	1
1,4-Difluorobenzene (Surr)	80		70 - 130			10/04/21 09:44	10/05/21 02:12	1
	TEX Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00456		0.00200	mg/Kg			10/04/21 15:27	1
Method: 8015 NM - Diesel Rai								
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	1
	ange Organ	ics (DRO)	(GC)					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/04/21 13:45	10/05/21 00:41	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/04/21 13:45	10/05/21 00:41	1
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/04/21 13:45	10/05/21 00:41	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	109		70 - 130			10/04/21 13:45	10/05/21 00:41	1
o-Terphenyl	120		70 - 130			10/04/21 13:45	10/05/21 00:41	1
_ Method: 300.0 - Anions, Ion C	hromatogra	nhy - Solu	ıble					
-	-							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac

Job ID: 890-1349-1 SDG: 31403236.022.0129

# Project/Site: Tiger cs **Client Sample ID: PH02A**

Client: WSP USA Inc.

#### Date Collected: 09/30/21 13:00 Date Received: 10/01/21 16:40 Sample Depth: 2

Lab Sample ID: 890-1349-8

Matrix: Solid

Method: 8021B - Volatile Orga Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 02:32	1
Toluene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 02:32	1
Ethylbenzene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 02:32	1
m-Xylene & p-Xylene	0.0103		0.00398	mg/Kg		10/04/21 09:44	10/05/21 02:32	1
o-Xylene	0.00500		0.00199	mg/Kg		10/04/21 09:44	10/05/21 02:32	1
Xylenes, Total	0.0153		0.00398	mg/Kg		10/04/21 09:44	10/05/21 02:32	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	133	S1+	70 - 130			10/04/21 09:44	10/05/21 02:32	1
1,4-Difluorobenzene (Surr)	75		70 - 130			10/04/21 09:44	10/05/21 02:32	1
Method: Total BTEX - Total BT	EX Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0153		0.00200	mg/Kg			10/04/21 15:27	1
Method: 8015 NM - Diesel Ran					_			
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	1
Method: 8015B NM - Diesel Ra	• •		• •					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/05/21 01:02	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/05/21 01:02	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/05/21 01:02	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	111		70 - 130			10/04/21 13:45	10/05/21 01:02	1
o-Terphenyl	123		70 - 130			10/04/21 13:45	10/05/21 01:02	1
Method: 300.0 - Anions, Ion C								
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	285	*_	4.99	mg/Kg			10/05/21 09:57	1
lient Sample ID: PH02B						Lab Samp	le ID: 890-1	
ate Collected: 09/30/21 13:20							Matrix	: Solid
ate Received: 10/01/21 16:40 ample Depth: 3								
• •								
Method: 8021B - Volatile Orga Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200		0.00200	mg/Kg		10/04/21 09:44	10/05/21 02:53	1
	<0.00200		0.00200	mg/Kg		10/04/21 09:44	10/05/21 02:53	1
Toluene						10/04/21 09:44		
Toluene Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09.44	10/05/21 02:53	1
Ethylbenzene		U		mg/Kg mg/Kg			10/05/21 02:53	1 1
Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene	<0.00200 0.00951 0.00616	U	0.00200 0.00400 0.00200	mg/Kg mg/Kg mg/Kg		10/04/21 09:44		

%Recovery Qualifier Limits 4-Bromofluorobenzene (Surr) 130 70 - 130

Eurofins Xenco, Carlsbad

Analyzed

10/04/21 09:44 10/05/21 02:53

Prepared

Surrogate

Dil Fac

# **Client Sample Results**

Job ID: 890-1349-1
SDG: 31403236.022.0129

## Lab Sample ID: 890-1349-9 Matrix: Solid

Date Collected: 09/30/21 13:20 Date Received: 10/01/21 16:40 Sample Dopth: 3

**Client Sample ID: PH02B** 

Client: WSP USA Inc. Project/Site: Tiger cs

Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1,4-Difluorobenzene (Surr)	75		70 - 130			10/04/21 09:44	10/05/21 02:53	
Method: Total BTEX - Total B	<b>FEX</b> Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Total BTEX	0.0157		0.00200	mg/Kg			10/04/21 15:27	
Method: 8015 NM - Diesel Rar	nge Organic	s (DRO) (0	SC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	
Mothody 9015P NM Dissol P								
Method: 8015B NM - Diesel Ra Analyte		Qualifier	(GC) RL	Unit	D	Prepared	Analyzed	Dil Fa
Gasoline Range Organics	<49.8		49.8	mg/Kg		10/04/21 13:45	10/05/21 01:23	
(GRO)-C6-C10	10.0	0	10.0	ing/itg		10/0 //21 10:10	10,00,2101.20	
Diesel Range Organics (Over	<49.8	U	49.8	mg/Kg		10/04/21 13:45	10/05/21 01:23	
C10-C28)								
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/04/21 13:45	10/05/21 01:23	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1-Chlorooctane	115		70 - 130			10/04/21 13:45	10/05/21 01:23	
o-Terphenyl	127		70 - 130			10/04/21 13:45	10/05/21 01:23	
Method: 300.0 - Anions, Ion C	hromatogra	phy - Solu	ble					
Analyte	-	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Chloride	295	*_	4.98	mg/Kg			10/05/21 10:04	

#### Sample Depth: 6

Method: 8021B - Volatile O Analyte	•	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 03:13	1
Toluene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 03:13	1
Ethylbenzene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 03:13	1
m-Xylene & p-Xylene	0.00415		0.00398	mg/Kg		10/04/21 09:44	10/05/21 03:13	1
o-Xylene	0.00282		0.00199	mg/Kg		10/04/21 09:44	10/05/21 03:13	1
Xylenes, Total	0.00697		0.00398	mg/Kg		10/04/21 09:44	10/05/21 03:13	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	133	S1+	70 - 130			10/04/21 09:44	10/05/21 03:13	1
1,4-Difluorobenzene (Surr)	78		70 - 130			10/04/21 09:44	10/05/21 03:13	1
- Method: Total BTEX - Total	BTEX Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00697		0.00200	mg/Kg			10/04/21 15:27	1
- Method: 8015 NM - Diesel I	Range Organic	s (DRO) (0	SC)					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	1

Eurofins Xenco, Carlsbad

ruge /2 0J 551
Job ID: 890-1349-1 SDG: 31403236.022.0129

#### **Client Sample ID: PH02E** Date Collected: 09/30/21 14:15

## Lab Sample ID: 890-1349-12

Matrix: Solid

Date Received: 10/01/21 16:40 Sample Depth: 6

Client: WSP USA Inc.

Project/Site: Tiger cs

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.8	U	49.8	mg/Kg		10/04/21 13:45	10/05/21 01:44	1
Diesel Range Organics (Over C10-C28)	<49.8	U	49.8	mg/Kg		10/04/21 13:45	10/05/21 01:44	1
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/04/21 13:45	10/05/21 01:44	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	120		70 - 130			10/04/21 13:45	10/05/21 01:44	1
o-Terphenyl	131	S1+	70 - 130			10/04/21 13:45	10/05/21 01:44	1

#### Method: 300.0 - Anions, Ion Chromatography - Soluble Analvte **Result Qualifier** ы Unit Prenared

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	18.7	*_	5.00	mg/Kg			10/05/21 10:33	1
Client Sample ID: PH03					L	ab Sampl	e ID: 890-13	49-13

#### **Client Sample ID: PH03**

#### Date Collected: 09/30/21 14:30 Date Received: 10/01/21 16:40 Sample Depth: 1

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 03:33	1
Toluene	0.00605		0.00199	mg/Kg		10/04/21 09:44	10/05/21 03:33	1
Ethylbenzene	0.119		0.00199	mg/Kg		10/04/21 09:44	10/05/21 03:33	1
m-Xylene & p-Xylene	0.0839		0.00398	mg/Kg		10/04/21 09:44	10/05/21 03:33	1
o-Xylene	0.169		0.00199	mg/Kg		10/04/21 09:44	10/05/21 03:33	1
Xylenes, Total	0.253		0.00398	mg/Kg		10/04/21 09:44	10/05/21 03:33	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	190	S1+	70 - 130			10/04/21 09:44	10/05/21 03:33	1
1,4-Difluorobenzene (Surr)	79		70 - 130			10/04/21 09:44	10/05/21 03:33	1
Method: Total BTEX - Total B	<b>FEX Calcula</b>	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.378		0.00200	mg/Kg			10/04/21 15:27	1
Method: 8015 NM - Diesel Rar	nge Organic	s (DRO) (G	SC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	361		50.0	mg/Kg			10/05/21 10:19	1
Method: 8015B NM - Diesel Ra	ange Organ	ics (DRO)	(GC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	147		49.9	mg/Kg		10/04/21 13:45	10/05/21 02:06	1
Diesel Range Organics (Over C10-C28)	214		49.9	mg/Kg		10/04/21 13:45	10/05/21 02:06	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/05/21 02:06	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	117		70 - 130			10/04/21 13:45	10/05/21 02:06	1

		Client	Sample Re	esults				
Client: WSP USA Inc.							Job ID: 890-	1349-1
Project/Site: Tiger cs						SDG	: 31403236.02	22.0129
Client Sample ID: PH03 Date Collected: 09/30/21 14:30 Date Received: 10/01/21 16:40 Sample Depth: 1					L	ab Sample.	e ID: 890-13 Matrix	8 <b>49-13</b> :: Solid
Method: 300.0 - Anions, Ion C		phy - Solu Qualifier		11:4		Drenered	Analyzad	Dil Fac
Analyte Chloride	Result 76.7			Unit mg/Kg	D	Prepared	Analyzed 10/05/21 10:40	
L_ 	70.7		0.00	ing/itg				
Client Sample ID: PH03B Date Collected: 09/30/21 15:00 Date Received: 10/01/21 16:40 Sample Depth: 3					L	ab Sample.	e ID: 890-13 Matrix	349-15 :: Solid
Method: 8021B - Volatile Org								
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	0.0283		0.00201	mg/Kg		10/04/21 09:44	10/05/21 03:54	1
Toluene	0.384		0.200	mg/Kg		10/04/21 13:33	10/05/21 15:29	100
Ethylbenzene	5.17		0.200	mg/Kg		10/04/21 13:33	10/05/21 15:29	100
m-Xylene & p-Xylene	0.648		0.00402	mg/Kg			10/05/21 03:54	1
o-Xylene	4.26		0.200	mg/Kg			10/05/21 15:29	100
Xylenes, Total	20.4		0.399	mg/Kg		10/04/21 13:33	10/05/21 15:29	100
Surrogate	%Recovery		Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)		S1+	70 - 130			10/04/21 09:44	10/05/21 03:54	1
1,4-Difluorobenzene (Surr)	119		70 - 130			10/04/21 09:44	10/05/21 03:54	1
Method: Total BTEX - Total B					_	_		
Analyte		Qualifier		Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	10.5		0.00200	mg/Kg			10/04/21 15:27	1
Method: 8015 NM - Diesel Ra Analyte		S (DRO) (C Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	2020		50.0	mg/Kg			10/05/21 10:19	1
Method: 8015B NM - Diesel R	ange Organ	ics (DRO)	(GC)					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	1360		49.9	mg/Kg		10/04/21 13:45	10/05/21 02:27	1
Diesel Range Organics (Over C10-C28)	655		49.9	mg/Kg		10/04/21 13:45	10/05/21 02:27	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/04/21 13:45	10/05/21 02:27	1
Surrogate	%Recovery		Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane		S1+	70 - 130			10/04/21 13:45	10/05/21 02:27	1
o-Terphenyl	128		70 - 130			10/04/21 13:45	10/05/21 02:27	1
Method: 300.0 - Anions, Ion C					_	<b>_</b> .		
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	44.0	*_	4.98	mg/Kg			10/05/21 10:47	1

5

Job ID: 890-1349-1 SDG: 31403236.022.0129

# Project/Site: Tiger cs Client Sample ID: PH03C

Client: WSP USA Inc.

#### Date Collected: 09/30/21 15:10 Date Received: 10/01/21 16:40 Sample Depth: 4

#### Lab Sample ID: 890-1349-16

Matrix: Solid

Analyte	nic Compo Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil F
Benzene	<0.00200		0.00200	mg/Kg		10/04/21 09:44	10/05/21 05:15	
Foluene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 05:15	
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 05:15	
m-Xylene & p-Xylene	0.0138		0.00399	mg/Kg			10/05/21 05:15	
o-Xylene	0.00564		0.00200	mg/Kg			10/05/21 05:15	
Xylenes, Total	0.0194		0.00399	mg/Kg			10/05/21 05:15	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil F
4-Bromofluorobenzene (Surr)	127	Quanner	70 - 130			10/04/21 09:44	10/05/21 05:15	
1,4-Difluorobenzene (Surr)	72		70 - 130				10/05/21 05:15	
Method: Total BTEX - Total B	FX Calcula	tion						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil F
Total BTEX	0.0194		0.00200	mg/Kg			10/04/21 15:27	
Method: 8015 NM - Diesel Rar	nge Organic	s (DRO) (0	SC)					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil F
otal TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	
Method: 8015B NM - Diesel Ra	ango Organ	ics (DRO)	(6C)					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil F
Basoline Range Organics	<50.0		50.0	mg/Kg		10/04/21 08:38	10/04/21 19:00	
GRO)-C6-C10	400.0	0	50.0	ing/itg		10/04/21 00:00	10/04/21 13:00	
Diesel Range Organics (Over	<50.0	U	50.0	mg/Kg		10/04/21 08:38	10/04/21 19:00	
C10-C28) Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/04/21 08:38	10/04/21 19:00	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil I
I-Chlorooctane	121		70 - 130			10/04/21 08:38	10/04/21 19:00	
p-Terphenyl	134	S1+	70 - 130			10/04/21 08:38	10/04/21 19:00	
Method: 300.0 - Anions, Ion C	hromatogra	iphy - Solu	ble					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil F
· · · · · · · · · · · · · · · · · · ·	183	*_	4.99	mg/Kg			10/05/21 10:54	
-	105							
hloride	100				L	ab Sample	D: 890-13	49-
Chloride lient Sample ID: PH03E	105				L	ab Sample.	D: 890-13 Matrix	
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40	105				L	ab Sample		
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40	100				L	ab Sample.		
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40 ample Depth: 6					L	ab Sample.		
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40 ample Depth: 6 Method: 8021B - Volatile Orga	nic Compo		RL	Unit	L	ab Sample.		
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40 ample Depth: 6 Method: 8021B - Volatile Orga Analyte	nic Compo	<mark>unds (GC)</mark> Qualifier	<b>RL</b> 0.00199	<b>Unit</b> mg/Kg			Matrix	:: <b>So</b> l
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40 ample Depth: 6 Method: 8021B - Volatile Orga Analyte Benzene	nic Compo Result	unds (GC) Qualifier U				Prepared	Matrix Analyzed	:: <b>So</b> l
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40 ample Depth: 6 Method: 8021B - Volatile Orga Analyte Benzene Foluene	nic Compo Result <0.00199	unds (GC) Qualifier U U	0.00199	mg/Kg		Prepared 10/04/21 09:44 10/04/21 09:44	Matrix Analyzed 10/05/21 05:36	:: <b>So</b> l
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40 ample Depth: 6 Method: 8021B - Volatile Orga Analyte Benzene Foluene Ethylbenzene	nic Compo Result <0.00199 <0.00199	unds (GC) Qualifier U U	0.00199	mg/Kg mg/Kg		Prepared 10/04/21 09:44 10/04/21 09:44 10/04/21 09:44	Matrix Analyzed 10/05/21 05:36 10/05/21 05:36	:: <b>So</b> l
Chloride lient Sample ID: PH03E ate Collected: 09/30/21 15:45 ate Received: 10/01/21 16:40 ample Depth: 6 Method: 8021B - Volatile Orga Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene	anic Compo Result <0.00199 <0.00199 <0.00199	unds (GC) Qualifier U U	0.00199 0.00199 0.00199	mg/Kg mg/Kg mg/Kg		Prepared 10/04/21 09:44 10/04/21 09:44 10/04/21 09:44 10/04/21 09:44	Matrix Analyzed 10/05/21 05:36 10/05/21 05:36 10/05/21 05:36	:: <b>So</b> l

Prepared	Analyzed	Dil Fac
10/04/21 09:44	10/05/21 05:36	1

Eurofins Xenco, Carlsbad

Limits

70 - 130

%Recovery Qualifier

135 S1+

Surrogate

4-Bromofluorobenzene (Surr)

**Client Sample ID: PH03E** 

#### **Client Sample Results**

Job ID: 890-1349-1
SDG: 31403236.022.0129

# Lab Sample ID: 890-1349-18

Matrix: Solid

5

Date Collected: 09/30/21 15:45 Date Received: 10/01/21 16:40 Sample Depth: 6

Client: WSP USA Inc. Project/Site: Tiger cs

Surrogate	%Recoverv	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1,4-Difluorobenzene (Surr)	76		70 - 130			10/04/21 09:44	10/05/21 05:36	
Method: Total BTEX - Total B	<b>FEX Calcula</b>	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Total BTEX	0.0116		0.00200	mg/Kg			10/04/21 15:27	
Method: 8015 NM - Diesel Rar	nge Organic	s (DRO) (0	SC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	
Method: 8015B NM - Diesel Ra	ange Organ	ics (DRO)	(GC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Gasoline Range Organics (GRO)-C6-C10	<49.8	U	49.8	mg/Kg		10/04/21 08:38	10/04/21 19:21	
Diesel Range Organics (Over C10-C28)	<49.8	U	49.8	mg/Kg		10/04/21 08:38	10/04/21 19:21	
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/04/21 08:38	10/04/21 19:21	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1-Chlorooctane	114		70 - 130			10/04/21 08:38	10/04/21 19:21	
o-Terphenyl	120		70 - 130			10/04/21 08:38	10/04/21 19:21	1
Method: 300.0 - Anions, Ion C	hromatogra	iphy - Solu	ble					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Chloride	13.9	*_	5.05	mg/Kg			10/05/21 11:15	1
Client Sample ID: PH04 pate Collected: 10/01/21 09:30 pate Received: 10/01/21 16:40 pample Depth: 1					L	ab Sample.	e ID: 890-13 Matrix	

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00198	U	0.00198	mg/Kg		10/04/21 09:44	10/05/21 05:56	1
Toluene	<0.00198	U	0.00198	mg/Kg		10/04/21 09:44	10/05/21 05:56	1
Ethylbenzene	0.00324		0.00198	mg/Kg		10/04/21 09:44	10/05/21 05:56	1
m-Xylene & p-Xylene	0.00454		0.00397	mg/Kg		10/04/21 09:44	10/05/21 05:56	1
o-Xylene	0.00307		0.00198	mg/Kg		10/04/21 09:44	10/05/21 05:56	1
Xylenes, Total	0.00761		0.00397	mg/Kg		10/04/21 09:44	10/05/21 05:56	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	127		70 - 130			10/04/21 09:44	10/05/21 05:56	1
1,4-Difluorobenzene (Surr)	70		70 - 130			10/04/21 09:44	10/05/21 05:56	1
Method: Total BTEX - Total	BTEX Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0109		0.00200	mg/Kg			10/04/21 15:27	1
Method: 8015 NM - Diesel	Range Organic	s (DRO) (G	SC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	1

Matrix: Solid

Job ID: 890-1349-1 SDG: 31403236.022.0129

Lab Sample ID: 890-1349-20

#### **Client Sample ID: PH04** Date Collected: 10/01/21 09:30

# Date Received: 10/01/21 16:40

Client: WSP USA Inc.

Project/Site: Tiger cs

Sample Depth: 1

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.8	U	49.8	mg/Kg		10/04/21 08:38	10/04/21 19:43	1
Diesel Range Organics (Over C10-C28)	<49.8	U	49.8	mg/Kg		10/04/21 08:38	10/04/21 19:43	1
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/04/21 08:38	10/04/21 19:43	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	118		70 - 130			10/04/21 08:38	10/04/21 19:43	1
o-Terphenyl	125		70 - 130			10/04/21 08:38	10/04/21 19:43	1

#### Method: 300.0 - Anions, Ion Chromatography - Soluble

Analyte	Result Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.9 *-	5.01	mg/Kg			10/05/21 11:23	1

#### **Client Sample ID: PH04A**

#### Date Collected: 10/01/21 09:45 Date Received: 10/01/21 16:40 Sample Depth: 2

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 06:17	1
Toluene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 06:17	1
Ethylbenzene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 06:17	1
m-Xylene & p-Xylene	0.00502		0.00398	mg/Kg		10/04/21 09:44	10/05/21 06:17	1
o-Xylene	<0.00199	U	0.00199	mg/Kg		10/04/21 09:44	10/05/21 06:17	1
Xylenes, Total	0.00502		0.00398	mg/Kg		10/04/21 09:44	10/05/21 06:17	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	127		70 - 130			10/04/21 09:44	10/05/21 06:17	1
1,4-Difluorobenzene (Surr)	76		70 - 130			10/04/21 09:44	10/05/21 06:17	1
Method: Total BTEX - Total B	<b>FEX Calcula</b>	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.00502		0.00200	mg/Kg			10/04/21 15:27	1
Method: 8015 NM - Diesel Rar	nge Organic	s (DRO) (G	SC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	1
Method: 8015B NM - Diesel R	ange Organ	ics (DRO)	(GC)					
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9	mg/Kg		10/04/21 08:38	10/04/21 20:05	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9	mg/Kg		10/04/21 08:38	10/04/21 20:05	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/04/21 08:38	10/04/21 20:05	1
5 5 ( )								
	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
Surrogate 1-Chlorooctane	%Recovery 116	Qualifier	Limits 70 - 130			Prepared 10/04/21 08:38	Analyzed 10/04/21 20:05	Dil Fac

v		Client	Sample Re	esults			- 14	,- · · · · J ·
Client: WSP USA Inc. Project/Site: Tiger cs						SDG	Job ID: 890- : 31403236.02	
Client Sample ID: PH04A Date Collected: 10/01/21 09:45 Date Received: 10/01/21 16:40 Sample Depth: 2					L	ab Sample.	e ID: 890-13 Matrix	3 <b>49-21</b> :: Solid
Method: 300.0 - Anions, Ion C Analyte		phy - Solu Qualifier	uble RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	23.1		4.97	mg/Kg			10/05/21 11:44	1
Client Sample ID: PH04B Date Collected: 10/01/21 10:00 Date Received: 10/01/21 16:40 Sample Depth: 3					L	ab Sample.	D: 890-13 Matrix	3 <b>49-22</b> :: Solid
Method: 8021B - Volatile Orga								
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199		0.00199	mg/Kg		10/04/21 09:44	10/05/21 06:37	1
Toluene	<0.00199		0.00199	mg/Kg		10/04/21 09:44	10/05/21 06:37	1
Ethylbenzene	<0.00199		0.00199	mg/Kg			10/05/21 06:37	1
m-Xylene & p-Xylene	<0.00398		0.00398	mg/Kg			10/05/21 06:37	1
o-Xylene	<0.00199		0.00199	mg/Kg			10/05/21 06:37	1
Xylenes, Total	<0.00398	U	0.00398	mg/Kg		10/04/21 09:44	10/05/21 06:37	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	122		70 - 130			10/04/21 09:44	10/05/21 06:37	1
1,4-Difluorobenzene (Surr)	75		70 - 130			10/04/21 09:44	10/05/21 06:37	1
Method: Total BTEX - Total BT	EX Calcula	tion						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00200	U	0.00200	mg/Kg			10/04/21 15:27	1
Method: 8015 NM - Diesel Ran	nge Organic	s (DRO) ((	GC)					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/05/21 10:19	1
Mathed 2015D NM Discol D	0							
Method: 8015B NM - Diesel Ra Analyte		Qualifier	(GC) RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<49.9		49.9	mg/Kg		10/04/21 08:38	10/04/21 20:26	1
(GRO)-C6-C10 Diesel Range Organics (Over	<49.9	U	49.9	mg/Kg		10/04/21 08·38	10/04/21 20:26	1
C10-C28)								
Oll Range Organics (Over C28-C36)	<49.9		49.9	mg/Kg		10/04/21 00:38	10/04/21 20:26	1
Surrogate	%Recovery		Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane		S1+	70 - 130			10/04/21 08:38	10/04/21 20:26	1
o-Terphenyl	143	S1+	70 - 130			10/04/21 08:38	10/04/21 20:26	1
Method: 300.0 - Anions, Ion C	hromatogra	phy - Solu	uble					
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	165	*_	4.95	mg/Kg			10/05/21 11:51	1

5

Job ID: 890-1349-1 SDG: 31403236.022.0129

#### **Client Sample ID: PH04E** Date Collected: 10/01/21 11:15 Date Received: 10/01/21 16:40

#### Lab Sample ID: 890-1349-25

Matrix: Solid

Sample Depth: 6

Client: WSP USA Inc.

Project/Site: Tiger cs

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00201	U	0.00201	mg/Kg		10/04/21 09:44	10/05/21 06:58	1
Toluene	<0.00201	U	0.00201	mg/Kg		10/04/21 09:44	10/05/21 06:58	1
Ethylbenzene	<0.00201	U	0.00201	mg/Kg		10/04/21 09:44	10/05/21 06:58	1
m-Xylene & p-Xylene	<0.00402	U	0.00402	mg/Kg		10/04/21 09:44	10/05/21 06:58	1
o-Xylene	<0.00201	U	0.00201	mg/Kg		10/04/21 09:44	10/05/21 06:58	1
Xylenes, Total	<0.00402	U	0.00402	mg/Kg		10/04/21 09:44	10/05/21 06:58	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	127		70 - 130			10/04/21 09:44	10/05/21 06:58	1
1,4-Difluorobenzene (Surr)	78		70 - 130			10/04/21 09:44	10/05/21 06:58	1
Method: Total BTEX - Total B	TEX Calcula	tion						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00200	U	0.00200	mg/Kg			10/04/21 15:27	1
Analyte	Deput	<b>A</b> 110						
	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0		<b>RL</b> 50.0	Unit mg/Kg	<u>D</u>	Prepared	Analyzed 10/05/21 10:19	Dil Fac
Total TPH	<50.0	U	50.0		D	Prepared		Dil Fac 1
Total TPH Method: 8015B NM - Diesel R	<50.0 ange Organ	U ics (DRO)	50.0 (GC)	mg/Kg		<u>.</u>	10/05/21 10:19	1
Total TPH Method: 8015B NM - Diesel R Analyte	<50.0 ange Organ Result	U ics (DRO) Qualifier	50.0 (GC) RL	mg/Kg Unit	D	Prepared	10/05/21 10:19 Analyzed	1 Dil Fac
Total TPH Method: 8015B NM - Diesel R	<50.0 ange Organ	U ics (DRO) Qualifier	50.0 (GC)	mg/Kg		<u>.</u>	10/05/21 10:19	1
Total TPH Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	<50.0 ange Organ Result	U ics (DRO) Qualifier U	50.0 (GC) RL	mg/Kg Unit		Prepared 10/04/21 08:38	10/05/21 10:19 Analyzed	1 <b>Dil Fac</b> 1
Total TPH Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10	<50.0 ange Organ Result <50.0	U ics (DRO) Qualifier U	50.0 (GC) RL 50.0	mg/Kg Unit mg/Kg		Prepared 10/04/21 08:38 10/04/21 08:38	<b>Analyzed</b> 10/04/21 20:47	1 Dil Fac
Total TPH Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	<50.0 ange Organ Result <50.0 <50.0	U ics (DRO) Qualifier U U	50.0 (GC) RL 50.0 50.0	mg/Kg Unit mg/Kg mg/Kg		Prepared 10/04/21 08:38 10/04/21 08:38	<b>Analyzed</b> 10/05/21 10:19 <b>Analyzed</b> 10/04/21 20:47 10/04/21 20:47	1 Dil Fac 1 1
Total TPH Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Oll Range Organics (Over C28-C36)	<50.0 ange Organ Result <50.0 <50.0 <50.0	U ics (DRO) Qualifier U U	50.0 (GC) RL 50.0 50.0 50.0	mg/Kg Unit mg/Kg mg/Kg		Prepared 10/04/21 08:38 10/04/21 08:38 10/04/21 08:38	Analyzed           10/05/21 10:19           Analyzed           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47	1 Dil Fac 1 1
Total TPH Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Oll Range Organics (Over C28-C36) Surrogate 1-Chlorooctane	<50.0 ange Organ Result <50.0 <50.0 <50.0 %Recovery	U ics (DRO) Qualifier U U	50.0 (GC) RL 50.0 50.0 50.0 Limits	mg/Kg Unit mg/Kg mg/Kg		Prepared 10/04/21 08:38 10/04/21 08:38 10/04/21 08:38 Prepared	Analyzed           10/05/21 10:19           Analyzed           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47           Analyzed	1 Dil Fac 1 1 1 <i>Dil Fac</i>
Total TPH Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Oll Range Organics (Over C28-C36) Surrogate	<50.0 ange Organ Result <50.0 <50.0 <50.0 %Recovery 111 121	U ics (DRO) Qualifier U U U Qualifier	50.0 (GC) RL 50.0 50.0 50.0 Limits 70 - 130 70 - 130	mg/Kg Unit mg/Kg mg/Kg		Prepared 10/04/21 08:38 10/04/21 08:38 10/04/21 08:38 Prepared 10/04/21 08:38	Analyzed           10/05/21 10:19           Analyzed           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47	1 Dil Fac 1 1 1 1 <i>Dil Fac</i> 1
Total TPH Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Oll Range Organics (Over C28-C36) Surrogate 1-Chlorooctane o-Terphenyl	<50.0 ange Organ Result <50.0 <50.0 <50.0 <50.0 %Recovery 111 121 Shromatogram	U ics (DRO) Qualifier U U U Qualifier phy - Solu Qualifier	50.0 (GC) RL 50.0 50.0 50.0 Limits 70 - 130 70 - 130	mg/Kg Unit mg/Kg mg/Kg		Prepared 10/04/21 08:38 10/04/21 08:38 10/04/21 08:38 Prepared 10/04/21 08:38	Analyzed           10/05/21 10:19           Analyzed           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47           10/04/21 20:47	1 Dil Fac 1 1 1 1 <i>Dil Fac</i> 1

#### **Surrogate Summary**

Client: WSP USA Inc. Project/Site: Tiger cs

#### Method: 8021B - Volatile Organic Compounds (GC) **Matrix: Solid**

			Pe
		BFB1	DFBZ1
Lab Sample ID	Client Sample ID	(70-130)	(70-130)
880-6736-A-61-D MS	Matrix Spike	125	77
880-6736-A-61-E MSD	Matrix Spike Duplicate	138 S1+	75
890-1349-1	PH01	201 S1+	79
890-1349-1 MS	PH01	253 S1+	84
890-1349-1 MSD	PH01	252 S1+	80
890-1349-3	PH01B	123	76
890-1349-4	PH01C	131 S1+	75
890-1349-6	PH01E	133 S1+	78
890-1349-7	PH02	135 S1+	80
890-1349-8	PH02A	133 S1+	75
890-1349-9	PH02B	130	75
890-1349-12	PH02E	133 S1+	78
890-1349-13	PH03	190 S1+	79
890-1349-15	PH03B	503 S1+	119
890-1349-16	PH03C	127	72
890-1349-18	PH03E	135 S1+	76
890-1349-20	PH04	127	70
890-1349-21	PH04A	127	76
890-1349-22	PH04B	122	75
890-1349-25	PH04E	127	78
LCS 880-8788/1-A	Lab Control Sample	109	86
LCS 880-8800/1-A	Lab Control Sample	113	80
LCSD 880-8788/2-A	Lab Control Sample Dup	118	86
LCSD 880-8800/2-A	Lab Control Sample Dup	113	84
MB 880-8787/5-A	Method Blank	110	78
MB 880-8788/5-A	Method Blank	112	79
MB 880-8800/5-A	Method Blank	116	85

#### Surrogate Legend

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

# Method: 8015B NM - Diesel Range Organics (DRO) (GC)

#### Matrix: Solid

890-1349-9

890-1349-12

Prep Type: Total/NA Percent Surrogate Recovery (Acceptance Limits) 1001 OTPH1 (70-130) Lab Sample ID **Client Sample ID** (70-130) 880-6736-A-61-B MS Matrix Spike 115 111 880-6736-A-61-C MSD Matrix Spike Duplicate 107 103 890-1349-1 PH01 120 124 890-1349-1 MS PH01 120 110 890-1349-1 MSD PH01 122 113 890-1349-3 PH01B 127 114 890-1349-4 PH01C 115 125 890-1349-6 PH01E 112 122 890-1349-7 PH02 109 120 890-1349-8 PH02A 111 123

Eurofins Xenco, Carlsbad

5

6

Prep Type: Total/NA

PH02B

PH02E

127

131 S1+

115

Job ID: 890-1349-1 SDG: 31403236.022.0129

#### Project/Site: Tiger cs Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued) Matrix: Solid

Prep	Type:	Total/NA

			Pe	rcent Surrogate Recovery (Acceptance Limits)	
		1CO1	OTPH1		
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		5
890-1349-13	PH03	117	126		×
890-1349-15	PH03B	138 S1+	128		G
890-1349-16	PH03C	121	134 S1+		6
890-1349-18	PH03E	114	120		
890-1349-20	PH04	118	125		
890-1349-21	PH04A	116	125		
890-1349-22	PH04B	132 S1+	143 S1+		8
890-1349-25	PH04E	111	121		
LCS 880-8781/2-A	Lab Control Sample	125	124		l S
LCS 880-8829/2-A	Lab Control Sample	113	117		
LCSD 880-8781/3-A	Lab Control Sample Dup	113	109		
LCSD 880-8829/3-A	Lab Control Sample Dup	108	111		
MB 880-8781/1-A	Method Blank	112	121		
MB 880-8829/1-A	Method Blank	122	128		
Surrogate Legend					
1CO = 1-Chlorooctane	,				

OTPH = o-Terphenyl

#### **QC Sample Results**

Job ID: 890-1349-1 SDG: 31403236.022.0129

> Prep Type: Total/NA Prep Batch: 8787

**Client Sample ID: Method Blank** 

**Client Sample ID: Method Blank** 

**Client Sample ID: Lab Control Sample** 

Prep Type: Total/NA

**Prep Type: Total/NA** 

Prep Batch: 8788

Client: WSP USA Inc. Project/Site: Tiger cs

#### Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-8787/5-A
Matrix: Solid
Analysis Batch: 8791

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:41	10/04/21 13:35	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:41	10/04/21 13:35	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:41	10/04/21 13:35	1
m-Xylene & p-Xylene	<0.00400	U	0.00400	mg/Kg		10/04/21 09:41	10/04/21 13:35	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:41	10/04/21 13:35	1
Xylenes, Total	<0.00400	U	0.00400	mg/Kg		10/04/21 09:41	10/04/21 13:35	1
	MB	МВ						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	110		70 - 130			10/04/21 09:41	10/04/21 13:35	1
1,4-Difluorobenzene (Surr)	78		70 - 130			10/04/21 09:41	10/04/21 13:35	1

#### Lab Sample ID: MB 880-8788/5-A Matrix: Solid Analysis Batch: 8791

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 00:29	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 00:29	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 00:29	1
m-Xylene & p-Xylene	<0.00400	U	0.00400	mg/Kg		10/04/21 09:44	10/05/21 00:29	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/04/21 09:44	10/05/21 00:29	1
Xylenes, Total	<0.00400	U	0.00400	mg/Kg		10/04/21 09:44	10/05/21 00:29	1
	MB	МВ						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	112		70 - 130			10/04/21 09:44	10/05/21 00:29	1
1,4-Difluorobenzene (Surr)	79		70 - 130			10/04/21 09:44	10/05/21 00:29	1

#### Lab Sample ID: LCS 880-8788/1-A Matrix: Solid Analysis Batch: 8791

Analysis Batch: 8791							Prep B	atch: 8788
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	0.100	0.09716		mg/Kg		97	70 - 130	
Toluene	0.100	0.09892		mg/Kg		99	70 - 130	
Ethylbenzene	0.100	0.09741		mg/Kg		97	70 - 130	
m-Xylene & p-Xylene	0.200	0.2010		mg/Kg		101	70 - 130	
o-Xylene	0.100	0.1000		mg/Kg		100	70 - 130	

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	109		70 - 130
1,4-Difluorobenzene (Surr)	86		70 - 130

Lab Sample ID: LCSD 880-8788/2-A Matrix: Solid			C	Client Sa	mple	ID: Lat	Control Prep Ty	pe: Tot	al/NA
Analysis Batch: 8791							Prep	Batch:	8788
	Spike	LCSD	LCSD				%Rec.		RPD
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	0.100	0.1068		mg/Kg		107	70 - 130	9	35

Project/Site: Tiger cs

#### **QC Sample Results**

Job ID: 890-1349-1 SDG: 31403236.022.0129

#### Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Matrix: Solid	0-8788/2-A								Prep Type: 1	
Analysis Batch: 8791									Prep Bato	
• • • •			Spike		LCSD		-	~ -	%Rec.	RP
Analyte			Added		Qualifier	Unit	D		Limits RP	
Foluene			0.100	0.1073		mg/Kg		107		8 3
Ethylbenzene			0.100	0.1075		mg/Kg		108		0 3
m-Xylene & p-Xylene			0.200	0.2226		mg/Kg		111		0 3
o-Xylene			0.100	0.1104		mg/Kg		110	70 - 130 1	0 3
	LCSD	LCSD								
Surrogate	%Recovery		Limits							
4-Bromofluorobenzene (Surr)	118		70 - 130							
1,4-Difluorobenzene (Surr)	86		70 - 130							
Lab Sample ID: 890-1349	1 MS							CI	ent Sample II	יים יר
Matrix: Solid	-1 1013							Cin	Prep Type: 1	
Analysis Batch: 8791									Prep Bato	
analysis batch. 6791									Flep Ball	
	MS	MS								
Surrogate	%Recovery		Limits							
1-Bromofluorobenzene (Surr)	253	S1+	70 - 130							
,4-Difluorobenzene (Surr)	84		70 - 130							
_ab Sample ID: 890-1349	-1 MSD							Cli	ent Sample II	): PH
Matrix: Solid									Prep Type: 1	
Analysis Batch: 8791									Prep Bato	
	Sample	Sample	Spike	MSD	MSD				%Rec.	RF
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits RP	D Lin
Benzene	< 0.00199	U –	0.100	0.05974		mg/Kg				
oluene	<0.00199	U	0.100	0.05418		mg/Kg				
Ethylbenzene	0.104		0.100	0.2124		mg/Kg				
n-Xylene & p-Xylene	0.0370		0.200	0.1299		mg/Kg				
-Xylene	0.147		0.100	0.2979		mg/Kg				
	MSD	MSD								
		Qualifiar	Limits							
Surrogate	%Recovery	Quaimer	Linits							
-		S1+	70 - 130							
Bromofluorobenzene (Surr)										
1-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	252 80		70 - 130				Cli	ent Samr	ole ID: Metho	d Blar
Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: MB 880-8 Matrix: Solid	252 80		70 - 130				Cli	ent Samp	ole ID: Metho Prep Type: 1	
1-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: MB 880-8 Matrix: Solid	252 80		70 - 130				Cli	ent Samp	Prep Type: 1	'otal/N
I-Bromofluorobenzene (Surr) I,4-Difluorobenzene (Surr) Lab Sample ID: MB 880-8 Matrix: Solid	252 80		70 - 130				Cli	ent Samp		'otal/N
-Bromofluorobenzene (Surr) ,4-Difluorobenzene (Surr) _ab Sample ID: MB 880-8 Matrix: Solid Analysis Batch: 8885	252 80 3800/5-A	<u>S1+</u>	70 - 130 70 - 130	RL.	Unit			ent Samp Prepared	Prep Type: 1	otal/N h: 880
-Bromofluorobenzene (Surr) ,4-Difluorobenzene (Surr) _ab Sample ID: MB 880-8 Matrix: Solid Analysis Batch: 8885	252 80 3800/5-A	S1+ MB MB ssult Qualifie	70 - 130 70 - 130		<u>Unit</u>		D_F		Prep Type: 1 Prep Bato Analyzed	otal/N h: 880
L-Bromofluorobenzene (Surr) 4-Difluorobenzene (Surr) Lab Sample ID: MB 880-8 Matrix: Solid Analysis Batch: 8885 Analyte Benzene	252 80 3800/5-A 	S1+ MB MB ssult Qualifie	70 - 130 70 - 130 r F	00		g	<b>D</b> F 10/0	Prepared 04/21 13:33	Prep Type: 1 Prep Bato Analyzed	otal/N h: 880
I-Bromofluorobenzene (Surr) I,4-Difluorobenzene (Surr) Lab Sample ID: MB 880-8 Matrix: Solid Analysis Batch: 8885 Analyte Benzene Toluene	252 80 3800/5-A 	MB MB sult Qualifie	70 - 130 70 - 130 r F 0.0020	00	mg/K mg/K	g g	D F 10/0 10/0	Prepared 04/21 13:33 04/21 13:33	Analyzed           10/05/21 12:03	'otal/N
-Bromofluorobenzene (Surr) ,4-Difluorobenzene (Surr) _ab Sample ID: MB 880-8 Matrix: Solid Analysis Batch: 8885 Analyte Benzene Toluene Ethylbenzene	252 80 3800/5-A 	MB MB sult Qualifie 0200 U	70 - 130 70 - 130 <b>r</b> F 0.0020 0.0020	00 00 00	mg/K mg/K mg/K	g g	D F 10/0 10/0 10/0	Prepared 04/21 13:33 04/21 13:33 04/21 13:33	Prep Type: 1 Prep Bato Analyzed 10/05/21 12:03 10/05/21 12:03	otal/N h: 880
4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: MB 880-8 Matrix: Solid Analysis Batch: 8885 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	252 80 3800/5-A 	MB         MB           sult         Qualifie           0200         U           0200         U           0200         U           0200         U           0200         U	<b>r F 0.0020 0.0020</b>	00 00 00	mg/K mg/K mg/K mg/K	ð ð ð	D F 10/0 10/0 10/0 10/0	Prepared 04/21 13:33 04/21 13:33 04/21 13:33 04/21 13:33	Prep Type: 1 Prep Batc Analyzed 10/05/21 12:03 10/05/21 12:03 10/05/21 12:03	otal/N h: 880
4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: MB 880-8 Matrix: Solid Analysis Batch: 8885 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene p-Xylene	252 80 3800/5-A <0.00 <0.00 <0.00 <0.00 <0.00 <0.00	MB         MB           sult         Qualifie           0200         U           0200         U           0200         U           0200         U           0200         U	<b>r F</b> 0.0020 0.0020 0.0020 0.0020	00 00 00 00 00	mg/K mg/K mg/K	a a a a a	<b>D F</b> 10/0 10/0 10/0 10/0 10/0	<b>Prepared</b> 04/21 13:33 04/21 13:33 04/21 13:33 04/21 13:33 04/21 13:33	Prep Type: 1 Prep Batc Analyzed 10/05/21 12:03 10/05/21 12:03 10/05/21 12:03 10/05/21 12:03	otal/N h: 880
4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	252 80 3800/5-A <0.00 <0.00 <0.00 <0.00 <0.00 <0.00	MB         MB           sult         Qualifie           0200         U           0200         U	<b>r F</b> 0.0020 0.0020 0.0040 0.0020	00 00 00 00 00	mg/K mg/K mg/K mg/K	a a a a a	<b>D F</b> 10/0 10/0 10/0 10/0 10/0	<b>Prepared</b> 04/21 13:33 04/21 13:33 04/21 13:33 04/21 13:33 04/21 13:33	Prep Type: 1 Prep Bato 10/05/21 12:03 10/05/21 12:03 10/05/21 12:03 10/05/21 12:03 10/05/21 12:03	otal/N h: 880

Prepar	red	Analyz	Dil Fac	
10/04/21	13:33	10/05/21	12:03	1
10/04/21	13:33	10/05/21	12:03	1

Eurofins Xenco, Carlsbad

5

Released to Imaging: 3/14/2022 1:38:16 PM

4-Bromofluorobenzene (Surr)

1,4-Difluorobenzene (Surr)

70 - 130

70 - 130

116

Project/Site: Tiger cs

#### **QC Sample Results**

Job ID: 890-1349-1 SDG: 31403236.022.0129

**Client Sample ID: Lab Control Sample Dup** 

Prep Type: Total/NA

**Client Sample ID: Matrix Spike** 

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

#### Method: 8021B - Volatile Organic Compounds (GC) (Continued)

#### Lab Sample ID: LCS 880-8800/1-A **Client Sample ID: Lab Control Sample** Matrix: Solid Prep Type: Total/NA **Analysis Batch: 8885** Prep Batch: 8800 Spike LCS LCS %Rec. Analyte Added Result Qualifier Unit D %Rec Limits Benzene 0.100 0.09960 mg/Kg 100 70 - 130 Toluene 0.100 0.1020 mg/Kg 102 70 - 130 Ethylbenzene 0.100 mg/Kg 0.1040 104 70 - 130 m-Xylene & p-Xylene 0.200 0.2162 mg/Kg 108 70 - 130 0.100 0.1068 o-Xylene mg/Kg 107 70 - 130 LCS LCS

Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	113		70 - 130
1,4-Difluorobenzene (Surr)	80		70 - 130

#### Lab Sample ID: LCSD 880-8800/2-A Matrix: Solid Analysis Batch: 8885

Analysis Batch: 8885							Prep	Batch:	8800
	Spike	LCSD	LCSD				%Rec.		RPD
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	0.100	0.1033		mg/Kg		103	70 - 130	4	35
Toluene	0.100	0.1035		mg/Kg		104	70 - 130	1	35
Ethylbenzene	0.100	0.1032		mg/Kg		103	70 - 130	1	35
m-Xylene & p-Xylene	0.200	0.2140		mg/Kg		107	70 - 130	1	35
o-Xylene	0.100	0.1060		mg/Kg		106	70 - 130	1	35

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	113		70 - 130
1,4-Difluorobenzene (Surr)	84		70 - 130

#### Lab Sample ID: 880-6736-A-61-D MS **Matrix: Solid** Analysis Batch: 8885

Analysis Batch: 8885									Prep E	Batch: 8800
	Sample	Sample	Spike	MS	MS				%Rec.	
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	<0.00198	U F1	0.100	0.04776	F1	mg/Kg		48	70 - 130	
Toluene	<0.00198	U F1	0.100	0.05476	F1	mg/Kg		55	70 - 130	
Ethylbenzene	<0.00198	U F1	0.100	0.05541	F1	mg/Kg		55	70 - 130	
m-Xylene & p-Xylene	<0.00397	U F1 F2	0.200	0.1177	F1	mg/Kg		59	70 - 130	
o-Xylene	<0.00198	U F1	0.100	0.05820	F1	mg/Kg		58	70 - 130	

	MS	MS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	125		70 - 130
1,4-Difluorobenzene (Surr)	77		70 - 130

#### Lab Sample ID: 880-6736-A-61-E MSD Matrix: Solid Analysis Ratch: 8885

Analysis Batch: 8885									Prep	Batch:	8800
	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	<0.00198	U F1	0.0994	0.04596	F1	mg/Kg		46	70 - 130	4	35
Toluene	<0.00198	U F1	0.0994	0.05476	F1	mg/Kg		55	70 - 130	0	35
Ethylbenzene	<0.00198	U F1	0.0994	0.05686	F1	mg/Kg		57	70 - 130	3	35

Eurofins Xenco, Carlsbad

Prep Type: Total/NA

7

# Released to Imaging: 3/14/2022 1:38:16 PM

Project/Site: Tiger cs

#### **QC Sample Results**

Job ID: 890-1349-1 SDG: 31403236.022.0129

#### Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 880-6736-A-61-E MSD Matrix: Solid Analysis Batch: 8885							Samp	le ID: N	latrix Spil Prep Ty∣ Prep		al/NA
	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
m-Xylene & p-Xylene	< 0.00397	U F1 F2	0.199	0.05660	F1 F2	mg/Kg		28	70 - 130	70	35
o-Xylene	<0.00198	U F1	0.0994	0.05975	F1	mg/Kg		60	70 - 130	3	35
	MSD	MSD									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	138	S1+	70 - 130								
1,4-Difluorobenzene (Surr)	75		70 - 130								

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 880-8781/ Matrix: Solid Analysis Batch: 8775					Client Sample ID: Method Bla Prep Type: Total/ Prep Batch: 87							
Analyte	MB	MB Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac				
			·			10/04/21 08:38	10/04/21 11:30					
Gasoline Range Organics (GRO)-C6-C10	<50.0	0	50.0	mg/Kg		10/04/21 00:30	10/04/21 11:30	I				
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/04/21 08:38	10/04/21 11:30	1				
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/04/21 08:38	10/04/21 11:30	1				
	MB	МВ										
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac				
1-Chlorooctane	112		70 - 130			10/04/21 08:38	10/04/21 11:30	1				
o-Terphenyl	121		70 - 130			10/04/21 08:38	10/04/21 11:30	1				

#### Lab Sample ID: LCS 880-8781/2-A Matrix: Solid Analysis Batch: 8775

#### Client Sample ID: Lab Control Sample Prep Type: Total/NA Prep Batch: 8781

**Client Sample ID: Lab Control Sample Dup** 

								Batom or or
-	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	 1000	982.3		mg/Kg		98	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	1230		mg/Kg		123	70 - 130	
C10-C28)								

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	125		70 - 130
o-Terphenyl	124		70 - 130

#### Lab Sample ID: LCSD 880-8781/3-A Matrix: Solid Analysis Batch: 8775

Analysis Batch: 8775							Prep	Batch:	8781
	Spike	LCSD	LCSD				%Rec.		RPD
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics	 1000	961.6		mg/Kg		96	70 - 130	2	20
(GRO)-C6-C10									
Diesel Range Organics (Over	1000	1059		mg/Kg		106	70 - 130	15	20
C10-C28)									

Prep Type: Total/NA

5

#### **QC Sample Results**

5

Client: WSP USA Inc. Project/Site: Tiger cs

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 8775	781/3-A				C	lient Sa	amp	ole ID: L		Control Sa Prep Type Prep Ba	: Ťo	tal/N
Surra noto	Recovery	LCSD	Limita									
Surrogate 1-Chlorooctane	113	Quanner	Limits 70 - 130									
o-Terphenyl	109		70 - 130 70 - 130									
o-respirency	105		70-700									
Lab Sample ID: 880-6736-A-	61-B MS							Client	Sam	ple ID: Ma	atrix	Spik
Matrix: Solid										Prep Type		
Analysis Batch: 8775										Prep Ba		
-	Sample	Sample	Spike	MS	MS					«Rec.		
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit		D %Re	C	Limits		
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	995	890.7		mg/Kg		8	57	70 - 130		
Diesel Range Organics (Over C10-C28)	<49.9	U	995	1007		mg/Kg		10	)1	70 - 130		
	MS	MS										
Surrogate	%Recovery		Limits									
1-Chlorooctane	115		70 - 130									
o-Terphenyl	111		70 - 130									
	0	0	Quilla		MOD					Prep Type Prep Ba		: 878
Analysis Batch: 8775	•	Sample Qualifier	Spike Added		MSD Qualifier	Unit		D %Re		Prep Ba %Rec.		: <mark>878</mark> RF
Analysis Batch: 8775 Analyte Gasoline Range Organics	•	Qualifier	•			Unit mg/Kg			ec	Prep Ba %Rec.	atch	: 87 RI Lir
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Result	Qualifier	Added	Result				7	e <b>c</b>	Prep Ba %Rec. Limits	atch RPD	: 878 RI Lir
Matrix: Solid Analysis Batch: 8775 Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	Result <49.9 <49.9	Qualifier	<b>Added</b> 997	<b>Result</b> 803.0		mg/Kg		7	e <b>c</b>	Prep Ba %Rec. Limits 70 - 130	atch RPD 10	: 878 RI Lir
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	Result <49.9 <49.9 <i>MSD</i>	Qualifier U U MSD	<b>Added</b> 997	<b>Result</b> 803.0		mg/Kg		7	e <b>c</b>	Prep Ba %Rec. Limits 70 - 130	atch RPD 10	: 878 RI Lir
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	Result <49.9 <49.9	Qualifier U U MSD	<b>Added</b> 997 997	<b>Result</b> 803.0		mg/Kg		7	e <b>c</b>	Prep Ba %Rec. Limits 70 - 130	atch RPD 10	: 878 RF Lin
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate	Result <49.9 <49.9 MSD %Recovery	Qualifier U U MSD	Added           997           997           Limits	<b>Result</b> 803.0		mg/Kg		7	e <b>c</b>	Prep Ba %Rec. Limits 70 - 130	atch RPD 10	: 878 RF Lin
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: MB 880-8829 Matrix: Solid	Result           <49.9	Qualifier U MSD Qualifier	Added           997           997           Uimits           70 - 130	<b>Result</b> 803.0		mg/Kg		7 9	amp	Prep Ba %Rec. Limits 70 - 130	hod	Blar
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane	Result <49.9 <49.9 <i>MSD</i> %Recovery 107 103 9/1-A	Qualifier U U MSD	Added           997           997           Uimits           70 - 130	<b>Result</b> 803.0	Qualifier	mg/Kg mg/Kg	( D	7 9	<u>c</u> 8 – 55 <b>amp</b>	Prep Ba %Rec. Limits 70 - 130 70 - 130	ARPD 10 6 hod e: To atch	: 874 RI Lir Blar tal/N : 882
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: MB 880-8829 Matrix: Solid Analysis Batch: 8775 Analyte Gasoline Range Organics	Result <49.9 <49.9 <i>MSD</i> %Recovery 107 103 9/1-A	Qualifier U MSD Qualifier	Added 997 997 Limits 70 - 130 70 - 130	<b>Result</b> 803.0	Qualifier	mg/Kg mg/Kg	D	7 9 Client S	ed	Prep Ba %Rec. Limits 70 - 130 70 - 130 70 - 130	ARPD 10 6 hod 10 6	: 874 RI Lir Blar tal/N : 882
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: MB 880-8829 Matrix: Solid Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Result           <49.9	Qualifier U MSD Qualifier MB MB sult Qualifier	Added 997 997 Limits 70 - 130 70 - 130 RL	<b>Result</b> 803.0	Qualifier	mg/Kg mg/Kg	<b>D</b> _ 1	7 9 <b>Client S</b> Prepare	ed 3:45	Prep Ba %Rec. Limits 70 - 130 70 - 130 70 - 130 Prep Type Prep Ba Analyzeo	hod s: To atch 130	: 87 RR Lin Blar tal/N : 882
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: MB 880-8829 Matrix: Solid Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10	Result           <49.9	Qualifier U MSD Qualifier Solut Solut U Qualifier	Added 997 997 <u>Limits</u> 70 - 130 70 - 130 70 - 50.0	<b>Result</b> 803.0	Qualifier	mg/Kg mg/Kg g	<b>D</b> _ 1	7 9 <b>Client S</b> 0/04/21 1	ec 8 55 <b>amp</b> 3:45 3:45	Prep Ba           %Rec.           Limits           70 - 130           70 - 130           70 - 130           Prep Type           Prep Ba           Analyzec           10/04/21 21	atch <u>RPD</u> 10 6 hod :: To atch 1 :30	: 87 RR Lin Blar tal/N : 882
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: MB 880-8829 Matrix: Solid Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	Result           <49.9	Qualifier U MSD Qualifier 50.0 50.0 50.0 U 50.0 U	Added 997 997 <i>Limits</i> 70 - 130 70 - 130 70 - 130 50.0	<b>Result</b> 803.0	Qualifier Unit mg/K mg/K	mg/Kg mg/Kg g	<b>D</b> _ 1	7 9 <b>Client S</b> 0/04/21 1	ec 8 55 <b>amp</b> 3:45 3:45	Prep Ba %Rec. Limits 70 - 130 70 - 130	atch <u>RPD</u> 10 6 hod :: To atch 1 :30	: 878 RR Lin tal/N : 882
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: MB 880-8829 Matrix: Solid Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Oll Range Organics (Over C28-C36)	Result           <49.9	Qualifier U MSD Qualifier 50.0 50.0 50.0 50.0 50.0 50.0 50.0 50.	Added 997 997 <i>Limits</i> 70 - 130 70 - 130 70 - 130 50.0 50.0 50.0	<b>Result</b> 803.0	Qualifier Unit mg/K mg/K	mg/Kg mg/Kg g	<b>D</b> _ 1	<b>Prepare</b> 10/04/21 1 10/04/21 1	ec 8 55 amp 3:45 3:45 3:45	Prep Ba %Rec. Limits 70 - 130 70 - 130	atch <u>RPD</u> 10 6 hod e: To atch 1 :30 :30	Blar Elin tal/N : 882
Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: MB 880-8829 Matrix: Solid Analysis Batch: 8775 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	Result           <49.9	Qualifier U MSD Qualifier 50.0 50.0 50.0 U 50.0 U	Added 997 997 <i>Limits</i> 70 - 130 70 - 130 70 - 130 50.0	<b>Result</b> 803.0	Qualifier Unit mg/K mg/K	mg/Kg mg/Kg g	<u>₽</u> 1 1	7 9 <b>Client S</b> 10/04/21 1 10/04/21 1 10/04/21 1 10/04/21 1	ec 8 55 amp 3:45 3:45 3:45 3:45	Prep Ba %Rec. Limits 70 - 130 70 - 130	atch <u>RPD</u> 10 6 hod e: To atch 1 :30 :30 :30	Blar

#### **QC Sample Results**

Job ID: 890-1349-1 SDG: 31403236.022.0129

Project/Site: Tiger cs Method: 8015B NM - Diesel Range Organics

Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)							
Lab Sample ID: LCS 880-8829/2-A	Client Sample ID: Lab Control Sample						

Matrix: Solid Analysis Batch: 8775							Prep Type: Total/NA Prep Batch: 8829
	Spike	LCS	LCS				%Rec.
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits
Gasoline Range Organics (GRO)-C6-C10	1000	968.3		mg/Kg		97	70 - 130
Diesel Range Organics (Over C10-C28)	1000	1131		mg/Kg		113	70 - 130

	LCS LCS					
Surrogate	%Recovery Qua	alifier Limits				
1-Chlorooctane	113	70 - 130				
o-Terphenyl	117	70 - 130				

#### Lab Sample ID: LCSD 880-8829/3-A Matrix: Solid Analysis Batch: 8775

Analysis Batch: 8775								Prep	Batch:		
		Spike	LCSD	LCSD				%Rec.		RPD	
Analyte	A	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit	
Gasoline Range Organics (GRO)-C6-C10		1000	910.6		mg/Kg		91	70 - 130	6	20	i
Diesel Range Organics (Over C10-C28)		1000	1069		mg/Kg		107	70 - 130	6	20	i

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	108		70 - 130
o-Terphenyl	111		70 - 130

#### Lab Sample ID: 890-1349-1 MS Matrix: Solid Analysis Batch: 8775

Analysis balch: 0775									Prep	Datch: 0029
	Sample	Sample	Spike	MS	MS				%Rec.	
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics (GRO)-C6-C10	299		995	1030		mg/Kg		73	70 - 130	
Diesel Range Organics (Over C10-C28)	287		995	1341		mg/Kg		106	70 - 130	

	MS	MS	
Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	120		70 - 130
o-Terphenyl	110		70 - 130

#### Lab Sample ID: 890-1349-1 MSD Matrix: Solid Analysis Batch: 8775

Analysis Batch: 8775									Prep	Batch:	8829
	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics (GRO)-C6-C10	299		997	1121		mg/Kg		82	70 - 130	8	20
Diesel Range Organics (Over C10-C28)	287		997	1374		mg/Kg		109	70 - 130	2	20
	MSD	MSD									
Surrogate	%Recovery	Qualifier	Limits								

Surroyate	Mecovery Quanner	LIIIIIIS
1-Chlorooctane	122	70 - 130

Eurofins Xenco, Carlsbad

**Client Sample ID: PH01** 

Prep Type: Total/NA

#### Client Sample ID: PH01 Prep Type: Total/NA Prep Batch: 8829

Prep Type: Total/NA

Client Sample ID: Lab Control Sample Dup

Laionno	ποπου,	Ouriobuu	

#### **QC Sample Results**

		Q	C Samp	le Resi	ults							
Client: WSP USA Inc. Project/Site: Tiger cs			-					SDO	Job ID G: 314032	: 890-1 36.022		2
Method: 8015B NM - Die	esel Ranç	ge Organ	nics (DRC	) (GC) (	Continu	ied)						
Lab Sample ID: 890-1349-1 Matrix: Solid	MSD							CI	ient Sam Prep Ty Prop		al/NA	
Analysis Batch: 8775									Piep	Datch.	0029	5
	MSD											J
Surrogate o-Terphenyl	%Recovery 113	Qualifier	Limits 70 - 130									
Method: 300.0 - Anions	, Ion Chro	omatogr	aphy									7
Lab Sample ID: MB 880-88 Matrix: Solid	57/1-A						Clie	nt Sam	ple ID: M Prep Ty			8
Analysis Batch: 8879												9
Analyte	Po	MB MB sult Qualifi	ior	RL	Unit	D	) Dr	epared	Analyz	rod	Dil Fac	
Chloride		5.00 U		5.00	mg/K		·	epareu	10/05/21		1	
Lab Sample ID: LCS 880-88 Matrix: Solid	357/2-A					Clier	nt San	nple ID	: Lab Cor Prep Ty			
Analysis Batch: 8879												
Analyta			Spike Added	-	LCS Qualifier	Unit	D	%Rec	%Rec. Limits			
Analyte Chloride			250	259.5		mg/Kg		104	90 - 110			13
Lab Sample ID: LCSD 880- Matrix: Solid Analysis Batch: 8879	8857/3-A				C	Client Sa	mple	ID: Lab	Control Prep Ty			
			Spike	LCSD	LCSD				%Rec.		RPD	
Analyte			Added		Qualifier	Unit	D	%Rec	Limits	RPD	Limit	
Chloride			250	215.7	*_	mg/Kg		86	90 - 110	18	20	
Lab Sample ID: 890-1349-1 Matrix: Solid	MS							CI	ient Sam Prep Ty			
Analysis Batch: 8879	Sample	Sample	Spike	MS	MS				%Rec.			
Analyte	-	Qualifier	Added		Qualifier	Unit	D	%Rec	Limits			
Chloride	168	*_	248	392.4		mg/Kg		90	90 - 110			
Lab Sample ID: 890-1349-1 Matrix: Solid Analysis Batch: 8879	MSD							CI	ient Sam Prep Ty			
Analysis Batch. 0075	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD	
Analyte		Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit	
Chloride	168	*_	248	392.1		mg/Kg		90	90 - 110	0	20	
Lab Sample ID: 890-1349-1 Matrix: Solid Analysis Batch: 8879	6 MS							Clie	nt Sampl Prep Ty			
		Sample	Spike		MS				%Rec.			
Analyte		Qualifier	Added		Qualifier	Unit	D	%Rec	Limits			
Chloride	183	*_	250	450.5		mg/Kg		107	90 - 110			

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

Project/Site: Tiger cs

Job ID: 890-1349-1 SDG: 31403236.022.0129

#### Method: 300.0 - Anions, Ion Chromatography (Continued)

Lab Sample ID: 890-1349-16 MSDClient Sample ID: PH03CMatrix: SolidPrep Type: Soluble												
Analysis Batch: 8879	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD	
Analyte		Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit	
Chloride	183	*_	250	448.7		mg/Kg		107	90 - 110	0	20	
												Ī
												Ī
												l

PH02

PH02A

#### **QC Association Summary**

Client: WSP USA Inc. Project/Site: Tiger cs Job ID: 890-1349-1 SDG: 31403236.022.0129

5035

5035

#### GC VOA

890-1349-7

890-1349-8

#### Prep Batch: 8787

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 880-8787/5-A	Method Blank	Total/NA	Solid	5035	
Prep Batch: 8788					
Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
Lab Sample ID 890-1349-1	Client Sample ID PH01	Prep Type Total/NA	Matrix Solid	Method 5035	Prep Batch
890-1349-1	•				Prep Batch
•	PH01	Total/NA	Solid	5035	Prep Batch

Total/NA

Total/NA

Solid

Solid

890-1349-9	PH02B	Total/NA	Solid	5035
890-1349-12	PH02E	Total/NA	Solid	5035
890-1349-13	PH03	Total/NA	Solid	5035
890-1349-15	PH03B	Total/NA	Solid	5035
890-1349-16	PH03C	Total/NA	Solid	5035
890-1349-18	PH03E	Total/NA	Solid	5035
890-1349-20	PH04	Total/NA	Solid	5035
890-1349-21	PH04A	Total/NA	Solid	5035
890-1349-22	PH04B	Total/NA	Solid	5035
890-1349-25	PH04E	Total/NA	Solid	5035
MB 880-8788/5-A	Method Blank	Total/NA	Solid	5035
LCS 880-8788/1-A	Lab Control Sample	Total/NA	Solid	5035
LCSD 880-8788/2-A	Lab Control Sample Dup	Total/NA	Solid	5035
890-1349-1 MS	PH01	Total/NA	Solid	5035
890-1349-1 MSD	PH01	Total/NA	Solid	5035
<u> </u>				

#### Analysis Batch: 8791

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-1	PH01	Total/NA	Solid	8021B	8788
890-1349-3	PH01B	Total/NA	Solid	8021B	8788
890-1349-4	PH01C	Total/NA	Solid	8021B	8788
890-1349-6	PH01E	Total/NA	Solid	8021B	8788
890-1349-7	PH02	Total/NA	Solid	8021B	8788
890-1349-8	PH02A	Total/NA	Solid	8021B	8788
890-1349-9	PH02B	Total/NA	Solid	8021B	8788
890-1349-12	PH02E	Total/NA	Solid	8021B	8788
890-1349-13	PH03	Total/NA	Solid	8021B	8788
890-1349-15	PH03B	Total/NA	Solid	8021B	8788
890-1349-16	PH03C	Total/NA	Solid	8021B	8788
890-1349-18	PH03E	Total/NA	Solid	8021B	8788
890-1349-20	PH04	Total/NA	Solid	8021B	8788
890-1349-21	PH04A	Total/NA	Solid	8021B	8788
890-1349-22	PH04B	Total/NA	Solid	8021B	8788
890-1349-25	PH04E	Total/NA	Solid	8021B	8788
MB 880-8787/5-A	Method Blank	Total/NA	Solid	8021B	8787
MB 880-8788/5-A	Method Blank	Total/NA	Solid	8021B	8788
LCS 880-8788/1-A	Lab Control Sample	Total/NA	Solid	8021B	8788
LCSD 880-8788/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	8788
890-1349-1 MS	PH01	Total/NA	Solid	8021B	8788
890-1349-1 MSD	PH01	Total/NA	Solid	8021B	8788

Eurofins Xenco, Carlsbad

Client: WSP USA Inc. Project/Site: Tiger cs

#### GC VOA

#### Prep Batch: 8800

Lab Sample ID 890-1349-15	Client Sample ID PH03B	Prep Type Total/NA	Matrix Solid	Method 5035	Prep Batch
MB 880-8800/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-8800/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-8800/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
880-6736-A-61-D MS	Matrix Spike	Total/NA	Solid	5035	
880-6736-A-61-E MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	

#### Analysis Batch: 8859

Analysis Batch: 88	359				8
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-1	PH01	Total/NA	Solid	Total BTEX	9
890-1349-3	PH01B	Total/NA	Solid	Total BTEX	
890-1349-4	PH01C	Total/NA	Solid	Total BTEX	
890-1349-6	PH01E	Total/NA	Solid	Total BTEX	
890-1349-7	PH02	Total/NA	Solid	Total BTEX	
890-1349-8	PH02A	Total/NA	Solid	Total BTEX	
890-1349-9	PH02B	Total/NA	Solid	Total BTEX	
890-1349-12	PH02E	Total/NA	Solid	Total BTEX	
890-1349-13	PH03	Total/NA	Solid	Total BTEX	10
890-1349-15	PH03B	Total/NA	Solid	Total BTEX	13
890-1349-16	PH03C	Total/NA	Solid	Total BTEX	
890-1349-18	PH03E	Total/NA	Solid	Total BTEX	
890-1349-20	PH04	Total/NA	Solid	Total BTEX	
890-1349-21	PH04A	Total/NA	Solid	Total BTEX	
890-1349-22	PH04B	Total/NA	Solid	Total BTEX	
890-1349-25	PH04E	Total/NA	Solid	Total BTEX	

#### Analysis Batch: 8885

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-15	PH03B	Total/NA	Solid	8021B	8800
MB 880-8800/5-A	Method Blank	Total/NA	Solid	8021B	8800
LCS 880-8800/1-A	Lab Control Sample	Total/NA	Solid	8021B	8800
LCSD 880-8800/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	8800
880-6736-A-61-D MS	Matrix Spike	Total/NA	Solid	8021B	8800
880-6736-A-61-E MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	8800

#### GC Semi VOA

#### Analysis Batch: 8775

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-1	PH01	Total/NA	Solid	8015B NM	8829
890-1349-3	PH01B	Total/NA	Solid	8015B NM	8829
890-1349-4	PH01C	Total/NA	Solid	8015B NM	8829
890-1349-6	PH01E	Total/NA	Solid	8015B NM	8829
890-1349-7	PH02	Total/NA	Solid	8015B NM	8829
890-1349-8	PH02A	Total/NA	Solid	8015B NM	8829
890-1349-9	PH02B	Total/NA	Solid	8015B NM	8829
890-1349-12	PH02E	Total/NA	Solid	8015B NM	8829
890-1349-13	PH03	Total/NA	Solid	8015B NM	8829
890-1349-15	PH03B	Total/NA	Solid	8015B NM	8829
890-1349-16	PH03C	Total/NA	Solid	8015B NM	8781
890-1349-18	PH03E	Total/NA	Solid	8015B NM	8781

Eurofins Xenco, Carlsbad

4 5 6

Job ID: 890-1349-1

SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger cs

#### GC Semi VOA (Continued)

#### Analysis Batch: 8775 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-20	PH04	Total/NA	Solid	8015B NM	8781
890-1349-21	PH04A	Total/NA	Solid	8015B NM	8781
890-1349-22	PH04B	Total/NA	Solid	8015B NM	8781
890-1349-25	PH04E	Total/NA	Solid	8015B NM	8781
MB 880-8781/1-A	Method Blank	Total/NA	Solid	8015B NM	8781
MB 880-8829/1-A	Method Blank	Total/NA	Solid	8015B NM	8829
LCS 880-8781/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	8781
LCS 880-8829/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	8829
LCSD 880-8781/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	8781
LCSD 880-8829/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	8829
880-6736-A-61-B MS	Matrix Spike	Total/NA	Solid	8015B NM	8781
880-6736-A-61-C MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	8781
890-1349-1 MS	PH01	Total/NA	Solid	8015B NM	8829
890-1349-1 MSD	PH01	Total/NA	Solid	8015B NM	8829

#### Prep Batch: 8781

Lab Sample ID 890-1349-16	Client Sample ID PH03C	Prep Type Total/NA	Matrix	Method 8015NM Prep	Prep Batch
890-1349-18	PH03E	Total/NA	Solid	8015NM Prep	
890-1349-20	PH04	Total/NA	Solid	8015NM Prep	
890-1349-21	PH04A	Total/NA	Solid	8015NM Prep	
890-1349-22	PH04B	Total/NA	Solid	8015NM Prep	
890-1349-25	PH04E	Total/NA	Solid	8015NM Prep	
MB 880-8781/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-8781/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-8781/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-6736-A-61-B MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
880-6736-A-61-C MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

#### Prep Batch: 8829

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-1	PH01	Total/NA	Solid	8015NM Prep	
890-1349-3	PH01B	Total/NA	Solid	8015NM Prep	
890-1349-4	PH01C	Total/NA	Solid	8015NM Prep	
890-1349-6	PH01E	Total/NA	Solid	8015NM Prep	
890-1349-7	PH02	Total/NA	Solid	8015NM Prep	
890-1349-8	PH02A	Total/NA	Solid	8015NM Prep	
890-1349-9	PH02B	Total/NA	Solid	8015NM Prep	
890-1349-12	PH02E	Total/NA	Solid	8015NM Prep	
890-1349-13	PH03	Total/NA	Solid	8015NM Prep	
890-1349-15	PH03B	Total/NA	Solid	8015NM Prep	
MB 880-8829/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-8829/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-8829/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1349-1 MS	PH01	Total/NA	Solid	8015NM Prep	
890-1349-1 MSD	PH01	Total/NA	Solid	8015NM Prep	

#### Lab Sample ID **Client Sample ID** Prep Type Method Prep Batch Matrix 890-1349-1 Total/NA 8015 NM PH01 Solid 890-1349-3 PH01B Total/NA Solid 8015 NM

#### Eurofins Xenco, Carlsbad

Job ID: 890-1349-1

SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger cs

#### GC Semi VOA (Continued)

#### Analysis Batch: 8889 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-4	PH01C	Total/NA	Solid	8015 NM	
Analysis Batch: 889	90				

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-6	PH01E	Total/NA	Solid	8015 NM	
890-1349-7	PH02	Total/NA	Solid	8015 NM	
890-1349-8	PH02A	Total/NA	Solid	8015 NM	
890-1349-9	PH02B	Total/NA	Solid	8015 NM	
890-1349-12	PH02E	Total/NA	Solid	8015 NM	
890-1349-13	PH03	Total/NA	Solid	8015 NM	
890-1349-15	PH03B	Total/NA	Solid	8015 NM	
890-1349-16	PH03C	Total/NA	Solid	8015 NM	
890-1349-18	PH03E	Total/NA	Solid	8015 NM	
890-1349-20	PH04	Total/NA	Solid	8015 NM	
890-1349-21	PH04A	Total/NA	Solid	8015 NM	
890-1349-22	PH04B	Total/NA	Solid	8015 NM	
890-1349-25	PH04E	Total/NA	Solid	8015 NM	

#### HPLC/IC

#### Leach Batch: 8857

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-1	PH01	Soluble	Solid	DI Leach	
890-1349-3	PH01B	Soluble	Solid	DI Leach	
890-1349-4	PH01C	Soluble	Solid	DI Leach	
890-1349-6	PH01E	Soluble	Solid	DI Leach	
890-1349-7	PH02	Soluble	Solid	DI Leach	
890-1349-8	PH02A	Soluble	Solid	DI Leach	
890-1349-9	PH02B	Soluble	Solid	DI Leach	
890-1349-12	PH02E	Soluble	Solid	DI Leach	
890-1349-13	PH03	Soluble	Solid	DI Leach	
890-1349-15	PH03B	Soluble	Solid	DI Leach	
890-1349-16	PH03C	Soluble	Solid	DI Leach	
890-1349-18	PH03E	Soluble	Solid	DI Leach	
890-1349-20	PH04	Soluble	Solid	DI Leach	
890-1349-21	PH04A	Soluble	Solid	DI Leach	
890-1349-22	PH04B	Soluble	Solid	DI Leach	
890-1349-25	PH04E	Soluble	Solid	DI Leach	
MB 880-8857/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-8857/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-8857/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
890-1349-1 MS	PH01	Soluble	Solid	DI Leach	
890-1349-1 MSD	PH01	Soluble	Solid	DI Leach	
890-1349-16 MS	PH03C	Soluble	Solid	DI Leach	
890-1349-16 MSD	PH03C	Soluble	Solid	DI Leach	

#### Analysis Batch: 8879

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1349-1	PH01	Soluble	Solid	300.0	8857
890-1349-3	PH01B	Soluble	Solid	300.0	8857
890-1349-4	PH01C	Soluble	Solid	300.0	8857

#### Eurofins Xenco, Carlsbad

Page 93 of 331

Job ID: 890-1349-1 SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger cs

#### HPLC/IC (Continued)

#### Analysis Batch: 8879 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	4
890-1349-6	PH01E	Soluble	Solid	300.0	8857	-
890-1349-7	PH02	Soluble	Solid	300.0	8857	5
890-1349-8	PH02A	Soluble	Solid	300.0	8857	
890-1349-9	PH02B	Soluble	Solid	300.0	8857	6
890-1349-12	PH02E	Soluble	Solid	300.0	8857	
890-1349-13	PH03	Soluble	Solid	300.0	8857	7
890-1349-15	PH03B	Soluble	Solid	300.0	8857	
890-1349-16	PH03C	Soluble	Solid	300.0	8857	8
890-1349-18	PH03E	Soluble	Solid	300.0	8857	
890-1349-20	PH04	Soluble	Solid	300.0	8857	9
890-1349-21	PH04A	Soluble	Solid	300.0	8857	
890-1349-22	PH04B	Soluble	Solid	300.0	8857	10
890-1349-25	PH04E	Soluble	Solid	300.0	8857	
MB 880-8857/1-A	Method Blank	Soluble	Solid	300.0	8857	14
LCS 880-8857/2-A	Lab Control Sample	Soluble	Solid	300.0	8857	
LCSD 880-8857/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	8857	12
890-1349-1 MS	PH01	Soluble	Solid	300.0	8857	
890-1349-1 MSD	PH01	Soluble	Solid	300.0	8857	4.0
890-1349-16 MS	PH03C	Soluble	Solid	300.0	8857	13
890-1349-16 MSD	PH03C	Soluble	Solid	300.0	8857	

Page 94 of 331

Job ID: 890-1349-1 SDG: 31403236.022.0129

5

9

Matrix: Solid

Matrix: Solid

Job ID: 890-1349-1 SDG: 31403236.022.0129

#### Lab Sample ID: 890-1349-1 Matrix: Solid

Lab Sample ID: 890-1349-4

Lab Sample ID: 890-1349-6

Client Sample ID: PH01 Date Collected: 09/30/21 11:00 Date Received: 10/01/21 16:40

Client: WSP USA Inc.

Project/Site: Tiger cs

	Batch	Batch		Dilution	Batch	Prepared		
Prep Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 00:50	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8889	10/05/21 10:03	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 22:34	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 08:52	СН	XEN MID

#### Client Sample ID: PH01B Date Collected: 09/30/21 11:40 Date Received: 10/01/21 16:40

Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 01:10	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8889	10/05/21 10:03	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 23:38	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 09:14	СН	XEN MID

#### Client Sample ID: PH01C Date Collected: 09/30/21 11:50 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 01:31	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8889	10/05/21 10:03	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 23:59	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 09:21	СН	XEN MID

#### Client Sample ID: PH01E Date Collected: 09/30/21 12:20 Date Received: 10/01/21 16:40

_	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 01:51	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID

Eurofins Xenco, Carlsbad

Matrix: Solid

Lab Sample ID: 890-1349-7

Lab Sample ID: 890-1349-8

Lab Sample ID: 890-1349-9

Matrix: Solid

Matrix: Solid

Matrix: Solid

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger cs

#### Client Sample ID: PH01E Date Collected: 09/30/21 12:20 Date Received: 10/01/21 16:40

Date Received	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/05/21 00:20	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 09:28	СН	XEN MID

#### Client Sample ID: PH02 Date Collected: 09/30/21 12:40 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 02:12	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/05/21 00:41	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 09:35	СН	XEN MID

#### **Client Sample ID: PH02A**

Date Collected: 09/30/21 13:00 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 02:32	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/05/21 01:02	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 09:57	СН	XEN MID

#### Client Sample ID: PH02B Date Collected: 09/30/21 13:20 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 02:53	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/05/21 01:23	AJ	XEN MID

Matrix: Solid

Matrix: Solid

Matrix: Solid

9

Lab Sample ID: 890-1349-9

Lab Sample ID: 890-1349-12

Lab Sample ID: 890-1349-13

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger cs

#### Client Sample ID: PH02B Date Collected: 09/30/21 13:20 Date Received: 10/01/21 16:40

		•••••						
	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 10:04	СН	XEN MID

#### Client Sample ID: PH02E Date Collected: 09/30/21 14:15 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 03:13	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/05/21 01:44	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 10:33	СН	XEN MID

#### Client Sample ID: PH03 Date Collected: 09/30/21 14:30 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 03:33	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8829	10/04/21 13:45	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/05/21 02:06	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 10:40	СН	XEN MID

#### Client Sample ID: PH03B Date Collected: 09/30/21 15:00 Date Received: 10/01/21 16:40

La	b	Sample	ID:	890-1349-15	5
				Matrix: Solid	1

XEN MID

Batch Batch Dilution Batch Prepared Prep Type Method or Analyzed Туре Run Factor Number Analyst Lab Total/NA Prep 5035 8788 10/04/21 09:44 KL XEN MID Total/NA 8021B Analysis 1 8791 10/05/21 03:54 KL XEN MID Total/NA 5035 XEN MID Prep 8800 10/04/21 13:33 KL Total/NA 8021B 100 XEN MID Analysis 8885 10/05/21 15:29 KL Total/NA Total BTEX 10/04/21 15:27 KL XEN MID Analysis 1 8859 8015 NM Total/NA Analysis 1 8890 10/05/21 10:19 AJ XEN MID Total/NA Prep 8015NM Prep 8829 10/04/21 13:45 DM XEN MID

#### Eurofins Xenco, Carlsbad

Job ID: 890-1349-1 SDG: 31403236.022.0129

### Released to Imaging: 3/14/2022 1:38:16 PM

8015B NM

Analysis

Total/NA

1

8775 10/05/21 02:27 AJ

Job ID: 890-1349-1

Matrix: Solid

Matrix: Solid

SDG: 31403236.022.0129

Lab Sample ID: 890-1349-15

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger cs

#### Client Sample ID: PH03B Date Collected: 09/30/21 15:00 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 10:47	СН	XEN MID

#### Client Sample ID: PH03C Date Collected: 09/30/21 15:10 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 05:15	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8781	10/04/21 08:38	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 19:00	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 10:54	СН	XEN MID

#### Client Sample ID: PH03E Date Collected: 09/30/21 15:45 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 05:36	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8781	10/04/21 08:38	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 19:21	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 11:15	СН	XEN MID

#### Client Sample ID: PH04 Date Collected: 10/01/21 09:30 Date Received: 10/01/21 16:40

#### Lab Sample ID: 890-1349-20 Matrix: Solid

IVId

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 05:56	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8781	10/04/21 08:38	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 19:43	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 11:23	СН	XEN MID

Eurofins Xenco, Carlsbad

#### Client Sample ID: PH04A Date Collected: 10/01/21 09:45 Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 06:17	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8781	10/04/21 08:38	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 20:05	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 11:44	СН	XEN MID

#### Client Sample ID: PH04B Date Collected: 10/01/21 10:00

Date Received: 10/01/21 16:40

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 06:37	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8781	10/04/21 08:38	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 20:26	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 11:51	СН	XEN MID

#### Client Sample ID: PH04E Date Collected: 10/01/21 11:15 Date Received: 10/01/21 16:40

# Lab Sample ID: 890-1349-25

Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8788	10/04/21 09:44	KL	XEN MID
Total/NA	Analysis	8021B		1	8791	10/05/21 06:58	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	8859	10/04/21 15:27	KL	XEN MID
Total/NA	Analysis	8015 NM		1	8890	10/05/21 10:19	AJ	XEN MID
Total/NA	Prep	8015NM Prep			8781	10/04/21 08:38	DM	XEN MID
Total/NA	Analysis	8015B NM		1	8775	10/04/21 20:47	AJ	XEN MID
Soluble	Leach	DI Leach			8857	10/04/21 14:53	СН	XEN MID
Soluble	Analysis	300.0		1	8879	10/05/21 11:59	СН	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

10/5/2021

Job ID: 890-1349-1

Matrix: Solid

Matrix: Solid

SDG: 31403236.022.0129

Lab Sample ID: 890-1349-21

Lab Sample ID: 890-1349-22

**Accreditation/Certification Summary** 

Client: WSP USA Inc. Project/Site: Tiger cs

Job ID: 890-1349-1 SDG: 31403236.022.0129

#### Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Pr	ogram	Identification Number	Expiration Date
Texas	NE	ELAP	T104704400-21-22	06-30-22
The full sector shall				
the following analytes the agency does not c		ort, but the laboratory is r	not certified by the governing authority.	This list may include analytes for whic
0,		ort, but the laboratory is r Matrix	Not certified by the governing authority. Analyte	This list may include analytes for whic
the agency does not o	offer certification.	, , , , , , , , , , , , , , , , , , ,	, , , , , ,	This list may include analytes for whic

Job ID: 890-1349-1 SDG: 31403236.022.0129

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### **Protocol References:**

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

#### Sample Summary

Page 102 of 331

Job ID: 890-1349-1 SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger cs

890-1349-1PH01Solid09/30/21 11:0010/01/21 16:401890-1349-3PH01BSolid09/30/21 11:4010/01/21 16:403890-1349-4PH01CSolid09/30/21 11:5010/01/21 16:404890-1349-6PH01ESolid09/30/21 12:2010/01/21 16:406890-1349-7PH02Solid09/30/21 12:4010/01/21 16:401890-1349-8PH02ASolid09/30/21 13:0010/01/21 16:402890-1349-9PH02BSolid09/30/21 13:2010/01/21 16:403890-1349-12PH02ESolid09/30/21 14:1510/01/21 16:406890-1349-13PH03Solid09/30/21 14:3010/01/21 16:401890-1349-15PH03BSolid09/30/21 15:0010/01/21 16:403890-1349-16PH03CSolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:4510/01/21 16:404890-1349-20PH04Solid10/01/21 09:3010/01/21 16:401			Matrix	Collected	Received	Depth
890-1349-4PH01CSolid09/30/21 11:5010/01/21 16:404890-1349-6PH01ESolid09/30/21 12:2010/01/21 16:406890-1349-7PH02Solid09/30/21 12:4010/01/21 16:401890-1349-8PH02ASolid09/30/21 13:0010/01/21 16:402890-1349-9PH02BSolid09/30/21 13:2010/01/21 16:403890-1349-12PH02ESolid09/30/21 14:1510/01/21 16:406890-1349-13PH03Solid09/30/21 15:0010/01/21 16:401890-1349-15PH03BSolid09/30/21 15:0010/01/21 16:403890-1349-16PH03CSolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:1010/01/21 16:404890-1349-20PH04Solid10/01/21 16:401	90-1349-3	PH01	Solid	09/30/21 11:00	10/01/21 16:40	1
890-1349-6PH01ESolid09/30/21 12:2010/01/21 16:406890-1349-7PH02Solid09/30/21 12:4010/01/21 16:401890-1349-8PH02ASolid09/30/21 13:0010/01/21 16:402890-1349-9PH02BSolid09/30/21 13:2010/01/21 16:403890-1349-12PH02ESolid09/30/21 14:1510/01/21 16:406890-1349-13PH03Solid09/30/21 14:3010/01/21 16:401890-1349-15PH03BSolid09/30/21 15:0010/01/21 16:403890-1349-16PH03CSolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:1010/01/21 16:406890-1349-20PH04Solid10/01/21 09:3010/01/21 16:401		PH01B	Solid	09/30/21 11:40	10/01/21 16:40	3
890-1349-7PH02Solid09/30/21 12:4010/01/21 16:401890-1349-8PH02ASolid09/30/21 13:0010/01/21 16:402890-1349-9PH02BSolid09/30/21 13:2010/01/21 16:403890-1349-12PH02ESolid09/30/21 14:1510/01/21 16:406890-1349-13PH03Solid09/30/21 14:3010/01/21 16:401890-1349-15PH03BSolid09/30/21 15:0010/01/21 16:403890-1349-16PH03CSolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:4510/01/21 16:406890-1349-20PH04Solid10/01/21 09:3010/01/21 16:401	90-1349-4	PH01C	Solid	09/30/21 11:50	10/01/21 16:40	4
890-1349-8PH02ASolid09/30/21 13:0010/01/21 16:402890-1349-9PH02BSolid09/30/21 13:2010/01/21 16:403890-1349-12PH02ESolid09/30/21 14:1510/01/21 16:406890-1349-13PH03Solid09/30/21 14:3010/01/21 16:401890-1349-15PH03BSolid09/30/21 15:0010/01/21 16:403890-1349-16PH03CSolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:4510/01/21 16:406890-1349-20PH04Solid10/01/21 09:3010/01/21 16:401	90-1349-6	PH01E	Solid	09/30/21 12:20	10/01/21 16:40	6
890-1349-9PH02BSolid09/30/21 13:2010/01/21 16:403890-1349-12PH02ESolid09/30/21 14:1510/01/21 16:406890-1349-13PH03Solid09/30/21 14:3010/01/21 16:401890-1349-15PH03BSolid09/30/21 15:0010/01/21 16:403890-1349-16PH03CSolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:4510/01/21 16:406890-1349-20PH04Solid10/01/21 09:3010/01/21 16:401	90-1349-7	PH02	Solid	09/30/21 12:40	10/01/21 16:40	1
890-1349-12PH02ESolid09/30/21 14:1510/01/21 16:406890-1349-13PH03Solid09/30/21 14:3010/01/21 16:401890-1349-15PH03BSolid09/30/21 15:0010/01/21 16:403890-1349-16PH03CSolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:4510/01/21 16:406890-1349-20PH04Solid10/01/21 09:3010/01/21 16:401	90-1349-8	PH02A	Solid	09/30/21 13:00	10/01/21 16:40	2
890-1349-13       PH03       Solid       09/30/21 14:30       10/01/21 16:40       1         890-1349-15       PH03B       Solid       09/30/21 15:00       10/01/21 16:40       3         890-1349-16       PH03C       Solid       09/30/21 15:10       10/01/21 16:40       4         890-1349-18       PH03E       Solid       09/30/21 15:45       10/01/21 16:40       6         890-1349-20       PH04       Solid       10/01/21 09:30       10/01/21 16:40       1	90-1349-9	PH02B	Solid	09/30/21 13:20	10/01/21 16:40	3
890-1349-15PH03BSolid09/30/21 15:0010/01/21 16:403890-1349-16PH03CSolid09/30/21 15:1010/01/21 16:404890-1349-18PH03ESolid09/30/21 15:4510/01/21 16:406890-1349-20PH04Solid10/01/21 09:3010/01/21 16:401	90-1349-12	PH02E	Solid	09/30/21 14:15	10/01/21 16:40	6
890-1349-16         PH03C         Solid         09/30/21 15:10         10/01/21 16:40         4           890-1349-18         PH03E         Solid         09/30/21 15:45         10/01/21 16:40         6           890-1349-20         PH04         Solid         10/01/21 09:30         10/01/21 16:40         1	90-1349-13	PH03	Solid	09/30/21 14:30	10/01/21 16:40	1
890-1349-18         PH03E         Solid         09/30/21 15:45         10/01/21 16:40         6           890-1349-20         PH04         Solid         10/01/21 09:30         10/01/21 16:40         1	90-1349-15	PH03B	Solid	09/30/21 15:00	10/01/21 16:40	3
890-1349-20 PH04 Solid 10/01/21 09:30 10/01/21 16:40 1	90-1349-16	PH03C	Solid	09/30/21 15:10	10/01/21 16:40	4
	90-1349-18	PH03E	Solid	09/30/21 15:45	10/01/21 16:40	6
890-1349-21 PH04A Solid 10/01/21 09:45 10/01/21 16:40 2	90-1349-20	PH04	Solid	10/01/21 09:30	10/01/21 16:40	1
	90-1349-21	PH04A	Solid	10/01/21 09:45	10/01/21 16:40	2
890-1349-22 PH04B Solid 10/01/21 10:00 10/01/21 16:40 3	90-1349-22	PH04B	Solid	10/01/21 10:00	10/01/21 16:40	3
890-1349-25 PH04E Solid 10/01/21 11:15 10/01/21 16:40 6	90-1349-25	PH04E	Solid	10/01/21 11:15	10/01/21 16:40	6

neiintyiisited by: (Signature)	Belinguished by: (Signature)	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco. Its affiliates and subcontractors. It assigns standard terms and conditions of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Service. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.	Total 200.7 / 6010 200.8 / 6020: Circle Method(s) and Metal(s) to be analyzed	PHOZC	pHoZ'a	Pto 2A	PH02	PHay E	PHOI D	PHON C	Ofor 8	piloi A	Pitol	Sample Identification	3: Yes	Seals: Ye	Temperature (°C):	CEIPT	Sampler's Name: Benjamin Belill	NAPP	Project Number: 3 (403236.	Project Name: Tiger Co	Phone: 432.236.3849	City, State ZIP: Midland, TX 79705	Address: 3300 North A Street		Project Manager: Kale J	LABORATORIES
	Beceived by (Signature)	uishment of samples constitutes a st of samples and shall not assume applied to each project and a charg	œ	$V \downarrow 3$		1	ch 21	121	021	1.50	0411	0211 1 20	5 9/30/21 1100	Matrix Date Time Sampled Sampled	N/A)	NA	No S.2 /	nk: Yes No		323 13 76	022.0129			705	street		CARMES S	
	innature)	valid purchase order from cli any responsibility for any lo ge of \$5 for each sample sub	RCRA 13PPM Texas 11 A	40 4	20 3	2 00	-	20 6'	s 5.	4	2 2	0	0	oled Depth Numb		-0.7	hermometer ID	No	Due Date:	Rush: 24HR	Routine	Turn Around	Email: ben.belill@wsp.com	City, State ZIP:	Address:	Company Name:	Bill to: (if different)	uiston, I X (281) 240-4200 Midland, TX (432-704-5440) 5-392-7550) Phoenix, AZ
0/1/21@1640	Date/Time	ent company to Xenco, its a sses or expenses incurred mitted to Xenco, but not an	l Sb As Ba Sb As Ba	VINI VIN									A X Y	TPH (E BTEX ( Chlorid	(EPA	015) 0=80	21)						.com	Carlsbad, NM 88220	3104 E Green Street	XTO Energy	Adrian Baker	Dallas, FX (214) 902-000 EL Paso,TX (915)585-3 (480-355-0900) Atlanta,C
⊕ 4 ≥	Relinguished by: (Signature)	ffillates and subcontractors. It assigns standa by the client if such losses are due to circumst alyzed. These terms will be enforced unless pro	Be B Cd Ca Cr Co Cu Fe Pb Mg Mn Mo Be Cd Cr Co Cu Pb Mn Mo Ni Se Ag Tl L						X					+		890-1349 Chain of Custody						ANALYSIS REQUEST	Delive			Prog		Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (413-620-2000)
	Received by: (Signature)	It assigns standard terms and conditions a due to circumstances beyond the control forced unless previously negotiated.	Ni K Se Ag SiO2 J																			-	Deliverables: EDD L ADaPT L	] evel III	] "	Program: UST/PST PRP prownfields	Work Order Comments	00) <u>www.xenco.com</u>
Revised	e) Date/Time		2 Na Sr TI Sn U V Zn 1631 / 245.1 / 7470 / 7471 : Hg									PM natities	Hold Samples unti	Sample Comments	lab, if received by 4:30pm	TAT starts the day recevied by the			1001202202	12H		Work Order Notes	Cther:		ב ו	elds RC uperfund L		Page of 3

Page 103 of 331

Revised Date 051418 Rev 2018 1			6					5
			4					ω
			= chq! 012/	- 10/1		N.A	N.C	1 Bols
Signature) Date/Time	Received by: (Signature)	Relinquished by: (Signature)	Date/Time		Received by: (Signature)	Receiv	y: (Signature)	Relinquished by: (Signature)
	tances beyond the control eviously negotiated.	of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.	s or expenses incurred by red to Xenco, but not analy:	bility for any losse ch sample submitt	not assume any responsi t and a charge of \$5 for ea	of samples and shall pplied to each projec	e liable only for the cost harge of \$75.00 will be a	of service. Xenco will b of Xenco. A minimum c
	It assigns standard terms and conditions	iates and subcontractors. It assigns standa	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractors.	order from client	onstitutes a valid purchase	shment of samples co	document and relinquis	Notice: Signature of this
SiO2 Na Sr TI Sn U V Zn 1631 / 245.1 / 7470 / 7471 : Hg	Mn Mo Ni K Se Ag SiO2 Na Ag TI U <b>1631</b>	Sb As Ba Be B Cd Ca Cr Co Cu Fe Pb Mg Mn Mo N Sb As Ba Be Cd Cr Co Cu Pb Mn Mo Ni Se Ag TI U	Sb As Ba Be B Sb As Ba Be Cd	Texas 11 AI Sb	8RCRA 13PPM Texas 11 A TCLP / SPLP 6010: 8RCRA	) <b>20:</b> o be analyzed	otal 200.7 / 6010 200.8 / 6020: Circle Method(s) and Metal(s) to be analyzed	Total 200.7 / 6010 Circle Method(s) a
				4	1 2930	V 10/1/21	Prtou	
					1690		PH03F	
				2	54.51		PHO3 E	
					1530 S		PHO3D	
					1212 4		- I	
				5.	1570 3			
				2.	2 5 h H L		PHOS A	5
					1430		2 CHO	7
wattl PM withis					1415		32040	c
Hold Supples			XXX		1400	1516 5	PHOZD	P
Sample Comments			TPH (E BTEX Chlori	Depth Numb	Time Sampled	Matrix Date Sampled		Sample Identification
idb, il received by 4.30pm		<i>H</i>	(EPA de (E	er o	Total Containers:	NIA	als: Yes No	Sample Custody Seals:
TAT starts the day received by the			0=8 EPA :	Ľ.	Correction Factor: ~O-7	Ť	Yes	Cooler Custody Seals:
			300.0			No T,	)	Received Intact:
		) 		iner	Thermometer ID	<b>7</b> .0	5.2 1	Temperature (°C):
				No	o Wet Ice: (Tes	Temp Blank: Yes No		SAMPLE RECEIPT
2027031001					Due Date:		Benjamin Belill	Sampler's Name:
Nat				AHR	76 Rush: 24	12323137	NAPP ZI	P.O. Number:
					012 9 Routine	6,022.0	3140323	Project Number:
Work Order Notes		ANALYSIS REQUEST		ound	Turn Around	C5	Tist	Project Name:
ADaPT U Other:	Deliverables: EDD	Deliv	B	Email: ben.belill@wsp.com	Email: ben.		432.236.3849	Phone:
Ċ	Reporting:Level IIevel III	Repo	Carlsbad, NM 88220	City, State ZIP:	City.	05	Midland, TX 79705	City, State ZIP:
]	State of Project:	SI	3104 E Green Street	SSS:	Address:	reet	3300 North A Street	Address:
PRP Brownfields RC Duperfund		Prog	XTO Energy	Company Name:	Com	1	WSP	Company Name:
Work Order Comments			Adrian Baker	Bill to: (if different)	Bill to	Jennings	Kale	Project Manager:
co.com Page 6 of	00) www.xenco.com	Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (813-620-2000)	0-355-0900) Atlanta,GA	Phoenix,AZ (48)	bbs,NM (575-392-7550)			
5		Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-3334 Midland,TX (432-704-5440) EL Paso,TX (915)565-3443 Lubbock,TX (806)794-1296	llas,TX (214) 902-0300   \$ L Paso,TX (915)585-344;	31) 240-4200 Da 32-704-5440) E	Houston,TX (28 Midland.TX (4	u U		×
der No:	Work Order No:	stody	Chain of Custody	C				



	client company to Xenco, its affiliates and subcontractors. It assigns standard terms and conditions         tosses or expenses incurred by the client if such losses are due to circumstances beyond the control         ubmitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.         Date/Time       Relinquished by: (Signature)	Al Sb As Ba Be B Cd Ca Cr Co Cu Fe Pb Mg Mn Mo Ni K Se Ag RA Sb As Ba Be Cd Cr Co Cu Pb Mn Mo Ni Se Ag Tl U							TPH (E	ber of Containers           EPA 8015)           (EPA 0=8021)           de (EPA 300.0) <i>HOLD</i>		ANALYSIS REQUEST	p.com Deliverables: EDD	Carlsbad, NM 88220 Reporting:Level II Level III	3104 E Green Street State of Project:		Adrian Baker Work Order Comments	Chain of Custody Work Order No: Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-3334 Midland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)794-1296 Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (813-620-2000) WWW.Xenco.com
N. Ow	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the contro of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated. Relinquished by: (Signature) Received by: (Signature) Date/Time Relinquished by: (Signature) Received b	Total 200.7 / 6010 200.8 / 6020: 8RCRA 13PPM Texas 11 A Circle Method(s) and Metal(s) to be analyzed TCLP / SPLP 6010: 8RCRA		F V V 1130	+	0101 0 1050 4	0001	0 2 2 ho 12/ Vol S + 104/21	Sample Identification Matrix Date Time Depth B	Sampler's Name:     Benjamin Benin       SAMPLE RECEIPT     Temp Blank:     Yes     No       Temperature (°C):     Sample Custody Seals:     Yes     No       Received Intact:     Yes     No     Tata A-oc       Cooler Custody Seals:     Yes     No     Main       Sample Custody Seals:     Yes     No     Total Containers:	31403236.0220129 NAPP 2123231376	Project Name: Tick CS Turn Around	Phone: 432.236.3849 Email: ben.belill@wsp.com	te ZIP:	3300 North A Street	WSP	Project Manager: KE I TEAN 455 Bill to: (It different)	Houston, TX (281) 240-4200 I Midland, TX (432-704-5440) Hobbs, NM (575-392-7550) Phoenix, AZ (4)

#### Received by OCD: 11/5/2021 12:00:19 PM

#### 10/5/2021

Page 105 of 331

# 1089 N Canal St. Eurofins Xenco, Carlsbad

# Chain of Custody Record

13

Seurofins Environment Testing

Carlsbad NM 88220 Dhone: 575.088.3100 Eav 575.088.3100						ŝ							3 <b>1</b> 31 <b>N</b> 01								-	America
Client Information (Sub Contract 1 ab)	Sampler <sup>,</sup>			Lab PM Kramer		lessica						Ca	Carrier Tracking No(s)	acking	No(s	Ĩ			COC No: 890-44	COC No: 890-442 1		
Client Contact: Shipping/Receiving	Phone:			E-Mail jessic	E-Maii lessica.kramer@eurofinset.com	ner@	eurofi	inset.	com			No Sta	State of Origin New Mexico	Drigin					Page.	Page Page 1 of 2		
Company <sup>-</sup> Eurofins Xenco					Accreditations Required (See note)	ations	Requir	na (Se	(See note)	1.2	Texas								-068 # qof	Job #: 890-1349-1		
Address. 1211 W Florida Ave	Due Date Requested 10/5/2021								Ana	lysis	Re	ğ	Requested	۳					P	Preservation Codes	)des	
City <sup>,</sup> Midland	TAT Requested (days)	's)			4					—-ľ								A G	() () () () () () () () () () () () () (	HCL NaOH Zn Acetate	ozs	M Hexane N - None O AsNaO2
State Zip. TX 79701						ТРН													ı m ç	D - Nitric Acid E NaHSO4	σου	P - Na2O4S Q Na2SO3
Phone: 432-704-5440(Tel)	PO #:				<u>)</u>	D) Ful	de											uille.	<u>ד ה ד</u>	r - MeOn G Amchlor H - Ascorbic Acid	ר מי י	- TSP Dodecahydrate
Email	WO #:				100000000000000000000000000000000000000	ep (MO	Chlori	TEX										<b>s</b>		lce DI Water	< c	Acetone MCAA
Project Name Tiger cs	Project #: 89000004					_S_Pro	EACH	OD) B										taine		EDA	NS	v pH 4-5 other (specify)
Site:	SSOW#:					015NM	BD/DI_L		:v									of con	Other	9		
				Matrix (M=water S=solid, O=waste/oil,	eld Filtered erform MS/N	16MOD_NM/8	0_ORGFM_2	21B/5035FP_	tal_BTEX_G			<u> </u>						stal Number				
	X	X	Preservation Code.	aal	Strain I	1 4		ing in	beri .				General	lined f	gingandi No			X				
PH01 (890-1349-1)	9/30/21	11 00 Mountain		Solid		×	×	×	×									24	<u>ka indedil</u>			
PH01B (890-1349-3)	9/30/21	11 40 Mountain		Solid		×	×	×	×										Contester with			
PH01C (890-1349-4)	9/30/21	11 50 Mountain		Solid		×	×	×	×										aliteri di anti			
PH01E (890-1349-6)	9/30/21	12 20 Mountain		Solid		×	×	×	×	—								<u>A</u>	12K, <u>A</u> , S			
PH02 (890-1349-7)	9/30/21	12 40 Mountain		Solid		×	×	×	×		┝──┦								and the state of the second			
PH02A (890-1349-8)	9/30/21	13 00 Mountain		Solid		×	×	×	×									1.20	herstenned			
PH02B (890-1349-9)	9/30/21	13 20 Mountain		Solid		×	×	×	×										issen and			
PH02E (890-1349-12)	9/30/21	14 15 Mountain		Solid		×	×	×	×										Strain 3			
PH03 (890-1349-13)	9/30/21	14 30 Mountain		Solid		×	×	×	×			<u> </u>					<u> </u>		t <u>e stå</u> l			
Note: Since laboratory accreditations are subject to change Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody if the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC aboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC aboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC aboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC aboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC aboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC.	olaces the ownership o being analyzed the sa e signed Chain of Cus	of method anali mples must be tody attesting to	yte & accreditat shipped back to said complica	ion complianc the Eurofins nce to Eurofin	e upon . Xenco L s Xenco	out sub LC lab	oraton	ct labc y or oth	natorie ner ins	ss. Thi truction	s sam าร will	ple sh be pro	ipmer wided	t is fo Any	warde	es to	er cha accre	ain-of- ditatio	-custo >n stat	dy if the labo tus should be t	ratory prough	does not currently nt to Eurofins Xenco LLC
Possible Hazard Identification					Sa	Sample Disposal ( A f	Disp	osal		ee ma	3d VE	ass	esse	dif	samp	les a		etair	1ed I	may be assessed if samples are retained longer than	11 m	1 month)
Deliverable Requested 1, II 1II, IV Other (specify)	Primary Deliverable Rank.	ble Rank. 2			<u></u>	Special Instructions/QC	al Instructions/QC	iction	s/QC	Req	Requirements	lents	ints	by	a			Ę	ALCHING FOR			WUTUS
Empty Kit Relinguished by		Data					, ,						ş	Method of Shinment	Shi Shi	ment						
Relinglished by All	Date/Time 104/21		2 0	Company		Rece	Received by		3	A	Z	$\mathcal{C}$	10		<u>,</u> <u></u>	Date/Time:	F) (	on the state of th	Ŷ			Company
Relinquished by	Date/Time		2	ompany .			Sed b					ł			3	Date/Time	Þ		+	512		ompoov .
				Company		Nece	Veceived by														L,	Company
Custody Seals Intact: Custody Seal No						Coole	Cooler Temperature(s) °C	peratu	re(s) °		and Other Remarks	Rema	кs		19 E	ψ	à	M.				

Ver 06/08/2021

Eurofins Xenco, Carlsbad
1089 N Canal St
Carlsbad NM 88220
Phone 575-988-3199 Fax: 575-988-3199

# Chain of Custody Record

13

🐝 eurofins

**Environment Testing** 

America

State Zip. TX, 79701 PH03C (890-1349-16) PH03B (890-1349-15) Vote: Since laboratory accreditations are subject to change Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shippment is forwarded under chain-of-custody. If the laboratory does not currently naintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed. the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC. PH04E (890-1349-25) PH04A (890-1349-21) PH04 (890-1349-20) PH03E (890-1349-18) Sample Identification - Client ID (Lab ID) 432-704-5440(Tel) Deliverable Requested 1 II III IV Other (specify) Possible Hazard Identification <sup>2</sup>H04B (890-1349-22) **Client Information** liger cs roject Name **Aidland** 211 W Florida Ave Cless Cless hipping/Receiving ent Contact Irofins Xenco confirmed (Sub Contract Lab) Sampler 89000004 WO # PO# Due Date Requested 10/5/2021 Phone Primary Deliverable Rank SSOW# FAT Requested (days): Sample Date roject # 9/30/21 9/30/21 9/30/21 10/1/21 10/1/21 10/1/21 10/1/21 Mountain 11 15 Mountain 09 30 Mountain 10 00 Mountain 09 45 Mountain 15 45 Mountain 15 10 Mountair Sample 15 00 Time N (C=comp, G=grab) Sample Preservation Code: Type BT=Tissue, A=AI O=waste/oll Matrix (W=water S=solid, Solid Solid Solid Solid Solid Solid Solid E-Mail Kramer Jessica jessica kramer@eurofinset.com Lab PM. **Field Filtered Sa** nple (Yes or No) NELAP - Louisiana NELAP - Texas creditations Required (See note) Perform MS/MSD (Yes or No) Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)

Return To Client Disposal By Lab Archive For Mon Special Instructions/QC Requirements × × 8015MOD\_NM/8015NM\_S\_Prep (MOD) Full TPH ×  $\times$ × × × × 300\_ORGFM\_28D/DI\_LEACH Chloride × × × × × × × × 8021B/5035FP\_Calc (MOD) BTEX × ×  $\times$ × × × × × Total\_BTEX\_GCV × × × × Analysis Requested State of Origin New Mexico Carrier Tracking No(s) **Total Number of containers** Ŵ æ ÷ -A HCL B NaOH C-Zn Acetate D Nitric Acid F MaHSO4 F MaCH G-Amchlor H Ascorbic Acid J I loe J DI Water K-EDTA L EDA COC No 890-442 2 Page Preservation Codes 890-1349-1 uner age 2 of 2 Special Instructions/Note M Hexane N None O AsNaO2 P--Na2CAS Q Na2SO3 R - Na2SCO3 S H2SO4 T TSP Dodecahydrate U Aceb Dodecahydrate U Aceb Nodecahydrate U Aceb Nodecahydrate ΝŚ other (specify) Months

mpty Kit Relinquished by

Wished by

elinquished by

Jate/Time

Company

Received by

Cooler Temperature(s) °C and Other Remarks

Ver 06/08/202

Kece

C

Date

Company

Ime

Method of Shipment: Date/Time Date/Time

iquishec

Custody Seals Intact: ∆ Yes ∆ No

Custody Seal No

Company

Company

Job Number: 890-1349-1

#### Login Sample Receipt Checklist

Client: WSP USA Inc.

#### Login Number: 1349 List Number: 1 Creator: Olivas, Nathaniel

<6mm (1/4").

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	N/A	

SDG Number: 31403236.022.0129 List Source: Eurofins Xenco, Carlsbad 5 6 7 8 9 10 11 12 13 14
## Login Sample Receipt Checklist

Client: WSP USA Inc.

#### Login Number: 1349 List Number: 2 Creator: Kramer, Jessica

Job Number: 890-1349-1 SDG Number: 31403236.022.0129

SDG Number: 31403236.022.0129
List Source: Eurofins Xenco, Midland

#### List Creation: 10/04/21 12:14 PM

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	3.2/3.7
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	

Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

# Environment Testing America

## **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

## Laboratory Job ID: 890-1363-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger C

## For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Kalei Jennings

RAMER

Authorized for release by: 10/13/2021 4:30:23 PM

Jessica Kramer, Project Manager (432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access Have a Question? Ask-The Expert

www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Visit us at:

Laboratory Job ID: 890-1363-1 SDG: 31403236.022.0129

Page 111 of 331

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	11
QC Sample Results	12
QC Association Summary	17
Lab Chronicle	20
Certification Summary	23
Method Summary	24
Sample Summary	25
Chain of Custody	26
Receipt Checklists	29

Client: WSP USA Inc. Project/Site: Tiger C

Page 112 of 331

Job ID: 890-1363-1
SDG: 31403236.022.0129

Qualifiers		3
GC VOA		
Qualifier	Qualifier Description	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	5
GC Semi VOA		
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
U	Indicates the analyte was analyzed for but not detected.	
HPLC/IC		
Qualifier	Qualifier Description	8
U	Indicates the analyte was analyzed for but not detected.	
Glossary		9
Abbreviation	These commonly used abbreviations may or may not be present in this report.	
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis	
%R	Percent Recovery	
CFL	Contains Free Liquid	
CFU	Colony Forming Unit	
CNF	Contains No Free Liquid	
DER	Duplicate Error Ratio (normalized absolute difference)	12
Dil Fac	Dilution Factor	13
DL	Detection Limit (DoD/DOE)	
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample	
DLC	Decision Level Concentration (Radiochemistry)	
EDL	Estimated Detection Limit (Dioxin)	
	Limit of Detection (DoD/DOE)	
LOD		
LOD LOQ	Limit of Delection (DoD/DOE) Limit of Quantitation (DoD/DOE)	

MDA Minimum Detectable Activity (Radiochemistry)

MDC Minimum Detectable Concentration (Radiochemistry)

- MDL Method Detection Limit Minimum Level (Dioxin) ML MPN Most Probable Number
- Method Quantitation Limit MQL NC Not Calculated ND Not Detected at the reporting limit (or MDL or EDL if shown)
- NEG Negative / Absent
- POS Positive / Present
- Practical Quantitation Limit PQL
- PRES Presumptive
- QC Quality Control Relative Error Ratio (Radiochemistry) RER
- RL Reporting Limit or Requested Limit (Radiochemistry)
- RPD Relative Percent Difference, a measure of the relative difference between two points
- TEF Toxicity Equivalent Factor (Dioxin)
- TEQ Toxicity Equivalent Quotient (Dioxin)
- TNTC Too Numerous To Count

4

Job ID: 890-1363-1 SDG: 31403236.022.0129

#### Job ID: 890-1363-1

Client: WSP USA Inc.

Project/Site: Tiger C

#### Laboratory: Eurofins Xenco, Carlsbad

#### Narrative

Job Narrative 890-1363-1

#### Receipt

The samples were received on 10/5/2021 2:43 PM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 1.0°C

#### GC VOA

Method 8021B: Surrogate recovery for the following sample was outside control limits: PH06A (890-1363-8). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (880-7011-A-21-D). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Method: 8021B - Volatile Organic Compounds (GC)

Result Qualifier

<0.00200 U

<0.00200 U

<0.00200 U

<0.00401 U

<0.00200 U

<0.00401 U

## **Client Sample Results**

RL

0.00200

0.00200

0.00200

0.00401

0.00200

0.00401

Unit

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

D

Prepared

10/12/21 16:16

10/12/21 16:16

10/12/21 16:16

10/12/21 16:16

10/12/21 16:16

10/12/21 16:16

Client: WSF	<sup>o</sup> USA Inc.
Project/Site	: Tiger C

### **Client Sample ID: PH05**

Date Collected: 10/01/21 11:40 Date Received: 10/05/21 14:43

Sample Depth: 1

Analyte

Benzene

Toluene

o-Xylene

Ethylbenzene

Xylenes, Total

m-Xylene & p-Xylene

Job ID: 890-1363-1 SDG: 31403236.022.0129

## Lab Sample ID: 890-1363-1

Analyzed

10/13/21 13:44

10/13/21 13:44

10/13/21 13:44

10/13/21 13:44

10/13/21 13:44

10/13/21 13:44

Matrix: Solid

Dil Fac

1

1

1

1

1

1

5
8
9
13

Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	107		70 - 130			10/12/21 16:16	10/13/21 13:44	
1,4-Difluorobenzene (Surr)	80		70 - 130			10/12/21 16:16	10/13/21 13:44	
Method: Total BTEX - Total BTEX	(Calculation							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00401	U	0.00401	mg/Kg			10/13/21 13:00	
Method: 8015 NM - Diesel Range	Organics (DR	O) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.9	U	49.9	mg/Kg			10/11/21 09:42	1
Method: 8015B NM - Diesel Rang	ge Organics (D	RO) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9	mg/Kg		10/09/21 12:20	10/10/21 17:04	,
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9	mg/Kg		10/09/21 12:20	10/10/21 17:04	
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/09/21 12:20	10/10/21 17:04	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1-Chlorooctane	106		70 - 130			10/09/21 12:20	10/10/21 17:04	
o-Terphenyl	118		70 - 130			10/09/21 12:20	10/10/21 17:04	î
Method: 300.0 - Anions, Ion Chro	omatography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	37.3		4.97	mg/Kg			10/12/21 22:33	1
lient Sample ID: PH05D						Lab San	nple ID: 890-	1363-5
ate Collected: 10/01/21 12:40							Matri	x: Solid
ate Received: 10/05/21 14:43								
ample Depth: 5								
Method: 8021B - Volatile Organio	c Compounds (	GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/12/21 16:16	10/13/21 14:04	1
Toluene	<0.00200	U	0.00200	ma/Ka		10/12/21 16·16	10/13/21 14.04	1

Surrogate 4-Bromofluorobenzene (Surr)	%Recovery 127	Qualifier	Limits 70 - 130		Prepared	Analyzed	Dil Fac
Xylenes, Total	<0.00401	U	0.00401	mg/Kg	10/12/21 16:16	10/13/21 14:04	1
o-Xylene	<0.00200	U	0.00200	mg/Kg	10/12/21 16:16	10/13/21 14:04	1
m-Xylene & p-Xylene	<0.00401	U	0.00401	mg/Kg	10/12/21 16:16	10/13/21 14:04	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg	10/12/21 16:16	10/13/21 14:04	1
Toluene	<0.00200	U	0.00200	mg/Kg	10/12/21 16:16	10/13/21 14:04	1
Benzene	<0.00200	U	0.00200	mg/Kg	10/12/21 16:16	10/13/21 14:04	1

Eurofins Xenco, Carlsbad

## **Client Sample Results**

Job ID: 890-1363-1
SDG: 31403236.022.0129

## Lab Sample ID: 890-1363-5 Matrix: Solid

Date Collected: 10/01/21 12:40 Date Recei d. 40/05/04 44.

**Client Sample ID: PH05D** 

Client: WSP USA Inc. Project/Site: Tiger C

Date Received: 10/05/21 14:43								
Sample Depth: 5								
Method: 8021B - Volatile Organic	: Compounds (	GC) (Conti	nued)					
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1,4-Difluorobenzene (Surr)	80		70 - 130			10/12/21 16:16	10/13/21 14:04	1
— Method: Total BTEX - Total BTEX	Calculation							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00401	U	0.00401	mg/Kg			10/13/21 13:00	1
	0							
Method: 8015 NM - Diesel Range					_	- ·		
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.8	U	49.8	mg/Kg			10/11/21 09:42	1
– Method: 8015B NM - Diesel Rang	e Organics (D	RO) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<49.8	U	49.8	mg/Kg		10/09/21 12:20	10/10/21 17:25	1
(GRO)-C6-C10								
Diesel Range Organics (Over	<49.8	U	49.8	mg/Kg		10/09/21 12:20	10/10/21 17:25	1
C10-C28)								
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/09/21 12:20	10/10/21 17:25	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
1-Chlorooctane	120		70 - 130	10/09/21 12:20	10/10/21 17:25	1
o-Terphenyl	129		70 - 130	10/09/21 12:20	10/10/21 17:25	1

Method: 300.0 - Anions, Ion Chromatography - Soluble										
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac		
Chloride	14.1		5.00	mg/Kg			10/12/21 22:39	1		

#### **Client Sample ID: PH05E**

Date Collected: 10/01/21 12:50 Date Received: 10/05/21 14:43 Sample Depth: 6

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	< 0.00202	U	0.00202	mg/Kg		10/12/21 16:16	10/13/21 14:25	1
Toluene	<0.00202	U	0.00202	mg/Kg		10/12/21 16:16	10/13/21 14:25	1
Ethylbenzene	<0.00202	U	0.00202	mg/Kg		10/12/21 16:16	10/13/21 14:25	1
m-Xylene & p-Xylene	<0.00404	U	0.00404	mg/Kg		10/12/21 16:16	10/13/21 14:25	1
o-Xylene	<0.00202	U	0.00202	mg/Kg		10/12/21 16:16	10/13/21 14:25	1
Xylenes, Total	<0.00404	U	0.00404	mg/Kg		10/12/21 16:16	10/13/21 14:25	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	124		70 - 130			10/12/21 16:16	10/13/21 14:25	1
1,4-Difluorobenzene (Surr)	87		70 - 130			10/12/21 16:16	10/13/21 14:25	1
Method: Total BTEX - Total BTE	X Calculation							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00404	U	0.00404	mg/Kg			10/13/21 13:00	1
Method: 8015 NM - Diesel Rang	e Organics (DR	0) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
		U	50.0				10/11/21 09:49	

Eurofins Xenco, Carlsbad

Lab Sample ID: 890-1363-6

Matrix: Solid

Matrix: Solid

### **Client Sample Results**

Job ID: 890-1363-1
SDG: 31403236.022.0129

Lab Sample ID: 890-1363-6

Lab Sample ID: 890-1363-7

## **Client Sample ID: PH05E**

Date Collected: 10/01/21 12:50 Date Received: 10/05/21 14:43

Client: WSP USA Inc. Project/Site: Tiger C

Sample Depth: 6								
Method: 8015B NM - Diesel Rang	e Organics (D	RO) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/09/21 12:20	10/10/21 17:47	
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/09/21 12:20	10/10/21 17:47	
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/09/21 12:20	10/10/21 17:47	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
1-Chlorooctane	101		70 - 130			10/09/21 12:20	10/10/21 17:47	
o-Terphenyl	110		70 - 130			10/09/21 12:20	10/10/21 17:47	

## Method: 300.0 - Anions, Ion Chromatography - Soluble

	Analyte	Result Qualifier	RL	Unit	U	Prepared	Analyzed	Dil Fac
L	Chloride	14.0	5.02	mg/Kg			10/12/21 22:44	1
L	Chloride	14.0					10/12/21 22:44	

#### **Client Sample ID: PH06**

Date Collected: 10/01/21 13:00 Date Received: 10/05/21 14:43

Sample Depth: 1

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00199	U	0.00199	mg/Kg		10/12/21 16:16	10/13/21 14:45	1
Toluene	0.00293		0.00199	mg/Kg		10/12/21 16:16	10/13/21 14:45	1
Ethylbenzene	0.0115		0.00199	mg/Kg		10/12/21 16:16	10/13/21 14:45	1
m-Xylene & p-Xylene	0.0182		0.00398	mg/Kg		10/12/21 16:16	10/13/21 14:45	1
o-Xylene	0.0150		0.00199	mg/Kg		10/12/21 16:16	10/13/21 14:45	1
Xylenes, Total	0.0332		0.00398	mg/Kg		10/12/21 16:16	10/13/21 14:45	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	126		70 - 130			10/12/21 16:16	10/13/21 14:45	1
1,4-Difluorobenzene (Surr)	82		70 - 130			10/12/21 16:16	10/13/21 14:45	1
		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Method: Total BTEX - Total BTEX Analyte Total BTEX		Qualifier	<b>RL</b> 0.00398	Unit mg/Kg	<u>D</u>	Prepared	Analyzed	Dil Fac
Analyte Total BTEX	Result 0.0476				D	Prepared		Dil Fac
Analyte Total BTEX Method: 8015 NM - Diesel Range	e Organics (DR				<u>D</u> 	Prepared		Dil Fac 1 Dil Fac
Analyte	e Organics (DR	O) (GC) Qualifier	0.00398	mg/Kg			10/13/21 13:00	1
Analyte Total BTEX Method: 8015 NM - Diesel Range Analyte	e Organics (DR Result Result <49.9	O) (GC) Qualifier U	0.00398 RL	mg/Kg Unit			10/13/21 13:00 Analyzed	1
Analyte Total BTEX Method: 8015 NM - Diesel Range Analyte Total TPH Method: 8015B NM - Diesel Rang	e Organics (DR Result Result <49.9 ge Organics (D	O) (GC) Qualifier U	0.00398 RL	mg/Kg Unit			10/13/21 13:00 Analyzed	1 Dil Fac
Analyte Total BTEX Method: 8015 NM - Diesel Range Analyte Total TPH Method: 8015B NM - Diesel Rang Analyte Gasoline Range Organics	e Organics (DR Result Result <49.9 ge Organics (D	O) (GC) Qualifier U RO) (GC) Qualifier	0.00398	mg/Kg	D	Prepared	10/13/21 13:00 Analyzed 10/11/21 09:49	1 Dil Fac
Analyte Total BTEX Method: 8015 NM - Diesel Range Analyte Total TPH	e Organics (DR Result Result <49.9 ge Organics (D Result	O) (GC) Qualifier U RO) (GC) Qualifier U	0.00398	mg/Kg Unit mg/Kg Unit	D	Prepared	10/13/21 13:00           Analyzed           10/11/21 09:49           Analyzed	1

Released to Imaging: 3/14/2022 1:38:16 PM

5

ac

1

1

ac

1

Matrix: Solid

		Clien	t Sample Re	sults				
Client: WSP USA Inc.							Job ID: 890	
Project/Site: Tiger C						SD	G: 31403236.0	22.0129
Client Sample ID: PH06						Lab San	nple ID: 890-	1363-7
Date Collected: 10/01/21 13:00							Matri	ix: Solid
Date Received: 10/05/21 14:43								
Sample Depth: 1								
_ Method: 300.0 - Anions, Ion Chro	omatography -	Solublo						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	108		5.02	mg/Kg			10/12/21 02:55	1
Client Sample ID: PH06A						Lab San	nple ID: 890-	1363-8
Date Collected: 10/01/21 13:15							-	x: Solid
Date Received: 10/05/21 14:43								
Sample Depth: 2								
_	_							
Method: 8021B - Volatile Organi					_			
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00198	U	0.00198	mg/Kg		10/12/21 16:16	10/13/21 15:06	1
Toluene	0.0145		0.00198	mg/Kg		10/12/21 16:16	10/13/21 15:06	1
Ethylbenzene	0.0525		0.00198	mg/Kg		10/12/21 16:16	10/13/21 15:06	1
m-Xylene & p-Xylene	0.0936		0.00397	mg/Kg		10/12/21 16:16	10/13/21 15:06	1
o-Xylene	0.0436		0.00198	mg/Kg		10/12/21 16:16	10/13/21 15:06	1
Xylenes, Total	0.137		0.00397	mg/Kg		10/12/21 16:16	10/13/21 15:06	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	157	S1+	70 - 130			10/12/21 16:16	10/13/21 15:06	1
1,4-Difluorobenzene (Surr)	80		70 - 130			10/12/21 16:16	10/13/21 15:06	1
_ Method: Total BTEX - Total BTEX	X Calculation							
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.204		0.00397	mg/Kg			10/13/21 13:00	1
	0							
Method: 8015 NM - Diesel Range Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	55.5	quamor	49.8	mg/Kg			10/11/21 09:49	1
				5 5				
Method: 8015B NM - Diesel Rang	ge Organics (D	RO) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	55.5		49.8	mg/Kg		10/09/21 12:20	10/10/21 18:30	1
Diesel Range Organics (Over	<49.8	U	49.8	mg/Kg		10/09/21 12:20	10/10/21 18:30	1
C10-C28)		-						
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/09/21 12:20	10/10/21 18:30	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	108		70 - 130			10/09/21 12:20	10/10/21 18:30	1
			70 - 130			10/09/21 12:20	10/10/21 18:30	1
o-Terphenyl	119							
o-Terphenyl  Method: 300.0 - Anions, Ion Chro Analyte	omatography -	Soluble Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac

Eurofins Xenco, Carlsbad

## **Client Sample Results**

Job ID: 890-1363-1 SDG: 31403236.022.0129

## **Client Sample ID: PH06B**

Date Collected: 10/01/21 13:30 Date Received: 10/05/21 14:43

Sample Depth: 3

Client: WSP USA Inc.

Project/Site: Tiger C

Lab Sample ID: 890-1363-9 Matrix: Solid

Analyzed

10/13/21 15:26

10/13/21 15:26

10/13/21 15:26

10/13/21 15:26

10/13/21 15:26

10/13/21 15:26

Analyzed

10/13/21 15:26

10/13/21 15:26

5

Dil Fac

1

1

1

Dil Fac	9
1 1	
Dil Fac	
1	
Dil Fac	13
1	

Method: 8021B - Volatile Organic Compounds (GC) Analyte Result Qualifier Unit RL D Prepared Benzene <0.00198 U 0.00198 mg/Kg 10/12/21 16:16 Toluene 0.00600 0.00198 mg/Kg 10/12/21 16:16 Ethylbenzene <0.00198 U 0.00198 mg/Kg 10/12/21 16:16 m-Xylene & p-Xylene <0.00397 U 0.00397 10/12/21 16:16 mg/Kg o-Xylene <0.00198 U 0.00198 mg/Kg 10/12/21 16:16 Xylenes, Total <0.00397 U 0.00397 mg/Kg 10/12/21 16:16 Surrogate %Recovery Qualifier Limits Prepared 4-Bromofluorobenzene (Surr) 70 - 130 10/12/21 16:16 121 79 70 - 130 10/12/21 16:16 1,4-Difluorobenzene (Surr) Method: Total BTEX - Total BTEX Calculation Analyte Result Qualifier RL Unit D Prepared

Analyzed Total BTEX 0.00600 0.00397 mg/Kg 10/13/21 13:00 Method: 8015 NM - Diesel Range Organics (DRO) (GC)

Analyte	Result Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.8 U	49.8	mg/Kg			10/11/21 09:49	1

Method: 8015B NM - Diesel Rang								
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.8	U	49.8	mg/Kg		10/09/21 12:20	10/10/21 18:51	1
Diesel Range Organics (Over C10-C28)	<49.8	U	49.8	mg/Kg		10/09/21 12:20	10/10/21 18:51	1
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/09/21 12:20	10/10/21 18:51	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	102		70 - 130			10/09/21 12:20	10/10/21 18:51	1
o-Terphenyl	113		70 - 130			10/09/21 12:20	10/10/21 18:51	1

Method: 300.0 - Anions, Ion Chromatography - Soluble									
	Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
	Chloride	217		5.05	mg/Kg			10/12/21 03:18	1

## **Client Sample ID: PH06E** Date Collected: 10/01/21 13:50 Date Received: 10/05/21 14:43

Sample Depth: 6

Method: 8021B - Volatile Orga	nic Compounds (							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	< 0.00199	U	0.00199	mg/Kg		10/12/21 16:16	10/13/21 15:47	1
Toluene	<0.00199	U	0.00199	mg/Kg		10/12/21 16:16	10/13/21 15:47	1
Ethylbenzene	<0.00199	U	0.00199	mg/Kg		10/12/21 16:16	10/13/21 15:47	1
m-Xylene & p-Xylene	<0.00398	U	0.00398	mg/Kg		10/12/21 16:16	10/13/21 15:47	1
o-Xylene	<0.00199	U	0.00199	mg/Kg		10/12/21 16:16	10/13/21 15:47	1
Xylenes, Total	<0.00398	U	0.00398	mg/Kg		10/12/21 16:16	10/13/21 15:47	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	116		70 - 130			10/12/21 16:16	10/13/21 15:47	1

Eurofins Xenco, Carlsbad

Lab Sample ID: 890-1363-12

Released to Imaging: 3/14/2022 1:38:16 PM

Matrix: Solid

## **Client Sample Results**

Job ID: 890-1363-1 SDG: 31403236.022.0129

## Lab Sample ID: 890-1363-12

Matrix: Solid

Date Collected: 10/01/21 13:50 Date Received: 10/05/21 14:43

**Client Sample ID: PH06E** 

Client: WSP USA Inc.

Project/Site: Tiger C

Sample Depth: 6

Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1,4-Difluorobenzene (Surr)	80		70 - 130			10/12/21 16:16	10/13/21 15:47	1
Method: Total BTEX - Total BTE)	Calculation							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00398	U	0.00398	mg/Kg			10/13/21 13:00	1
Method: 8015 NM - Diesel Range	Organics (DR	0) (GC)						
Analyte	- · ·	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/11/21 09:49	1
Method: 8015B NM - Diesel Rang	ne Organics (D	RO) (GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<50.0	U	50.0	mg/Kg		10/09/21 12:20	10/10/21 19:13	1
(GRO)-C6-C10								
Diesel Range Organics (Over	<50.0	U	50.0	mg/Kg		10/09/21 12:20	10/10/21 19:13	1
C10-C28) Oll Range Organics (Over C28-C36)	<50.0		50.0	mg/Kg		10/09/21 12:20	10/10/21 19:13	1
On Mange Organics (Over C20-C30)	~50.0	0	50.0	iliy/Ny		10/09/21 12.20	10/10/21 19.13	I
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	109		70 - 130			10/09/21 12:20	10/10/21 19:13	1
o-Terphenyl	119		70 - 130			10/09/21 12:20	10/10/21 19:13	1
	omatography -	Soluble						
Method: 300.0 - Anions, Ion Chro Analyte		Soluble Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac

```
10/13/2021
```

Job ID: 890-1363-1 SDG: 31403236.022.0129

Prep Type: Total/NA

Prep Type: Total/NA

#### Method: 8021B - Volatile Organic Compounds (GC) Matrix: Solid

Percent Surrogate Recovery (Acceptance Limits) BFB1 DFBZ1 Client Sample ID (70-130) (70-130) Lab Sample ID 890-1363-1 PH05 107 80 890-1363-5 PH05D 127 80 890-1363-6 PH05E 124 87 PH06 890-1363-7 126 82 890-1363-8 PH06A 157 S1+ 80 PH06B 79 890-1363-9 121 890-1363-12 PH06E 116 80 81 890-1374-A-1-G MSD Matrix Spike Duplicate 113 890-1374-A-1-I MS Matrix Spike 121 85 LCS 880-9327/1-A Lab Control Sample 112 85 LCSD 880-9327/2-A Lab Control Sample Dup 118 83 MB 880-9327/5-A 71 Method Blank 110 Surrogate Legend BFB = 4-Bromofluorobenzene (Surr) DFBZ = 1,4-Difluorobenzene (Surr)

## Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Matrix: Solid

_			
		1CO1	OTPH1
Lab Sample ID	Client Sample ID	(70-130)	(70-130)
880-7011-A-21-E MS	Matrix Spike	92	101
880-7011-A-21-F MSD	Matrix Spike Duplicate	99	109
890-1363-1	PH05	106	118
890-1363-5	PH05D	120	129
890-1363-6	PH05E	101	110
890-1363-7	PH06	107	117
890-1363-8	PH06A	108	119
890-1363-9	PH06B	102	113
890-1363-12	PH06E	109	119
LCS 880-9163/2-A	Lab Control Sample	97	96
LCSD 880-9163/3-A	Lab Control Sample Dup	102	101
MB 880-9163/1-A	Method Blank	109	121
Surrogate Legend			

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Eurofins Xenco, Carlsbad

Page 120 of 331

Client: WSP USA Inc.

## **QC Sample Results**

Page 121 of 331

Job ID: 890-1363-1 SDG: 31403236.022.0129

Project/Site: Tiger C Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-9327/5-A									Client Sa	mple ID: I	lethoo	d Blank
Matrix: Solid										Prep T	ype: To	otal/N/
Analysis Batch: 9368										Pre	Batcl	h: 932
	M	IB MB										
Analyte	Resu	ult Qualifier	RL		Unit		D	Р	repared	Analyz	əd	Dil Fa
Benzene	<0.0020	00 U	0.00200		mg/K	g	_	10/1	2/21 16:16	10/13/21	2:41	
Toluene	<0.0020	00 U	0.00200		mg/K	g		10/1	2/21 16:16	10/13/21	2:41	
Ethylbenzene	<0.0020	00 U	0.00200		mg/K	g		10/1	2/21 16:16	10/13/21	2:41	
m-Xylene & p-Xylene	<0.0040	00 U	0.00400		mg/K			10/1	2/21 16:16	10/13/21	2:41	
o-Xylene	<0.0020	00 U	0.00200		mg/K			10/1	2/21 16:16	10/13/21	2:41	
Xylenes, Total	<0.0040	00 U	0.00400		mg/K	-		10/1	2/21 16:16	10/13/21	2:41	
	N	IB MB										
Surrogate		ry Qualifier	Limits					P	repared	Analyz	ed	Dil Fa
4-Bromofluorobenzene (Surr)	-	10	70 - 130					10/1	2/21 16:16	10/13/21		
1,4-Difluorobenzene (Surr)	;	71	70 - 130					10/1	2/21 16:16	10/13/21	12:41	
Lab Sample ID: LCS 880-9327/1-A							с С	liont	Sample	ID: Lab Co	ntrol	Sampl
Matrix: Solid	•						U	nem	Sample	Prep T		
Analysis Batch: 9368			Spike	1.00	LCS					%Rec.	o Batcl	11. 932
Analysis			Spike Added		Qualifier	Unit		D	0/ Dee	Limits		
Analyte			0.100	0.08846	Quaimer	mg/Kg			88 88	70 <sub>-</sub> 130		
Toluene			0.100	0.08931					89	70 - 130 70 - 130		
			0.100	0.00931		mg/Kg			89 94	70 - 130 70 - 130		
Ethylbenzene						mg/Kg						
m-Xylene & p-Xylene			0.200	0.1960		mg/Kg			98	70 - 130		
o-Xylene			0.100	0.09808		mg/Kg			98	70 - 130		
	LCS L	cs										
Surrogate	%Recovery Q	ualifier	Limits									
4-Bromofluorobenzene (Surr)	112		70 - 130									
1,4-Difluorobenzene (Surr)	85		70 - 130									
Lab Sample ID: LCSD 880-9327/2-	A					Cli	ent	Sam	nole ID: L	ab Contro	l Samp	ole Dui
Matrix: Solid										Prep T		
Analysis Batch: 9368											Batcl	
			Spike	LCSD	LCSD					%Rec.		RPI
Analyte			Added	Result	Qualifier	Unit		D	%Rec	Limits	RPD	Lim
Benzene			0.100	0.09373		mg/Kg			94	70 - 130	6	3
Toluene			0.100	0.09698		mg/Kg			97	70 <sub>-</sub> 130	8	
Ethylbenzene			0.100	0.1013		mg/Kg			101	70 - 130	7	
m-Xylene & p-Xylene			0.200	0.2116		mg/Kg			106	70 <sub>-</sub> 130	8	
o-Xylene			0.100	0.1068		mg/Kg			107	70 - 130	8	
	LCSD L	CSD										
Surrogate	%Recovery Q	ualifier	Limits									
4-Bromofluorobenzene (Surr)	118		70 - 130									
1,4-Difluorobenzene (Surr)	83		70 - 130									
Lab Sample ID: 890-1374-A-1-G M	SD						Clie	nt Sa	ample ID:	Matrix Sp	ike Du	plicate
Matrix: Solid										Prep T		-
Analysis Batch: 9368											Batcl	
	Sample Sa	ample	Spike	MSD	MSD					%Rec.		RPI
Analyte	Result Q	•	Added		Qualifier	Unit		D	%Rec	Limits	RPD	Limi
Benzene	<0.00198 U		0.0990	0.09429		mg/Kg			95	70 - 130	11	3

70 - 130

96

<0.00198 U

Toluene

0.09461

mg/Kg

0.0990

10/13/2021

6

## **QC Sample Results**

Client: WSP USA Inc. Project/Site: Tiger C

Job ID: 890-1363-1 SDG: 31403236.022.0129

#### Method: 8021B - Volatile Organic Compounds (GC) (Continued)

m-Xylene & p-Xylene <	Sample Result 0.00198 0.00396 0.00198	Quali U		Spike Added	MSD Result					Prep Ba %Rec.		RPE
Ethylbenzene     <       m-Xylene & p-Xylene	<b>Result</b> 0.00198 0.00396	Quali U		Added						%Rec.		RPL
Ethylbenzene     <       m-Xylene & p-Xylene	0.00198 0.00396	U	fier		Result			_				
m-Xylene & p-Xylene <	0.00396					Qualifier	Unit	 D	%Rec			Limi
		U		0.0990	0.09854		mg/Kg		100	70 - 130	0	3
o-Xylene <	0 00100			0.198	0.2040		mg/Kg		103	70 - 130	1	3
	0.00190	U		0.0990	0.1031		mg/Kg		104	70 - 130	1	3
	MSD	MSD										
Surrogate %R	ecovery	Quali	fier	Limits								
4-Bromofluorobenzene (Surr)	113			70 - 130								
1,4-Difluorobenzene (Surr)	81			70 - 130								
Lab Sample ID: 890-1374-A-1-I MS									Client	Sample ID: Ma	trix Sı	pik
Matrix: Solid										Prep Type	: Tota	I/N/
Analysis Batch: 9368										Prep Ba		
-	Sample	Samp	le	Spike	MS	MS				%Rec.		
Analyte	Result	Quali	fier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Benzene <	0.00198	U		0.100	0.08471		mg/Kg		84	70 - 130		
Toluene <	0.00198	U		0.100	0.08921		mg/Kg		89	70 - 130		
Ethylbenzene <	0.00198	U		0.100	0.09814		mg/Kg		98	70 - 130		
m-Xylene & p-Xylene <	0.00396	U		0.201	0.2025		mg/Kg		101	70 <sub>-</sub> 130		
o-Xylene <	0.00198	U		0.100	0.1018		mg/Kg		101	70 - 130		
	MS	MS										
Surrogate %R	ecovery	Quali	fier	Limits								
4-Bromofluorobenzene (Surr)	121			70 - 130								
1,4-Difluorobenzene (Surr)	85			70 - 130								

MB	МВ			
%Recovery	Qualifier Limits	Prepared	Analyzed	Dil Fac
109	70 - 130	10/09/21 12:20	10/10/21 10:34	1
121	70 - 130	10/09/21 12:20	10/10/21 10:34	1

mg/Kg

10/09/21 12:20

50.0

<50.0 U

#### Lab Sample ID: LCS 880-9163/2-A Matrix: Solid Analysis Batch: 9173

Oll Range Organics (Over C28-C36)

Surrogate 1-Chlorooctane

o-Terphenyl

Analysis Batch: 9173							Pre	p Batch: 9163
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	895.2		mg/Kg		90	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	1051		mg/Kg		105	70 - 130	
C10-C28)								

Eurofins Xenco, Carlsbad

Prep Type: Total/NA

10/10/21 10:34

**Client Sample ID: Lab Control Sample** 

1

## **QC Sample Results**

Page 123 of 331

Job ID: 890-1363-1

SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger C

## Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Surrogate	%Recovery	Qualifier	Limits								
	MSD	MSD									
Diesel Range Organics (Over C10-C28)	<49.9	U F1	1000	102.3	F1	mg/Kg		10	70 - 130	7	2
(GRO)-C6-C10					-						
Analyte Gasoline Range Organics	- <b>Result</b> <49.9		1000	127.3		_ Unit mg/Kg			Limits 70 - 130	15	Lim
Analuto	•	Sample Qualifier	Spike Added		MSD Qualifier	Unit	D	% Baa	%Rec.	RPD	RP
Analysis Batch: 9173	Come la	Sample	Calles	MOD	MOD					p Batch	
Lab Sample ID: 880-7011-A-2 Matrix: Solid						CI	ent Sa	unpie iL	: Matrix Sp	ыке Dup Type: Tof	
Lab Comple ID: 990 7044 A (						0	ant C-	male IP	Moteler Or	sike Dur	lies
o-Terphenyl	101		70 - 130								
1-Chlorooctane	92		70 - 130								
Surrogate	%Recovery	Qualifier	Limits								
		MS									
C10-C28)											
Diesel Range Organics (Over	<49.9	U F1	997	95.37	F1	mg/Kg		10	70 - 130		
(GRO)-C6-C10						5 -5					
Gasoline Range Organics	- <u>- &lt;49.9</u>			109.6		mg/Kg		 	70 - 130		
Analyte	•	Qualifier	Added		Qualifier	Unit	D	%Rec	Limits		
Analysis Datch. 5175	Sample	Sample	Spike	MS	MS				%Rec.	p Daten	
Analysis Batch: 9173										p Batch	
Matrix: Solid								Chefft	Sample ID Prep 1	ype: To	
Lab Sample ID: 880-7011-A-2	21-E MS							Client	Sample ID	·Matrix	Snil
o-Terphenyl	101		70 - 130								
1-Chlorooctane	102		70 - 130								
Surrogate	%Recovery	Qualifier	Limits								
	LCSD	LCSD									
C10-C28)											
Diesel Range Organics (Over			1000	1041		mg/Kg		104	70 - 130	1	2
(GRO)-C6-C10											
Gasoline Range Organics			1000	908.6		mg/Kg		91	70 - 130	1	
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Lin
			Spike	LCSD	LCSD				%Rec.		RF
Analysis Batch: 9173										p Batch	
Matrix: Solid						oner				Type: To	
Lab Sample ID: LCSD 880-91	163/3-4					Clier	t Sam		_ab Contro	Sampl	
o-Terphenyl	96		70 - 130								
1-Chlorooctane	97		70 - 130								
Surrogate	%Recovery	Qualifier	Limits								
	LCS	LCS									
									FIE	p batch	. 910
Analysis Batch: 9173											
Matrix: Solid Analysis Batch: 9173										Type: Tot p Batch	

Client: WSP USA Inc.

Project/Site: Tiger C

## **QC Sample Results**

Job ID: 890-1363-1
SDG: 31403236.022.0129

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-9130/1-A Matrix: Solid											Client S	Sample ID:   Prep	Methoo Type: S	
Analysis Batch: 9244														
		MB	MB											
Analyte	R	esult	Qualifier		RL		Unit		<u>D</u>	Pi	repared	Analyz	ed	Dil Fac
Chloride	~	<5.00	U		5.00		mg/Kg	9				10/12/21	01:03	
Lab Sample ID: LCS 880-9130/2-A Matrix: Solid									Cli	ent	Sample	D: Lab Co Prep	ontrol S Type: S	
Analysis Batch: 9244														
				Spike			LCS			_	~ -	%Rec.		
Analyte Chloride				Added 250		245.7	Qualifier	Unit mg/Kg		D	98	Limits 90 - 110		
				200		240.7		mg/rtg			50	00-110		
Lab Sample ID: LCSD 880-9130/3-A Matrix: Solid	L .							Cli	ent S	Sam	ple ID: I	Lab Contro Prep	l Samp Type: S	
Analysis Batch: 9244														
Analyta				Spike Added			LCSD	Unit		D	%Rec	%Rec. Limits	RPD	RPD
Analyte				250		247.0	Qualifier	mg/Kg		<u> </u>	99	90 - 110	1	2
-				200		247.0		mg/rtg			00	00-110		20
Lab Sample ID: 880-6823-A-8-B MS Matrix: Solid											Client	Sample ID Prep	: Matrix Type: S	
Analysis Batch: 9244		-	<u>.</u>									~-		
• • •	Sample		•	Spike Added		MS	MS	Unit			% Dee	%Rec.		
						Result	Qualifier	Linit		D	%Rec	Limits		
Analyte Chloride Lab Sample ID: 880-6823-A-8-C MS	Result 1500	Qua		1250		2767		mg/Kg	Clien		102	90 <sub>-</sub> 110 <b>D: Matrix S</b> p		-
Chloride	1500						MSD	mg/Kg	Clien		102	90 <sub>-</sub> 110 <b>D: Matrix S</b> p	Dike Du Type: \$	Soluble
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244	1500 D	Sam	ple	1250		2767 MSD		mg/Kg	Clien		102	90 - 110 D: Matrix Sp Prep		Soluble
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte	1500 D Sample	Sam	ple	1250 Spike		2767 MSD	MSD	mg/Kg	Clien	_ t Sa	102	90 <sub>-</sub> 110 D: Matrix Sp Prep %Rec.	Type: §	Soluble RPI Limi
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride	1500 D Sample Result	Sam	ple	1250 Spike Added		2767 MSD Result	MSD	mg/Kg ( Unit	Clien	_ t Sa	102 ample ID %Rec 102	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110	<b>Type: \$</b>	Soluble RPI Limi
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A	1500 D Sample Result	Sam	ple	1250 Spike Added		2767 MSD Result	MSD	mg/Kg ( Unit	Clien	_ t Sa	102 ample ID %Rec 102	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID:	<b>Type: \$</b>	RPI Limi 2 d Blanl
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid	1500 D Sample Result	Sam	ple	1250 Spike Added		2767 MSD Result	MSD	mg/Kg ( Unit	Clien	_ t Sa	102 102 102 102 102	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID:	Type: S	RPI Limi 2 d Blanl
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid	1500 D Sample Result	Sam Qua	ple	1250 Spike Added		2767 MSD Result	MSD	mg/Kg ( Unit	Clien	_ t Sa	102 102 102 102 102	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID:	Type: S	RPI Limi 2 d Blanl
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	1250 Spike Added	RL	2767 MSD Result	MSD Qualifier	mg/Kg Unit mg/Kg	D	_ t Sa	102 102 102 102 102	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz	Type: §	RPI Limi 20 d Blani Soluble Dil Fa
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315	1500 D Sample Result 1500	Sam Qua	iple lifier MB Qualifier	1250 Spike Added		2767 MSD Result	MSD Qualifier	mg/Kg Unit mg/Kg		_ t Sa	102	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: 1 Prep	Type: §	Soluble RPI Limi 20 d Blani Soluble Dil Fae
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	1250 Spike Added		2767 MSD Result	MSD Qualifier	mg/Kg Unit mg/Kg	<u>D</u>	_ t Sa _ Pi	102 mple ID %Rec 102 Client S	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21 :	Type: §	RPI Limi 2 d Blani Soluble Dil Fa
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	1250 Spike Added		2767 MSD Result	MSD Qualifier	mg/Kg Unit mg/Kg	<u>D</u>	_ t Sa _ Pi	102 mple ID %Rec 102 Client S	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21	Type: §	Solubi RPI Limi 20 Blani Solubio Dil Fa
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	1250 Spike Added		2767 MSD Result	MSD Qualifier	mg/Kg Unit mg/Kg	<u>D</u>	_ t Sa _ Pi	102 mple ID %Rec 102 Client S	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21	Type: §	RPI Limi 2 d Blanl Soluble Dil Fa
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A Matrix: Solid	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	1250 Spike Added		2767 MSD Result 2771	MSD Qualifier	mg/Kg Unit mg/Kg	<u>D</u>	_ t Sa _ Pi	102 mple ID %Rec 102 Client S	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21	Type: §	Soluble RPE Limi 20 Blank Soluble Dil Fae Sample
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A Matrix: Solid Analysis Batch: 9315 Analyte Analysis Batch: 9315 Analyte	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	Spike Added 1250 Spike Added		2767 MSD Result 2771 LCS Result	MSD Qualifier Unit mg/Kg	Unit Unit mg/Kg	<u>D</u>	_ t Sa _ Pi	102 mple ID %Rec 102 Client S repared Sample %Rec	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID:   Prep Analyz 10/12/21 : 2 ID: Lab Co Prep %Rec. Limits	Type: §	Soluble RPE Limi 20 Blank Soluble Dil Fae Sample
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A Matrix: Solid Analysis Batch: 9315 Analyte Analysis Batch: 9315 Analyte	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	1250 Spike Added 1250 Spike		2767 MSD Result 2771	MSD Qualifier Unit mg/Kg	Unit mg/Kg	<u>D</u>	 D ent	102 mple ID %Rec 102 Client S repared Sample	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID:   Prep Analyz 10/12/21 : Prep %Rec.	Type: §	Soluble RPE Limi 20 Blank Soluble Dil Fae Sample
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Chloride Chloride	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	Spike Added 1250 Spike Added		2767 MSD Result 2771 LCS Result	MSD Qualifier Unit mg/Kg	Unit mg/Kg	D Cli	 D ent	102 mple ID %Rec 102 Client S repared Sample %Rec 99	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21 : Prep %Rec. Limits 90 - 110	Type: § RPD 0 Method Type: § 21:20 ontrol § Type: § 	Soluble RPC Limi 20 d Blank Soluble Dil Fac Sample Soluble
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/3-A	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	Spike Added 1250 Spike Added		2767 MSD Result 2771 LCS Result	MSD Qualifier Unit mg/Kg	Unit mg/Kg	D Cli	 D ent	102 mple ID %Rec 102 Client S repared Sample %Rec 99	90 - 110 90 - 110 91 Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21 : Prep %Rec. Limits 90 - 110 Lab Contro	RPD         0         Method         Type: \$         21:20         ontrol \$         Type: \$	Soluble RPC Limi 20 d Blank Soluble Dil Fac Soluble Soluble
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A Matrix: Solid	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	Spike Added 1250 Spike Added		2767 MSD Result 2771 LCS Result	MSD Qualifier Unit mg/Kg	Unit mg/Kg	D Cli	 D ent	102 mple ID %Rec 102 Client S repared Sample %Rec 99	90 - 110 90 - 110 91 Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21 : Prep %Rec. Limits 90 - 110 Lab Contro	Type: § RPD 0 Method Type: § 21:20 ontrol § Type: § 	Soluble RPC Limit 20 d Blank Soluble Dil Fac 1 Sample Soluble
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCSD 880-9136/3-A Matrix: Solid	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	Spike Added 1250 Spike Added		2767 MSD Result 2771 LCS Result 247.6	MSD Qualifier Unit mg/Kg	Unit mg/Kg	D Cli	 D ent	102 mple ID %Rec 102 Client S repared Sample %Rec 99	90 - 110 90 - 110 91 Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21 : Prep %Rec. Limits 90 - 110 Lab Contro	RPD         0         Method         Type: \$         21:20         ontrol \$         Type: \$	Soluble RPC Limit 20 d Blank Soluble Dil Fac 1 Sample Soluble
Chloride Lab Sample ID: 880-6823-A-8-C MS Matrix: Solid Analysis Batch: 9244 Analyte Chloride Lab Sample ID: MB 880-9136/1-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCS 880-9136/2-A Matrix: Solid Analysis Batch: 9315 Analyte Chloride Lab Sample ID: LCSD 880-9136/3-A Matrix: Solid	1500 D Sample Result 1500	Sam Qua MB esult	iple lifier MB Qualifier	1250 Spike Added 1250 Spike Added 250		MSD Result 2771 LCS Result 247.6	MSD Qualifier Unit mg/Kg LCS Qualifier	Unit mg/Kg	D Cli	 D ent	102 mple ID %Rec 102 Client S repared Sample %Rec 99	90 - 110 D: Matrix Sp Prep %Rec. Limits 90 - 110 Sample ID: I Prep Analyz 10/12/21 D: Lab Co Prep %Rec. Limits 90 - 110 Lab Contro Prep	RPD         0         Method         Type: \$         21:20         ontrol \$         Type: \$	Soluble RPC Limit 20 1 Blank Soluble Dil Fac 1 Sample Soluble Dil Dup Soluble

Eurofins Xenco, Carlsbad

Client: WSP USA Inc.

Project/Site: Tiger C

## **QC Sample Results**

Job ID: 890-1363-1
SDG: 31403236.022.0129

## Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: 890-1361	-A-14-D MS							Client	Sample ID	: Matrix	Spike
Matrix: Solid									Prep	Type: So	oluble
Analysis Batch: 9315											
	Sample	Sample	Spike	MS	MS				%Rec.		
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Chloride	154		253	409.9		mg/Kg		101	90 - 110		
	-A-14-E MSD					Cli	ent Sa	ample ID	: Matrix Sp Prep	oike Dup Type: So	
Matrix: Solid	-A-14-E MSD					Cli	ent Sa	ample ID			
Matrix: Solid		Sample	Spike	MSD	MSD	Cli	ent Sa	ample ID			oluble
Lab Sample ID: 890-1361 Matrix: Solid Analysis Batch: 9315 Analyte	Sample	Sample Qualifier	Spike Added		MSD Qualifier	Cli Unit	ent Sa D	ample ID %Rec	Prep		

Eurofins Xenco, Carlsbad

## **QC Association Summary**

Client: WSP USA Inc. Project/Site: Tiger C

Job ID: 890-1363-1 SDG: 31403236.022.0129

## GC VOA

### Prep Batch: 9327

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1363-1	PH05	Total/NA	Solid	5035	
890-1363-5	PH05D	Total/NA	Solid	5035	
890-1363-6	PH05E	Total/NA	Solid	5035	
890-1363-7	PH06	Total/NA	Solid	5035	
890-1363-8	PH06A	Total/NA	Solid	5035	
890-1363-9	PH06B	Total/NA	Solid	5035	
890-1363-12	PH06E	Total/NA	Solid	5035	
MB 880-9327/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-9327/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-9327/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
890-1374-A-1-G MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	
890-1374-A-1-I MS	Matrix Spike	Total/NA	Solid	5035	

#### Analysis Batch: 9368

890-1363-12	PH06E	Iotal/NA	Solia	5035		
MB 880-9327/5-A	Method Blank	Total/NA	Solid	5035		8
LCS 880-9327/1-A	Lab Control Sample	Total/NA	Solid	5035		
LCSD 880-9327/2-A	Lab Control Sample Dup	Total/NA	Solid	5035		9
890-1374-A-1-G MSD	Matrix Spike Duplicate	Total/NA	Solid	5035		
890-1374-A-1-I MS	Matrix Spike	Total/NA	Solid	5035		10
Analysis Batch: 9368						44
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	
890-1363-1	PH05	Total/NA	Solid	8021B	9327	10
890-1363-5	PH05D	Total/NA	Solid	8021B	9327	
890-1363-6	PH05E	Total/NA	Solid	8021B	9327	4.0
890-1363-7	PH06	Total/NA	Solid	8021B	9327	13
890-1363-8	PH06A	Total/NA	Solid	8021B	9327	
890-1363-9	PH06B	Total/NA	Solid	8021B	9327	14
890-1363-12	PH06E	Total/NA	Solid	8021B	9327	
MB 880-9327/5-A	Method Blank	Total/NA	Solid	8021B	9327	
LCS 880-9327/1-A	Lab Control Sample	Total/NA	Solid	8021B	9327	
LCSD 880-9327/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	9327	
890-1374-A-1-G MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	9327	
890-1374-A-1-I MS	Matrix Spike	Total/NA	Solid	8021B	9327	

#### Analysis Batch: 9374

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1363-1	PH05	Total/NA	Solid	Total BTEX	
890-1363-5	PH05D	Total/NA	Solid	Total BTEX	
890-1363-6	PH05E	Total/NA	Solid	Total BTEX	
890-1363-7	PH06	Total/NA	Solid	Total BTEX	
890-1363-8	PH06A	Total/NA	Solid	Total BTEX	
890-1363-9	PH06B	Total/NA	Solid	Total BTEX	
890-1363-12	PH06E	Total/NA	Solid	Total BTEX	

#### GC Semi VOA

#### Prep Batch: 9163

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1363-1	PH05	Total/NA	Solid	8015NM Prep	
890-1363-5	PH05D	Total/NA	Solid	8015NM Prep	
890-1363-6	PH05E	Total/NA	Solid	8015NM Prep	
890-1363-7	PH06	Total/NA	Solid	8015NM Prep	
890-1363-8	PH06A	Total/NA	Solid	8015NM Prep	
890-1363-9	PH06B	Total/NA	Solid	8015NM Prep	
890-1363-12	PH06E	Total/NA	Solid	8015NM Prep	
MB 880-9163/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9163/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	

#### Eurofins Xenco, Carlsbad

## **QC** Association Summary

Client: WSP USA Inc. Project/Site: Tiger C

#### GC Semi VOA (Continued)

#### Prep Batch: 9163 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCSD 880-9163/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
880-7011-A-21-E MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
880-7011-A-21-F MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

#### Analysis Batch: 9173

_ab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
390-1363-1	PH05	Total/NA	Solid	8015B NM	9163
390-1363-5	PH05D	Total/NA	Solid	8015B NM	9163
390-1363-6	PH05E	Total/NA	Solid	8015B NM	9163
90-1363-7	PH06	Total/NA	Solid	8015B NM	9163
90-1363-8	PH06A	Total/NA	Solid	8015B NM	9163
90-1363-9	PH06B	Total/NA	Solid	8015B NM	9163
90-1363-12	PH06E	Total/NA	Solid	8015B NM	9163
IB 880-9163/1-A	Method Blank	Total/NA	Solid	8015B NM	9163
CS 880-9163/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9163
CSD 880-9163/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9163
80-7011-A-21-E MS	Matrix Spike	Total/NA	Solid	8015B NM	9163
80-7011-A-21-F MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9163

#### Analysis Batch: 9187

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1363-1	PH05	Total/NA	Solid	8015 NM	
890-1363-5	PH05D	Total/NA	Solid	8015 NM	
890-1363-6	PH05E	Total/NA	Solid	8015 NM	
890-1363-7	PH06	Total/NA	Solid	8015 NM	
890-1363-8	PH06A	Total/NA	Solid	8015 NM	
890-1363-9	PH06B	Total/NA	Solid	8015 NM	
890-1363-12	PH06E	Total/NA	Solid	8015 NM	

#### HPLC/IC

#### Leach Batch: 9130

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1363-7	PH06	Soluble	Solid	DI Leach	
890-1363-8	PH06A	Soluble	Solid	DI Leach	
890-1363-9	PH06B	Soluble	Solid	DI Leach	
890-1363-12	PH06E	Soluble	Solid	DI Leach	
MB 880-9130/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9130/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9130/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-6823-A-8-B MS	Matrix Spike	Soluble	Solid	DI Leach	
880-6823-A-8-C MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	

#### Leach Batch: 9136

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1363-1	PH05	Soluble	Solid	DI Leach	
890-1363-5	PH05D	Soluble	Solid	DI Leach	
890-1363-6	PH05E	Soluble	Solid	DI Leach	
MB 880-9136/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9136/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9136/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

#### Eurofins Xenco, Carlsbad

3 4 5

Job ID: 890-1363-1

SDG: 31403236.022.0129

Job ID: 890-1363-1 SDG: 31403236.022.0129

### HPLC/IC (Continued)

#### Leach Batch: 9136 (Continued)

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1361-A-14-D MS	Matrix Spike	Soluble	Solid	DI Leach	
890-1361-A-14-E MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	

#### Analysis Batch: 9244

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	
890-1363-7	PH06	Soluble	Solid	300.0	9130	
890-1363-8	PH06A	Soluble	Solid	300.0	9130	
390-1363-9	PH06B	Soluble	Solid	300.0	9130	8
390-1363-12	PH06E	Soluble	Solid	300.0	9130	
MB 880-9130/1-A	Method Blank	Soluble	Solid	300.0	9130	9
_CS 880-9130/2-A	Lab Control Sample	Soluble	Solid	300.0	9130	
CSD 880-9130/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9130	
380-6823-A-8-B MS	Matrix Spike	Soluble	Solid	300.0	9130	
880-6823-A-8-C MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9130	
nalysis Batch: 9315						
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	
390-1363-1	PH05	Soluble	Solid	300.0	9136	
390-1363-5	PH05D	Soluble	Solid	300.0	9136	
390-1363-6	PH05E	Soluble	Solid	300.0	9136	
VB 880-9136/1-A	Method Blank	Soluble	Solid	300.0	9136	

#### Analysis Batch: 9315

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1363-1	PH05	Soluble	Solid	300.0	9136
890-1363-5	PH05D	Soluble	Solid	300.0	9136
890-1363-6	PH05E	Soluble	Solid	300.0	9136
MB 880-9136/1-A	Method Blank	Soluble	Solid	300.0	9136
LCS 880-9136/2-A	Lab Control Sample	Soluble	Solid	300.0	9136
LCSD 880-9136/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9136
890-1361-A-14-D MS	Matrix Spike	Soluble	Solid	300.0	9136
890-1361-A-14-E MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9136

## Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger C

## Client Sample ID: PH05 Date Collected: 10/01/21 11:40

Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			9327	10/12/21 16:16	KL	XEN MID
Total/NA	Analysis	8021B		1	9368	10/13/21 13:44	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9374	10/13/21 13:00	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9187	10/11/21 09:42	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9163	10/09/21 12:20	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9173	10/10/21 17:04	AJ	XEN MID
Soluble	Leach	DI Leach			9136	10/08/21 15:55	СН	XEN MID
Soluble	Analysis	300.0		1	9315	10/12/21 22:33	СН	XEN MID

#### Client Sample ID: PH05D Date Collected: 10/01/21 12:40

## Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			9327	10/12/21 16:16	KL	XEN MID
Total/NA	Analysis	8021B		1	9368	10/13/21 14:04	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9374	10/13/21 13:00	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9187	10/11/21 09:42	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9163	10/09/21 12:20	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9173	10/10/21 17:25	AJ	XEN MID
Soluble	Leach	DI Leach			9136	10/08/21 15:55	СН	XEN MID
Soluble	Analysis	300.0		1	9315	10/12/21 22:39	СН	XEN MID

#### Client Sample ID: PH05E Date Collected: 10/01/21 12:50

## Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			9327	10/12/21 16:16	KL	XEN MID
Total/NA	Analysis	8021B		1	9368	10/13/21 14:25	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9374	10/13/21 13:00	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9187	10/11/21 09:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9163	10/09/21 12:20	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9173	10/10/21 17:47	AJ	XEN MID
Soluble	Leach	DI Leach			9136	10/08/21 15:55	СН	XEN MID
Soluble	Analysis	300.0		1	9315	10/12/21 22:44	СН	XEN MID

#### Client Sample ID: PH06 Date Collected: 10/01/21 13:00 Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			9327	10/12/21 16:16	KL	XEN MID
Total/NA	Analysis	8021B		1	9368	10/13/21 14:45	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9374	10/13/21 13:00	KL	XEN MID

Eurofins Xenco, Carlsbad

# SDG: 31403236.022.0129 Lab Sample ID: 890-1363-1 Matrix: Solid

Job ID: 890-1363-1

4 5 6

8

Lab Sample ID: 890-1363-5 Matrix: Solid

Lab Sample ID: 890-1363-6

Lab Sample ID: 890-1363-7

Matrix: Solid

Solid

12 13

Matrix: Solid

Job ID: 890-1363-1

Matrix: Solid

Matrix: Solid

SDG: 31403236.022.0129

Lab Sample ID: 890-1363-7

Lab Sample ID: 890-1363-8

## Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger C

## Client Sample ID: PH06

Date Collected: 10/01/21 13:00 Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1	9187	10/11/21 09:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9163	10/09/21 12:20	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9173	10/10/21 18:08	AJ	XEN MID
Soluble	Leach	DI Leach			9130	10/08/21 15:42	СН	XEN MID
Soluble	Analysis	300.0		1	9244	10/12/21 02:55	СН	XEN MID

## Client Sample ID: PH06A Date Collected: 10/01/21 13:15

#### Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			9327	10/12/21 16:16	KL	XEN MID
Total/NA	Analysis	8021B		1	9368	10/13/21 15:06	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9374	10/13/21 13:00	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9187	10/11/21 09:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9163	10/09/21 12:20	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9173	10/10/21 18:30	AJ	XEN MID
Soluble	Leach	DI Leach			9130	10/08/21 15:42	СН	XEN MID
Soluble	Analysis	300.0		1	9244	10/12/21 03:01	CH	XEN MID

#### **Client Sample ID: PH06B**

Date Collected: 10/01/21 13:30 Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			9327	10/12/21 16:16	KL	XEN MID
Total/NA	Analysis	8021B		1	9368	10/13/21 15:26	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9374	10/13/21 13:00	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9187	10/11/21 09:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9163	10/09/21 12:20	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9173	10/10/21 18:51	AJ	XEN MID
Soluble	Leach	DI Leach			9130	10/08/21 15:42	СН	XEN MID
Soluble	Analysis	300.0		1	9244	10/12/21 03:18	СН	XEN MID

#### **Client Sample ID: PH06E**

Date Collected: 10/01/21 13:50 Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			9327	10/12/21 16:16	KL	XEN MID
Total/NA	Analysis	8021B		1	9368	10/13/21 15:47	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9374	10/13/21 13:00	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9187	10/11/21 09:49	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9163	10/09/21 12:20	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9173	10/10/21 19:13	AJ	XEN MID

Eurofins Xenco, Carlsbad

## Lab Sample ID: 890-1363-9 Matrix: Solid

Lab Sample ID: 890-1363-12

*Released to Imaging: 3/14/2022 1:38:16 PM* Page 21 of 30

Matrix: Solid

Matrix: Solid

#### Lab Chronicle

Job ID: 890-1363-1 SDG: 31403236.022.0129

Lab Sample ID: 890-1363-12

## Client Sample ID: PH06E Date Collected: 10/01/21 13:50

Client: WSP USA Inc.

Project/Site: Tiger C

Date Received: 10/05/21 14:43

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Soluble	Leach	DI Leach			9130	10/08/21 15:42	СН	XEN MID
Soluble	Analysis	300.0		1	9244	10/12/21 03:23	СН	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

10

Job ID: 890-1363-1
SDG: 31403236.022.0129

#### Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

uthority		rogram	Identification Number	Expiration Date
Texas	N	IELAP	T104704400-21-22	06-30-22
The following analytes	are included in this report, b	iut the laboratory is not certin	ied by the governing authority. This list ma	ay include analytes to
the agency does not o		Matrix	Analyte	
the agency does not o Analysis Method 8015 NM	fer certification. Prep Method	Matrix Solid	Analyte Total TPH	

Eurofins Xenco, Carlsbad

## **Method Summary**

Client: WSP USA Inc. Project/Site: Tiger C

Job ID: 890-1363-1 SDG: 31403236.022.0129

Method	Method Description	Protocol	Laboratory
3021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
3015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
3015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
3015NM Prep	Microextraction	SW846	XEN MID
OI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### Protocol References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

## **Sample Summary**

Client: WSP USA Inc. Project/Site: Tiger C Job ID: 890-1363-1 SDG: 31403236.022.0129

b Sample ID	Client Sample ID	Matrix	Collected	Received	Depth	
0-1363-1	PH05	Solid	10/01/21 11:40	10/05/21 14:43	1	-
0-1363-5	PH05D	Solid	10/01/21 12:40	10/05/21 14:43	5	
0-1363-6	PH05E	Solid	10/01/21 12:50	10/05/21 14:43	6	
0-1363-7	PH06	Solid	10/01/21 13:00	10/05/21 14:43	1	
0-1363-8	PH06A	Solid	10/01/21 13:15	10/05/21 14:43	2	
0-1363-9	PH06B	Solid	10/01/21 13:30	10/05/21 14:43	3	
0-1363-12	PH06E	Solid	10/01/21 13:50	10/05/21 14:43	6	
						- 1
						- 6
						ľ
						- 5

Revised Date 051418 Rev 2018			5				UT T
1001a C.	14.00	Unne Byers	10/5/21935		w byers	ann	1 JA LAU
Date/Ti	Received	Relinquished by: (Signature)			Received by: (Signature)	by: (Signature)	Relinguished by: (S
	enforced unless previously negotiated.	yzed. These terms will be enforced unless p	of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be	\$5 for each sample :	ich project and a charge of	of \$75.00 will be applied to ea	of Xenco. A minimum charge
ons Itrol	<ol> <li>It assigns standard terms and conditions are due to circumstances beyond the control</li> </ol>	Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractors. It assigns standard terms and conditions ce. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the contro	client company to Xenco, its aff v losses or expenses incurred by	purchase order from responsibility for an	amples constitutes a valid and shall not assume any	n <del>ent and relinquishment of s</del> only for the cost of samples	Notice: Signature of this docu of service. Xenco will be liable
1631		Cr Co Cu Pb N		10		Circle Method(s) and Metal(s) to be analyzed	Circle Method(s) a
e Ag SiO2 Na Sr Ti Sn U V Zn	Mn Mo Ni K Se	Cd Ca Cr Co Cu Fe Pb Mg Mn Mo Ni	1 Al Sb As Ba Be B	13PPM Texas 11	BRCRA 13	200 8 / 6020:	Total 200 7 / 6010
		X	A A A A	Ч	0121 D	PHO6C 10	PH
				3'	1330		PHC
				2	1315	A 90	oho
							βH
				0:	25 21		SCHO
				5	ch 21	5D	0405
				ų.	12 10	5	Salld
				3,	12 10	120	SCHO
int. PM istites				2	1 1200	SA	PHOS
Hall Supples			XXX		0/1/21 11110	5 20	SOHIS
Sample Comments			Numb TPH (E BTEX ( Chloric	Depth	Date Time Sampled Sampled	ation Matrix	Sample Identification
lab, if received by 4:30pm		70	PA 8 EPA		Total Containers:		Sample Custody Seals:
TAT starts the day received by the	-	-	015) 0=8(	2.0-	Correction Factor:	Yes No MAA	Cooler Custody Seals:
	Custody	890-1363 Chain of Custody	021)		1-NM-00	(Yes) No	Received Intact:
				9r ID	Thermometer ID	1.2 1.0	Temperature (°C):
0.1501 202				3: Yes No	Wes No Wet Ice:	Temp Blank:	SAMPLE RECEIPT
111	11 11 11 11 11 11 11 11 11 11 11 11 11			Due Date:	Due	Benjamin Belill	Sampler's Name: Be
í H				2	3 1376 Rush:	VAPP 212 32	P.O. Number:
				Routine	2.0124 Rol	31403236.02	Project Number:
Work Order Notes		ANALYSIS REQUEST		Turn Around		TIGER CS	Project Name:
ADaPT LJ Uther:	Deliverables: EDD	Deliv	sp.com	Email: ben.belill@wsp.com	Ema	432.236.3849	Phone: 43;
		Rep	Carlsbad, NM 88220	City, State ZIP:		Midland, TX 79705	City, State ZIP: Mic
			3104 E Green Street	Address:		3300 North A Street	
PRP Brownfields RC Duperfund	Program: UST/PST	Prog	e: XTO Energy	Company Name:			W
Work Order Comments			Adrian Baker	Bill to: (if different)		Kale. Jennings	Project Manager:
www.xenco.com Page of C		Midland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)/94-1296 Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (613-620-2000)	40) EL Paso,TX (915)585-344 (Z (480-355-0900) Atlanta,GA	nd,TX (432-704-54 2-7550) Phoenix,/	Midla Hobbs,NM (575-39	ZATORIES	LABO
		Houston, TX (281) 240-4200 Dallas, TX (214) 902-0300 San Antonio, TX (210) 509-3334	00 Dallas,TX (214) 902-0300	n,TX (281) 240-42	Houst	XMNCO	XE
Work Order No:	Wor	Istody	Chain of Custody				

## Received by OCD: 11/5/2021 12:00:19 PM



Notice: Signature of this document of samples constitutes a valid purchase order from citem company to Xenco. Its affiliates and subcontractors. It assigns standard terms and conditions of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unlass previously negotiated.         Relinquished by: (Signature)       Received by: (Signature)       Date/Time       Relinquished by: (Signature)       Received by: (Signature)       Received by: (Signature)       Date/Time       Relinquished by: (Signature)       Received to Xenco.         3       X       X       X       X       X       X       X       X         5        X<	Project Name:       1 <th1< th=""> <t< th=""><th>t</th><th>432.236.3849</th><th>e ZIP:</th><th>Address: 3300 North A Street</th><th>Company Name: WSP</th><th>Project Manager: Kali Jernmy</th><th>Houst</th></t<></th1<>	t	432.236.3849	e ZIP:	Address: 3300 North A Street	Company Name: WSP	Project Manager: Kali Jernmy	Houst
typerchase order from client company to Xenco, its atfiliates and subcontractor:         responsibility for any losses or expenses incurred by the client if such losses         t S5 for each sample submitted to Xenco, but not analyzed. These terms will be         ature)       Date/Time         HQ/5/ACLISS       2         UA       HQ/5/ACLISS         4       March	PM Texas 11 AI Sb As Ba Be B Cd Cr Co		p.co	City, State ZIP: Carlsbad, NM 88220	Address: 3104 E Green Street	Company Name: XTO Energy	Bill to: (it different) Adrian Baker	Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-3334 Midland,TX (432-704-5440) EL Paso,TX (915)565-3443 Lubbock,TX (806)794-1296 Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (813-620-2000)
ontractors. It assigns standard terms and conditions chipses are due to circumstances beyond the control na will be enforced unless previously negotiated. hed by: (Signature) Received by: (Signature) Date/Time Received by: (Signature) 10/5/21 7:0	TATI TATI TATI TATI TATI TATI TATI TATI	AI VSIS BEOLIEST Work Order Notes	Deliverables: EDD ADaPT Dother:	Reporting:Level II Devel III DST/UST DRP Dvel IV	I	Program: UST/PST PRP Brownfields RC Duperfund	12	x (210) 509-3334 x (806)794-1296 <u>) Tampa,FL (81</u> 3-620-2000) <u>www.xenco.com</u> Page

## Received by OCD: 11/5/2021 12:00:19 PM

5



## Page 136 of 331

ain of 1		9	8	bad	, Carlsbad	nco	Eurofins Xe	1089 N	
3					5				



Seurofins Environment Testing

1089 N Canal St.	0	Chain of Custody Record	of Cust	odv R	eco	3										_				*	2		ī	m	wiro	Imer	nt Te	<b>Environment Testing</b>
Carlsbad NM 88220 Phone 575-988-3199 Fax: 575-988-3199						1																		An	America	ີພັ		
Client Information (Sub Contract Lab)	Sampler			Lab PM Kramer	7	Jessica						្ល	Carrier Tracking No(s)	racki	oN BL	(s)				COC No <sup>-</sup> 890-44	COC No <sup>-</sup> 890-447 1	-						
	Phone:			E-Mail: jessic	E-Mail: jessica.kramer@eurofinset.com	ner@e	urofi	nset	om			Z S	State of Origin. New Mexico	Origir	0 -					Page Page	Page Page 1 of 1	¥ 1			l			
Company <sup>.</sup> Eurofins Xenco					Accreditations Required (See note) NELAP - Louisiana NELAP	ations F	Require	ad (Se	(See note	): - Texas	xas									-068 # qo	Job # <sup>.</sup> 890-1363-1	3-						
Address 1211 W Florida Ave,	Due Date Requested 10/11/2021	٩							Ana	lysis Requested	S R	ğu	este	ă						Pres	erva	Preservation Codes	Sa	. 1				
City: Midland	TAT Requested (days)	ys)						]			_									רשר. יארי	n Ag	*fate		οzz	Hexane None AsNaO2	Ĵ, "III		
State Zip: TX, 79701					<u>. 1</u> 1	трн								<u></u>				-	GGQ G		litric ,	D Nitric Acid E - NaHSO4		o ۳ a	P - Na2O4S Q Na2SO3	03 Å		
Phone: 432-704-5440(Tel)	PO #:				)	D) Full		le													MeOH Amchlor Ascorbic	MeOH Amchlor Ascorbic Acid	5.	- 07	H2SC	Na2S2O3 H2SO4 TSD Dodecahudrate	owder	trate
Email:	WO #:				00010000000000	p (MO			EX										1. 36. 66		e I Wat	er		< ⊂ ·	Acetone MCAA	one A	ouniy.	aiato
Project Name. Tiner C	Project #: Rannnn4					S_Pre			D) BT										\$P\$\$ 4.86%		K - EDTA L EDA			-	pH 4-5 other (sp	pH 4-5 other (specify)	ify)	
Site:	SSOW#:				Sellenses	5NM			lic (M										0.6.04678	Other <sup>.</sup>	٦							
			Sample Type	Matrix ( <sup>W=water</sup>	Filtered S m MS/MS	OD_NM/80	OD_Calc	RGFM_28D	5036FP_C	BTEX_GCV									Number o									
Sample Identification - Client ID (Lab ID)	Sample Date	sampie Time	(C=comp, G=grab)	O=waste/oil, IT=Tissue, A=Air)	house	8015				IOTAL			<b> </b>		<u> </u>	ļ			Tota		s	Special Instructions/Note	alin	stru	ctio	ns/h	lote	·
	X		Preservat	Preservation Code:	X		and the second		1. al		<u>Jú</u>		- Contraction	. Santa	ion we	heartest	ndtred	i i	X						1	Ш	$\ $	
PH05 (890-1363-1)	10/1/21	Mountain		Solid		×	×	×	×	×															-			
PH05D (890-1363-5)	10/1/21	12 40 Mountain		Solid		×	×	×	×	×									4									
PH05E (890-1363-6)	10/1/21	12 50 Mountain		Solid		×	×	×	×	×																		
PH06 (890-1363-7)	10/1/21	13 00 Mountain		Solid		×	×	×	×	×																		
PH06A (890-1363-8)	10/1/21	13 15 Mountain		Solid		×	×	×	×	×																		
PH06B (890-1363-9)	10/1/21	13 30 Mountain		Solid		×	×	×	×	<u>×</u>									(A)									
PH06E (890-1363-12)	10/1/21	13 50 Mountain		Solid		×	×	×	×	×									4									
Note Since laboratory accreditations are subject to change Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This s maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions attention immediately. If all requested accreditations are current to date return the signed Chain of Custody attesting to said complicance to Eurofins Xenco LLC.	vaces the ownership reing analyzed the sa e signed Chain of Cu	of method ana mples must be stody attesting	lyte & accredits shipped back to said complic	ation compliand to the Eurofins ance to Eurofir	xe upon o Xenco L Is Xenco	LC lab	contrac	or oth	ratorie Ier ins	is Th Iructio	is san ns wil	iple si be pr	nipme ovide	ntisfi d An	orwar y cha	nges	nder to ac	chain ;redit	-of-c	ustoc statu	fy If Is sho	This sample shipment is forwarded under chain-of-custody if the laboratory does not currently tions will be provided Any changes to accreditation status should be brought to Eurofins Xenco LL	aborat )e bro	ught	loes r to Eu	not cu rofins	rrenti Xen	∞ LL(
Possible Hazard Identification					Sa	Sample Disposal ( A fee may be assessed if samples are retained longer than Return To Client       Disposal By Lab     Archive For	<b>le Disposal ( A f</b> Return To Client	To C	(A fe	e m		Dis	<b>assessed if san</b> Disposal By Lab	ed if Bv	san	ple	ar		Arch	<b>tained long</b> Archive For	o ng	¥ th	an 1	1 month) Mon	inth) Months	ths		
Deliverable Requested 1 II, III IV, Other (specify)	Primary Deliverable Rank 2	able Rank 2			е К	Special Instructions/QC	nstru	ction	s/QC	Req	Requirements	lents	<i>"</i>															
Empty Kit Relinquished by		Date			Time				$\mathbf{N}$				- 2	Method of Shipment:	of SI	tipme	Ť											
Relinquished by UW 10 · 5 · 71	Date/Time: Date/Time:			Company Company		Receiv		N	$\square$			$\mathbb{O}$	$  \rangle$				N-6-2	N.			Eil	300 m	R	<u></u>	Company	<sup>۲</sup>		
Dalian iishad hr															<u> </u>									5		-	1	
Relinquished by	Date/Time <sup>.</sup>			Company		Recei	Received by									Date/Time	ime:							ç	Company	γr		
Custody Seals Intact. Custody Seal No ∆ Yes ∆ No						Coole		<b>N</b> <sup>o</sup>		C ZH Cher Remarks.	6	Rem	arks.															

Ver 06/08/2021

Job Number: 890-1363-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Carlsbad

## Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1363 List Number: 1 Creator: Clifton, Cloe

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	

N/A

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

## Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1363 List Number: 2 Creator: Copeland, Tatiana

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	2.1 / 2.6
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	True	

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

14

Job Number: 890-1363-1 SDG Number: 31403236.022.0129

List Creation: 10/06/21 11:32 AM

List Source: Eurofins Xenco, Midland

Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

# Environment Testing America

## **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

## Laboratory Job ID: 890-1382-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS

## For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/13/2021 9:32:43 AM Jessica Kramer, Project Manager

(432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access Have a Question? Ask-The Expert Visit us at:

www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Laboratory Job ID: 890-1382-1 SDG: 31403236.022.0129

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	12
QC Sample Results	13
QC Association Summary	17
Lab Chronicle	20
Certification Summary	23
Method Summary	24
Sample Summary	25
Chain of Custody	26
Receipt Checklists	28

Client: WSD LISA I

Ich ID: 000 1202

Page 142 of 331

Client: WSP US Project/Site: Tig		Job ID: 890-1382-1 SDG: 31403236.022.0129	2
Qualifiers			3
GC VOA			
Qualifier	Qualifier Description		
<u>S1+</u>	Surrogate recovery exceeds control limits, high biased.		
U	Indicates the analyte was analyzed for but not detected.		5
GC Semi VOA			
Qualifier	Qualifier Description		
F1	MS and/or MSD recovery exceeds control limits.		
S1+	Surrogate recovery exceeds control limits, high biased.		
U	Indicates the analyte was analyzed for but not detected.		
	······································		o
HPLC/IC Qualifier			0
	Qualifier Description		0
0	Indicates the analyte was analyzed for but not detected.		ઝ
Glossary			
Abbreviation	These commonly used abbreviations may or may not be present in this report.		
<u></u>	Listed under the "D" column to designate that the result is reported on a dry weight basis		
%R	Percent Recovery		
CFL	Contains Free Liquid		
CFU	Colony Forming Unit		
CNF	Contains No Free Liquid		
DER	Duplicate Error Ratio (normalized absolute difference)		
Dil Fac	Dilution Factor		
DL	Detection Limit (DoD/DOE)		
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample		
DLC	Decision Level Concentration (Radiochemistry)		
EDL	Estimated Detection Limit (Dioxin)		
LOD	Limit of Detection (DoD/DOE)		
LOQ	Limit of Quantitation (DoD/DOE)		
MCL	EPA recommended "Maximum Contaminant Level"		
MDA	Minimum Detectable Activity (Radiochemistry)		
MDC	Minimum Detectable Concentration (Radiochemistry)		
MDL	Method Detection Limit		
ML	Minimum Level (Dioxin)		
MPN	Most Probable Number		
MQL	Method Quantitation Limit		
NC	Not Calculated		
ND	Not Detected at the reporting limit (or MDL or EDL if shown)		
NEG	Negative / Absent		
POS	Positive / Present		
PQL	Practical Quantitation Limit		
PRES	Presumptive		
QC	Quality Control		
050			

RL Reporting Limit or Requested Limit (Radiochemistry) RPD Relative Percent Difference, a measure of the relative difference between two points

TEF Toxicity Equivalent Factor (Dioxin)

Relative Error Ratio (Radiochemistry)

TEQ Toxicity Equivalent Quotient (Dioxin)

TNTC Too Numerous To Count

RER

4

5

Job ID: 890-1382-1 SDG: 31403236.022.0129

#### Job ID: 890-1382-1

Client: WSP USA Inc.

Project/Site: Tiger CS

#### Laboratory: Eurofins Xenco, Carlsbad

#### Narrative

Job Narrative 890-1382-1

#### Receipt

The samples were received on 10/8/2021 8:47 AM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 5.8°C

#### GC VOA

Method 8021B: Surrogate recovery for the following samples were outside control limits: BH01 (890-1382-1) and SW02 (890-1382-8). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Method: 8021B - Volatile Organic Compounds (GC)

Method: Total BTEX - Total BTEX Calculation

Method: 8015 NM - Diesel Range Organics (DRO) (GC)

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Method: 300.0 - Anions, Ion Chromatography - Soluble

Valatila Organia Compoundo (CC)

Result Qualifier

Qualifier

Qualifier

Result Qualifier

Result Qualifier

<49.9 U F1

124

<49.9 U

%Recovery Qualifier

Result Qualifier

110

121

111

124

<0.00199 U

<0.00199 U

0.0114

0.00511

0.0275

0.0326

142 S1+

70

Result

0.0440

%Recovery

## **Client Sample Results**

RL

0.00199

0.00199

0.00199

0.00398

0 00199

0.00398

Limits

70 - 130

70 - 130

RL

RL

49.9

RL

49.9

49.9

49 9

RL

5.04

Limits

70 - 130

70 - 130

0.00398

Unit

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

Unit

Unit

Unit

mg/Kg

mg/Kg

mg/Kg

Unit

mg/Kg

mg/Kg

mg/Kg

D

D

D

D

Prepared

10/11/21 16:18

10/11/21 16:18

10/11/21 16:18

10/11/21 16:18

10/11/21 16:18

10/11/21 16:18

Prepared

10/11/21 16:18

10/11/21 16:18

Prepared

Prepared

Prepared

10/12/21 14:04

10/12/21 14:04

10/12/21 14:04

10/12/21 14:04

Job ID: 890-1382-1 SDG: 31403236.022.0129

## **Client Sample ID: BH01**

Date Collected: 10/07/21 12:37 Date Received: 10/08/21 08:47

Sample Depth: 1

Analyte

Benzene

Toluene

o-Xylene

Surrogate

Analyte

Analyte

Analyte

(GRO)-C6-C10

C10-C28)

Surrogate

o-Terphenyl

Analyte

Chloride

1-Chlorooctane

**Total TPH** 

Total BTEX

Ethylbenzene

**Xylenes**, Total

m-Xylene & p-Xylene

4-Bromofluorobenzene (Surr)

1,4-Difluorobenzene (Surr)

Gasoline Range Organics

**Diesel Range Organics (Over** 

Oll Range Organics (Over C28-C36)

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab Sample ID:	890-1382-1
	Matrix: Solid

Analyzed

10/12/21 13:24

10/12/21 13:24

10/12/21 13:24

10/12/21 13:24

10/12/21 13:24

10/12/21 13:24

Analyzed

10/12/21 13:24

10/12/21 13:24

Analyzed

10/12/21 10:57

Analyzed

10/11/21 10:26

Analyzed

10/12/21 21:04

10/12/21 21:04

10/12/21 21:04

Analyzed

10/12/21 21:04

10/12/21 21:04

5

Dil Fac 1 1 1

1

1

Dil Fac

Dil Fac

Dil Fac

Dil Fac

1

1

1

Dil Fac

Dil Fac

Page 5 of 29 Released to Imaging: 3/14/2022 1:38:16 PM

#### 10/13/2021

Date Collected: 10/07/21 12:39 Date Received: 10/08/21 08:47 Sample Depth: 2

Mathadi 9021P

**Client Sample ID: BH01A** 

Method: 8021B - Volatile Organic	Compounds (	GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:44	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:44	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:44	1
m-Xylene & p-Xylene	<0.00400	U	0.00400	mg/Kg		10/11/21 16:18	10/12/21 13:44	1
o-Xylene	0.00518		0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:44	1
Xylenes, Total	0.00518		0.00400	mg/Kg		10/11/21 16:18	10/12/21 13:44	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	123		70 - 130			10/11/21 16:18	10/12/21 13:44	1

Prepared 10/12/21 14:04

D Prepared Analyzed 10/11/21 14:42 Lab Sample ID: 890-1382-2

#### Matrix: Solid
#### **Client Sample Results**

Limits

70 - 130

RL

RL

RL

49.8

0.00400

Unit

Unit

Unit

mg/Kg

mg/Kg

Job ID: 890-1382-1 SDG: 31403236.022.0129

#### **Client Sample ID: BH01A** Date Collected: 10/07/21 12:39

1,4-Difluorobenzene (Surr)

Client: WSP USA Inc.

Project/Site: Tiger CS

Date Received: 10/08/21 08:47

Sample Depth: 2

Surrogate

Analyte

Analyte

Total TPH

**Total BTEX** 

Lab Sample	ID:	890-13	82-2
		Matrix:	Solid

Analyzed

10/12/21 13:44

Analyzed

10/12/21 10:57

Analyzed

10/11/21 10:26

Analyzed

Lab Sample ID: 890-1382-3

Matrix: Solid

Prepared

10/11/21 16:18

Prepared

Prepared

Prepared

D

D

D

5

Dil Fac

Dil Fac

Dil Fac

1

1

	Dil Fac	
)7	1	
)7	1	
)7	1	
	Dil Fac	

Wethod: 6015B NW - Dieser	Range Organics (DRO) (GC)
Analyte	Result Qualifier

Method: 8015 NM - Diesel Range Organics (DRO) (GC)

Method: Total BTEX - Total BTEX Calculation

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

%Recovery Qualifier

Result Qualifier

Result Qualifier

<49.8 U

85

0.00518

<49.8	U	49.8	mg/Kg	10/12/21 14:04	10/12/21 22:07	1
			5 5			
<49.8	U	49.8	mg/Kg	10/12/21 14:04	10/12/21 22:07	1
<49.8	U	49.8	mg/Kg	10/12/21 14:04	10/12/21 22:07	1
%Recovery	Qualifier	Limits		Prepared	Analyzed	Dil Fac
106		70 - 130		10/12/21 14:04	10/12/21 22:07	1
118		70 - 130		10/12/21 14:04	10/12/21 22:07	1
	<49.8 <49.8 <u>%Recovery</u> 106	106	<49.8 U 49.8 <49.8 U 49.8 <u>%Recovery</u> <u>Qualifier</u> <u>Limits</u> <u>70 - 130</u>	<49.8	<49.8         U         49.8         mg/Kg         10/12/21 14:04           <49.8	<49.8

Method: 300.0 - Anions, Ion Chro	matography - Soluble						
Analyte	Result Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	210	4.99	mg/Kg			10/11/21 14:49	1

#### **Client Sample ID: BH01B**

Date Collected: 10/07/21 12:42 Date Received: 10/08/21 08:47 Sample Depth: 3

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00198	U	0.00198	mg/Kg		10/11/21 16:18	10/12/21 14:05	1
Toluene	<0.00198	U	0.00198	mg/Kg		10/11/21 16:18	10/12/21 14:05	1
Ethylbenzene	<0.00198	U	0.00198	mg/Kg		10/11/21 16:18	10/12/21 14:05	1
m-Xylene & p-Xylene	<0.00396	U	0.00396	mg/Kg		10/11/21 16:18	10/12/21 14:05	1
o-Xylene	<0.00198	U	0.00198	mg/Kg		10/11/21 16:18	10/12/21 14:05	1
Xylenes, Total	<0.00396	U	0.00396	mg/Kg		10/11/21 16:18	10/12/21 14:05	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	108		70 - 130			10/11/21 16:18	10/12/21 14:05	1
1,4-Difluorobenzene (Surr)	84		70 - 130			10/11/21 16:18	10/12/21 14:05	1
- Method: Total BTEX - Total B	<b>FEX Calculation</b>							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00396	U	0.00396	mg/Kg			10/12/21 10:57	1
Method: 8015 NM - Diesel Rar	nge Organics (DR	O) (GC)						
				11		Durananad	A	<b>B</b> 11 <b>F</b>
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Method: 300.0 - Anions, Ion Chromatography - Soluble

Result Qualifier

<49.9 U

<49.9 U

<49.9 U

%Recovery Qualifier

Result Qualifier

108

122

147

122

Dil Fac

1

1

1

1

1

Dil Fac

Dil Fac

Matrix: Solid

#### **Client Sample Results**

RL

49.9

49.9

49.9

RL

4.97

Limits

70 - 130

70 - 130

Unit

mg/Kg

mg/Kg

mg/Kg

Unit

mg/Kg

Job ID: 890-1382-1
SDG: 31403236.022.0129

#### Client Sample ID: BH01B

Client: WSP USA Inc. Project/Site: Tiger CS

Sample Depth: 3

(GRO)-C6-C10

Gasoline Range Organics

Diesel Range Organics (Over

Oll Range Organics (Over C28-C36)

Analyte

C10-C28)

Surrogate

o-Terphenyl

Analyte

Chloride

1-Chlorooctane

Date Collected: 10/07/21 12:42 Date Received: 10/08/21 08:47 Lab Sample ID: 890-1382-3 Matrix: Solid

Analyzed

10/12/21 22:28

10/12/21 22:28

10/12/21 22:28

Analyzed

10/12/21 22:28

10/12/21 22:28

Analyzed

10/11/21 14:57

Lab Sample ID: 890-1382-4

#### Client Sample ID: BH01C

Date Collected: 10/07/21 12:43 Date Received: 10/08/21 08:47

Sample Depth: 4

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 14:25	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 14:25	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 14:25	1
m-Xylene & p-Xylene	<0.00399	U	0.00399	mg/Kg		10/11/21 16:18	10/12/21 14:25	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 14:25	
Xylenes, Total	<0.00399	U	0.00399	mg/Kg		10/11/21 16:18	10/12/21 14:25	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
4-Bromofluorobenzene (Surr)	120		70 - 130			10/11/21 16:18	10/12/21 14:25	
1,4-Difluorobenzene (Surr)	80		70 - 130			10/11/21 16:18	10/12/21 14:25	1
Analyte Total BTEX	Result <0.00399	Qualifier	RL 0.00399	Unit mg/Kg	<u> </u>	Prepared	Analyzed	Dil Fac
Method: 8015 NM - Diesel Range	•	<mark>O) (GC)</mark> Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
•	•	Qualifier	<b>RL</b> 49.8	Unit mg/Kg	<u>D</u>	Prepared	Analyzed	
Analyte Total TPH	<del>Result</del> <49.8	Qualifier U			<u>D</u>	Prepared		
Analyte Total TPH Method: 8015B NM - Diesel Rang	e Organics (D	Qualifier U			<u>D</u> 	Prepared		,
Analyte Total TPH Method: 8015B NM - Diesel Rang Analyte Gasoline Range Organics	e Organics (D	Qualifier U RO) (GC) Qualifier	49.8	mg/Kg		<u>.</u>	10/11/21 10:26	Dil Fac
Analyte Total TPH Method: 8015B NM - Diesel Rang Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	e Organics (D Result	Qualifier U RO) (GC) Qualifier U	49.8 RL	mg/Kg Unit		Prepared	10/11/21 10:26	Dil Fa
Analyte Total TPH Method: 8015B NM - Diesel Rang Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	e Organics (D Result Result 49.8	Qualifier U RO) (GC) Qualifier U U	49.8 <b>RL</b> 49.8	mg/Kg Unit mg/Kg		Prepared 10/12/21 14:04	10/11/21 10:26 Analyzed 10/12/21 22:49	Dil Fa
Analyte	e Organics (D Result Result <49.8 <49.8	Qualifier U RO) (GC) Qualifier U U U	49.8 <b>RL</b> 49.8 49.8	mg/Kg Unit mg/Kg mg/Kg		Prepared 10/12/21 14:04 10/12/21 14:04	Analyzed           10/11/21 10:26           40/12/21 22:49           10/12/21 22:49	Dil Fac

10/12/21 22:49

10/12/21 14:04

D

D

Prepared

10/12/21 14:04

10/12/21 14:04

10/12/21 14:04

Prepared

10/12/21 14:04

10/12/21 14:04

Prepared

#### Released to Imaging: 3/14/2022 1:38:16 PM

o-Terphenyl

70 - 130

		Clien	t Sample Re	sults				
Client: WSP USA Inc.							Job ID: 890	)-1382-1
Project/Site: Tiger CS						SD	G: 31403236.0	22.0129
Client Sample ID: BH01C						Lab San	nple ID: 890-	1382-4
Date Collected: 10/07/21 12:43							-	ix: Solid
Date Received: 10/08/21 08:47								
Sample Depth: 4								
Method: 300.0 - Anions, Ion Chr			ы	Unit	D	Bronorod	Analyzad	
Analyte Chloride	Kesuit 417	Qualifier	RL 4.95	0/// mg/Kg	<u>D</u>	Prepared	Analyzed 10/11/21 15:04	Dil Fac
				5 5				
Client Sample ID: FS01						Lab San	nple ID: 890-	
Date Collected: 10/07/21 11:40							Matri	ix: Solid
Date Received: 10/08/21 08:47								
Sample Depth: 1 - 1.5								
Method: 8021B - Volatile Organi	ic Compounds (	(GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	< 0.00202	U	0.00202	mg/Kg		10/11/21 16:18	10/12/21 14:58	1
Toluene	<0.00202	U	0.00202	mg/Kg		10/11/21 16:18	10/12/21 14:58	1
Ethylbenzene	<0.00202	U	0.00202	mg/Kg		10/11/21 16:18	10/12/21 14:58	1
m-Xylene & p-Xylene	<0.00403	U	0.00403	mg/Kg		10/11/21 16:18	10/12/21 14:58	1
o-Xylene	<0.00202	U	0.00202	mg/Kg		10/11/21 16:18	10/12/21 14:58	1
Xylenes, Total	<0.00403	U	0.00403	mg/Kg		10/11/21 16:18	10/12/21 14:58	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	123		70 - 130			10/11/21 16:18	10/12/21 14:58	1
1,4-Difluorobenzene (Surr)	83		70 - 130			10/11/21 16:18	10/12/21 14:58	1
Method: Total BTEX - Total BTE	X Coloulation							
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00403		0.00403	mg/Kg			10/12/21 10:57	1
	-0.00-00	0	0.00400	ingitig			10/12/21 10:07	
Method: 8015 NM - Diesel Rang	e Organics (DR	O) (GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.9	U	49.9	mg/Kg			10/11/21 10:26	1
Method: 8015B NM - Diesel Ran	ge Organics (D	RO) (GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/12/21 23:10	1
(GRO)-C6-C10 Diesel Range Organics (Over	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/12/21 23:10	1
C10-C28)	10.0	0	10.0	ing/rtg		10,12,2111.01	10/12/21 20:10	
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/12/21 23:10	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane			70 - 130			10/12/21 14:04	10/12/21 23:10	1
o-Terphenyl	121		70 - 130			10/12/21 14:04	10/12/21 23:10	1
Method: 300.0 - Anions, Ion Chr	romatography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

Method: 8021B - Volatile Organic Compounds (GC)

Result Qualifier

<0.00199 U

#### **Client Sample Results**

RL

0.00199

Unit

mg/Kg

D

Prepared

10/11/21 16:18

Client: WSP USA Inc.	
Project/Site: Tiger CS	

#### **Client Sample ID: FS02**

Date Collected: 10/07/21 13:50 Date Received: 10/08/21 08:47

Sample Depth: 4

Analyte

Benzene

Job ID: 890-1382-1 SDG: 31403236.022.0129

### Lab Sample ID: 890-1382-6

Analyzed

10/12/21 15:18

Matrix: Solid

5 Dil Fac 1

Benzene	<0.00199	0	0.00199	mg/kg		10/11/21 10.16	10/12/21 15.16	1
Toluene	<0.00199	U	0.00199	mg/Kg		10/11/21 16:18	10/12/21 15:18	1
Ethylbenzene	<0.00199	U	0.00199	mg/Kg		10/11/21 16:18	10/12/21 15:18	1
m-Xylene & p-Xylene	<0.00398	U	0.00398	mg/Kg		10/11/21 16:18	10/12/21 15:18	1
o-Xylene	<0.00199	U	0.00199	mg/Kg		10/11/21 16:18	10/12/21 15:18	1
Xylenes, Total	<0.00398	U	0.00398	mg/Kg		10/11/21 16:18	10/12/21 15:18	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	121		70 - 130			10/11/21 16:18	10/12/21 15:18	1
1,4-Difluorobenzene (Surr)	75		70 - 130			10/11/21 16:18	10/12/21 15:18	1
Method: Total BTEX - Total BTEX	Calculation							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00398	U	0.00398	mg/Kg			10/12/21 10:57	1
Method: 8015 NM - Diesel Range	Organics (DR	O) (GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	69.7		50.0	mg/Kg			10/11/21 10:26	1
Method: 8015B NM - Diesel Rang	e Organics (D	RO) (GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 23:31	1
Diesel Range Organics (Over	69.7		50.0	mg/Kg		10/12/21 14:04	10/12/21 23:31	1
C10-C28)	.50.0		50.0				40/40/04 00 04	
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 23:31	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	109		70 - 130			10/12/21 14:04	10/12/21 23:31	1
o-Terphenyl	122		70 - 130			10/12/21 14:04	10/12/21 23:31	1
Method: 300.0 - Anions, Ion Chro	matography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	130		4.98	mg/Kg			10/11/21 15:33	1
lient Sample ID: SW01						Lab San	nple ID: 890-	1382-7
ate Collected: 10/07/21 14:00							Matri	ix: Solid
ate Received: 10/08/21 08:47								
ample Depth: 0 - 4								
Method: 8021B - Volatile Organic	Compounds	(GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00201	U	0.00201	mg/Kg		10/11/21 16:18	10/12/21 15:39	1
			0.00201	mg/Kg		10/11/21 16:18	10/12/21 15:39	1
Toluene	0.0339							
Toluene Ethylbenzene	0.0339 0.0107		0.00201	mg/Kg		10/11/21 16:18	10/12/21 15:39	1
Ethylbenzene			0.00201 0.00402	mg/Kg mg/Kg		10/11/21 16:18 10/11/21 16:18	10/12/21 15:39 10/12/21 15:39	1
	0.0107							

Prepared

10/11/21 16:18

Eurofins Xenco, Carlsbad

Analyzed

10/12/21 15:39

Surrogate

4-Bromofluorobenzene (Surr)

Limits

70 - 130

%Recovery Qualifier

125

Dil Fac

1

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Method: Total BTEX - Total BTEX Calculation

Method: 8015 NM - Diesel Range Organics (DRO) (GC)

Dil Fac

Dil Fac

Dil Fac

1

#### **Client Sample Results**

Limits

70 - 130

RL

RL

0.00402

Unit

Unit

mg/Kg

Job ID: 890-1382-1 SDG: 31403236.022.0129

#### **Client Sample ID: SW01** Date Collected: 10/07/21 14:00

Client: WSP USA Inc.

Project/Site: Tiger CS

Date Received: 10/08/21 08:47

Sample Depth: 0 - 4

1,4-Difluorobenzene (Surr)

Surrogate

Analyte

Analyte

**Total BTEX** 

Lab	Sample	ID:	890-1382-7
			Matrix: Solid

Analyzed

10/12/21 15:39

Analyzed

10/12/21 10:57

Analyzed

10/11/21 10:26

Analyzed

10/12/21 23:52

10/12/21 23:52

10/12/21 23:52

Lab Sample ID: 890-1382-8

Prepared

10/11/21 16:18

Prepared

Prepared

D

D

Dil Fac	
1	
1	
1	1
Dil Fac	

1

Matrix: Solid

Total TPH	86.7		50.0	mg/Kg		
Method: 8015B NM - Diesel Range	Organics (D	RO) (GC)				
Analyte	Result	Qualifier	RL	Unit	D	Prepared
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/12/21 14:04
Diesel Range Organics (Over C10-C28)	86.7		50.0	mg/Kg		10/12/21 14:04
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04

%Recovery Qualifier

Result Qualifier

Result Qualifier

80

0.0638

Surrogate	%Recovery Qualifier	Limits	Prepared	Analyzed	Dil I
1-Chlorooctane	105	70 - 130	10/12/21 14:04	10/12/21 23:52	
o-Terphenyl	115	70 - 130	10/12/21 14:04	10/12/21 23:52	
_					

Method: 300.0 - Anions, Ion Chromatography - Soluble											
	Analyte	Result (	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac		
	Chloride	115		4.95	mg/Kg			10/11/21 15:40	1		

#### **Client Sample ID: SW02**

Date Collected: 10/07/21 14:15 Date Received: 10/08/21 08:47 Sample Depth: 0 - 4

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 15:59	1
Toluene	0.0114		0.00200	mg/Kg		10/11/21 16:18	10/12/21 15:59	1
Ethylbenzene	0.00951		0.00200	mg/Kg		10/11/21 16:18	10/12/21 15:59	1
m-Xylene & p-Xylene	<0.00400	U	0.00400	mg/Kg		10/11/21 16:18	10/12/21 15:59	1
o-Xylene	0.0341		0.00200	mg/Kg		10/11/21 16:18	10/12/21 15:59	1
Xylenes, Total	0.0341		0.00400	mg/Kg		10/11/21 16:18	10/12/21 15:59	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	135	S1+	70 - 130			10/11/21 16:18	10/12/21 15:59	1
1,4-Difluorobenzene (Surr)	80		70 - 130			10/11/21 16:18	10/12/21 15:59	1
- Method: Total BTEX - Total BT	EX Calculation							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	0.0550		0.00400	mg/Kg			10/12/21 10:57	1
Method: 8015 NM - Diesel Ran	ge Organics (DR	0) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac

Eurofins Xenco, Carlsbad

#### mala Doculto 0

		Clien	t Sample Res	sults				
lient: WSP USA Inc.			-				Job ID: 890	
roject/Site: Tiger CS						SD	DG: 31403236.02	22.0129
lient Sample ID: SW02						Lab San	nple ID: 890-	1382-8
ate Collected: 10/07/21 14:15							Matri	ix: Solid
ate Received: 10/08/21 08:47								
ample Depth: 0 - 4								
Method: 8015B NM - Diesel Ran	oe Organics (D	RO) (GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 00:13	1
(GRO)-C6-C10				14				
Diesel Range Organics (Over C10-C28)	97.7		49.8	mg/Kg		10/12/21 14:04	10/13/21 00:13	1
C10-C28) Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 00:13	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane			70 - 130			10/12/21 14:04	10/13/21 00:13	1
o-Terphenyl	118		70 - 130			10/12/21 14:04	10/13/21 00:13	1
Method: 300.0 - Anions, Ion Chr	emotography -	Solublo						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
			4.95	mg/Kg			10/11/21 15:47	

Client: WSP USA Inc. Project/Site: Tiger CS

#### Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

				Percent Surrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1		
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		
890-1382-1	BH01	142 S1+	70		
890-1382-1 MS	BH01	119	77		
890-1382-1 MSD	BH01	118	88		- 5
890-1382-2	BH01A	123	85		
890-1382-3	BH01B	108	84		
890-1382-4	BH01C	120	80		
890-1382-5	FS01	123	83		
890-1382-6	FS02	121	75		
890-1382-7	SW01	125	80		
890-1382-8	SW02	135 S1+	80		
LCS 880-8942/1-A	Lab Control Sample	112	88		
LCSD 880-8942/2-A	Lab Control Sample Dup	116	76		
MB 880-8942/5-B	Method Blank	112	79		
Surrogate Legend					
BFB = 4-Bromofluorobe	nzene (Surr)				
DFBZ = 1,4-Difluoroben	izene (Surr)				

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC) Matrix: Solid

_			
		1CO1	OTPH1
Lab Sample ID	Client Sample ID	(70-130)	(70-130)
890-1382-1	BH01	110	121
890-1382-1 MS	BH01	118	115
890-1382-1 MSD	BH01	118	113
890-1382-2	BH01A	106	118
890-1382-3	BH01B	108	122
890-1382-4	BH01C	108	122
890-1382-5	FS01	107	121
890-1382-6	FS02	109	122
890-1382-7	SW01	105	115
890-1382-8	SW02	107	118
LCS 880-9312/2-A	Lab Control Sample	92	90
LCSD 880-9312/3-A	Lab Control Sample Dup	101	101
MB 880-9312/1-A	Method Blank	115	133 S1+

#### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Eurofins Xenco, Carlsbad

Page 151 of 331

Job ID: 890-1382-1 SDG: 31403236.022.0129

Prep Type: Total/NA

Prep Type: Total/NA

Client: WSP USA Inc. Project/Site: Tiger CS

#### Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-8942/5	)-D									Client Sa	mple ID: Me		
Matrix: Solid											Prep Typ		
Analysis Batch: 9282											Prep E	atch	: 8 <mark>9</mark> 4
		MB ME						_	_	_			
Analyte		ult Qu	alifier	RL		Unit		<u>D</u> .		repared	Analyzed		Dil Fa
Benzene		200 U		0.00200		mg/Kg	-			1/21 16:18	10/12/21 13:0		
Toluene	<0.002	200 U		0.00200		mg/Kg	9		10/1	1/21 16:18	10/12/21 13:0		
Ethylbenzene		200 U		0.00200		mg/Kg	9		10/11	1/21 16:18	10/12/21 13:0	2	
m-Xylene & p-Xylene	< 0.004	400 U		0.00400		mg/Kg	9		10/11	1/21 16:18	10/12/21 13:0	2	
o-Xylene	<0.002	200 U		0.00200		mg/K	3		10/11	1/21 16:18	10/12/21 13:0	2	
Xylenes, Total	< 0.004	400 U		0.00400		mg/Kg	9		10/11	1/21 16:18	10/12/21 13:0	2	
		мв ме	8										
Surrogate	%Recov		alifier	Limits					Pi	repared	Analyzed		Dil F
4-Bromofluorobenzene (Surr)		112		70 - 130				-		1/21 16:18	10/12/21 13:0		
1,4-Difluorobenzene (Surr)		79		70 - 130						1/21 16:18	10/12/21 13:0		
Lab Sample ID: LCS 880-8942/ Matrix: Solid Analysis Batch: 9282	1 <b>-A</b>							CI	lient	Sample I	D: Lab Cont Prep Typ Prep E	e: To	tal/N
-				Spike	LCS	LCS					%Rec.		
Analyte				Added	Result	Qualifier	Unit		D	%Rec	Limits		
Benzene				0.100	0.09008		mg/Kg			90	70 - 130		
Toluene				0.100	0.09025		mg/Kg			90	70 - 130		
Ethylbenzene				0.100	0.09403		mg/Kg			94	70 - 130		
					0.1959		mg/Kg				70 - 130		
m Vulana 9 n Vulana							ma/na			98			
m-Xylene & p-Xylene				0.200									
m-Xylene & p-Xylene o-Xylene				0.200 0.100	0.09732		mg/Kg			97	70 - 130		
	LCS I												
	LCS I %Recovery 0		r										
o-Xylene			<u>r</u>	0.100									
o-Xylene Surrogate 4-Bromofluorobenzene (Surr)	%Recovery		<u>r _</u>	0.100 <i>Limits</i>									
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	%Recovery 112 88		<u>r _</u>	0.100 <i>Limits</i> 70 - 130			mg/Kg	ont	Sam	97	70 - 130	ampl	6 D
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894	%Recovery 112 88		<u>r</u>	0.100 <i>Limits</i> 70 - 130			mg/Kg	ent	Sam	97	70 - 130 ab Control S		
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid	%Recovery 112 88		<u>r</u>	0.100 <i>Limits</i> 70 - 130			mg/Kg	ent	Sam	97	70 - 130 ab Control S Prep Typ	e: To	tal/N
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid	%Recovery 112 88		<u>r</u>	0.100 Limits 70 - 130 70 - 130	0.09732		mg/Kg	ent	Sam	97	70 - 130 ab Control S Prep Typ Prep E	e: To	tal/N : 89
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282	%Recovery 112 88		<u>r</u>	0.100 <i>Limits</i> 70 - 130 70 - 130 <b>Spike</b>	0.09732 LCSD	LCSD	mg/Kg	ent		97 ple ID: La	70 - 130 ab Control S Prep Typ Prep E %Rec.	e: To latch	tal/N : 89 R
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte	%Recovery 112 88		r	0.100 <i>Limits</i> 70 - 130 70 - 130 Spike Added	0.09732 LCSD Result	LCSD Qualifier	mg/Kg Cli	ent	Sam	97 ple ID: La	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits	e: To Batch RPD	tal/N : 89 R
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene	%Recovery 112 88		r	0.100 Limits 70 - 130 70 - 130 Spike Added 0.100	0.09732 LCSD Result 0.08283		Cli Unit mg/Kg	ent		97 ple ID: La	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130	e: To Batch RPD 8	tal/N : 89 R
D-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene	%Recovery 112 88		r	0.100 <i>Limits</i> 70 - 130 70 - 130 Spike Added	0.09732 LCSD Result		Cli Unit mg/Kg mg/Kg	ent :		97 ple ID: La	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits	e: To Batch RPD	tal/I : 89 R
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene	%Recovery 112 88		r	0.100 Limits 70 - 130 70 - 130 Spike Added 0.100	0.09732 LCSD Result 0.08283		Cli Unit mg/Kg	ent :		97 ple ID: La <u>%Rec</u>	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130	e: To Batch RPD 8	tal/N : 894 Ri Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene	%Recovery 112 88		r	0.100 Limits 70 - 130 70 - 130 Spike Added 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609		Cli Unit mg/Kg mg/Kg	ent :		97 ple ID: La <u>%Rec</u> 83 86	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130	e: To Batch RPD 8 5	tal/N : 89 Ri Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene	%Recovery 112 88		<u>r</u>	0.100 Limits 70 - 130 70 - 130 <b>Spike</b> Added 0.100 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041		mg/Kg Cli mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La <u>%Rec</u> 83 86 90	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130 70 - 130	e: To Batch RPD 8 5 4	tal/N : 894 RI Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene	%Recovery 0 112 88 2/2-A	Qualifie	<u>r</u>	0.100 <i>Limits</i> 70 - 130 70 - 130 <b>Spike</b> Added 0.100 0.100 0.100 0.200	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	e: To Batch RPD 8 5 4 3	tal/N : 894 RI Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene	<u>%Recovery</u> 112 88 2/2-A	Qualified		0.100 Limits 70 - 130 70 - 130 <b>Spike</b> Added 0.100 0.100 0.100 0.200 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	e: To Batch RPD 8 5 4 3	tal/N : 894 RI Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate	%Recovery 0 112 88 2/2-A LCSD 1 %Recovery 0	Qualified		0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.100 Limits	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	e: To Batch RPD 8 5 4 3	tal/N : 894 RI Lir
Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr)	<u>%Recovery</u> <u>112</u> <u>88</u> <b>2/2-A</b> <u>LCSD</u> <u>%Recovery</u> <u>116</u>	Qualified		0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.200 0.100 0.100 0.200 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ient :		97 ple ID: La %Rec 83 86 90 95	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	e: To Batch RPD 8 5 4 3	tal/N : 894 RI Lir
Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr)	%Recovery 0 112 88 2/2-A LCSD 1 %Recovery 0	Qualified		0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.100 Limits	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	e: To Batch RPD 8 5 4 3	tal/N : 894 RI Lir
Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	%Recovery         4           112         88           2/2-A         2           %Recovery         4           %Recovery         4           116         76	Qualified		0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.200 0.100 0.100 0.200 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95 96	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	e: To Batch RPD 8 5 4 3 2	tal/N : 894 Ri Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-1 MS	%Recovery         4           112         88           2/2-A         2           %Recovery         4           %Recovery         4           116         76	Qualified		0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.200 0.100 0.100 0.200 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95 96	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	e: To satch RPD 8 5 4 3 2 2	tal/N : 894 Ri Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-1 MS Matrix: Solid	%Recovery         4           112         88           2/2-A         2           %Recovery         4           %Recovery         4           116         76	Qualified		0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.200 0.100 0.100 0.200 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95 96	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 190 Prep Typ	e: To satch RPD 8 5 4 3 2 2 e ID: e: To	tal/N : 894 Ri Lir BH( tal/N
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-1 MS	%Recovery         4           112         88           2/2-A         2           %Recovery         4           %Recovery         4           116         76	Qualifie CSD Qualifie	r	0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.200 0.100 Umits 70 - 130 70 - 130	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906 0.09563	Qualifier	mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95 96	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 190 Prep Typ Prep Typ Prep E	e: To satch RPD 8 5 4 3 2 2 e ID: e: To	tal/N : 894 Ri Lir BH( tal/N
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-1 MS Matrix: Solid Analysis Batch: 9282	%Recovery         4           112         88           2/2-A         2           %Recovery         4           %Recovery         4           76         76           Sample         5	Qualifier CSD Qualifier Sample	<u>r</u>	0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.200 0.100 Uimits 70 - 130 70 - 130 70 - 130	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906 0.09563	Qualifier	Cli Unit mg/Kg mg/Kg mg/Kg mg/Kg	ent	<u>D</u>	97 ple ID: La %Rec 83 86 90 95 96	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 190 Prep Typ Prep Typ Prep E %Rec.	e: To satch RPD 8 5 4 3 2 2 e ID: e: To	tal/N : 894 Ri Lin BH( tal/N
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-894 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-1 MS Matrix: Solid	%Recovery         4           112         88           2/2-A         2           %Recovery         4           %Recovery         4           116         76	Qualifier CSD Qualifier Qualifier	<u>r</u>	0.100 Limits 70 - 130 70 - 130 70 - 130 Spike Added 0.100 0.100 0.100 0.200 0.100 0.200 0.100 Umits 70 - 130 70 - 130	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906 0.09563	Qualifier	mg/Kg Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent :		97 ple ID: La %Rec 83 86 90 95 96	70 - 130 ab Control S Prep Typ Prep E %Rec. Limits 70 - 130 70 - 190 Prep Typ Prep Typ Prep E	e: To satch RPD 8 5 4 3 2 2 e ID: e: To	tal/N : 894 Ri Lir BH( tal/N

Eurofins Xenco, Carlsbad

Client: WSP USA Inc.

Project/Site: Tiger CS

#### Job ID: 890-1382-1 SDG: 31403236.022.0129

#### Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 890-1382-1 MS											<b>Client Sam</b>	n <mark>ple ID</mark> :	BH01
Matrix: Solid											Prep T	ype: To	tal/NA
Analysis Batch: 9282											Prep	b Batch	: 8942
	Sample	Sam	ple	Spike	MS	MS					%Rec.		
Analyte	Result	Qua	lifier	Added	Result	Qualifier	Unit		D	%Rec	Limits		
Ethylbenzene	0.0114			0.0990	0.1000		mg/Kg			90	70 - 130		
m-Xylene & p-Xylene	0.00511			0.198	0.2115		mg/Kg			104	70 - 130		
o-Xylene	0.0275			0.0990	0.1061		mg/Kg			79	70 _ 130		
	MS	MS											
Surrogate	%Recovery	Qua	lifier	Limits									
4-Bromofluorobenzene (Surr)	119			70 - 130	-								
1,4-Difluorobenzene (Surr)	77			70 _ 130									
Lab Sample ID: 890-1382-1 MSE	)										Client Sam	nple ID:	BH01
Matrix: Solid											Prep T		
Analysis Batch: 9282												Batch	
-	Sample	Sam	ple	Spike	MSD	MSD					%Rec.		RPD
Analyte	Result	Qua	lifier	Added	Result	Qualifier	Unit		D	%Rec	Limits	RPD	Limit
Benzene	<0.00199	U		0.0992	0.09504		mg/Kg			95	70 - 130	7	35
Toluene	<0.00199	U		0.0992	0.09440		mg/Kg			94	70 - 130	1	35
Ethylbenzene	0.0114			0.0992	0.09963		mg/Kg			89	70 - 130	0	35
m-Xylene & p-Xylene	0.00511			0.198	0.2082		mg/Kg			102	70 - 130	2	35
o-Xylene	0.0275			0.0992	0.1047		mg/Kg			78	70 - 130	1	35
	MSD	MSD	)										
Surrogate	%Recovery	Qua	lifier	Limits									
4-Bromofluorobenzene (Surr)	118			70 - 130	-								
1,4-Difluorobenzene (Surr)	88			70 - 130									
lethod: 8015B NM - Diesel	Range O	raar	nics (DR	(O) (GC)									
		<b>J</b>	(	/(/	,								
Lab Sample ID: MB 880-9312/1-	Α									Client S	ample ID: N		
Matrix: Solid											Prep T		
Analysis Batch: 9261											Prep	b Batch	: 9312
		ΜВ											
Analyte			Qualifier		RL	Uni	-	<u>D</u>		repared	Analyze		Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<	<50.0	U		50.0	mg	/Kg		10/1	2/21 14:04	10/12/21 2	20:01	1
Diesel Range Organics (Over C10-C28)	•	<50.0	U		50.0	mg	/Kg		10/1	2/21 14:04	10/12/21 2	20:01	1
							16-		401	~~~	10/10/01 0		

	MB	МВ			
Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed
1-Chlorooctane	115		70 - 130	10/12/21 14:04	10/12/21 20:01
o-Terphenyl	133	S1+	70 - 130	10/12/21 14:04	10/12/21 20:01

<50.0 U

#### Lab Sample ID: LCS 880-9312/2-A Matrix: Solid Analysis Batch: 9261

Oll Range Organics (Over C28-C36)

Analysis Batch: 9261							Pre	p Batch: 9312
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	1102		mg/Kg		110	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	973.2		mg/Kg		97	70 - 130	
C10-C28)								

50.0

mg/Kg

Eurofins Xenco, Carlsbad

Prep Type: Total/NA

10/12/21 14:04 10/12/21 20:01

**Client Sample ID: Lab Control Sample** 

1

1

1

Dil Fac

Lab Sample ID: LCS 880-9312/2-A

#### **QC Sample Results**

Page 154 of 331

Job ID: 890-1382-1

SDG: 31403236.022.0129

**Client Sample ID: Lab Control Sample** 

Client: WSP USA Inc. Project/Site: Tiger CS

Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Matrix: Solid									Prep 1	ype: Tot	tal/N/
Analysis Batch: 9261									Pre	p Batch:	: 931
	LCS	LCS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	92		70 - 130								
o-Terphenyl	90		70 - 130								
Lab Sample ID: LCSD 880-9312/3	<b>^</b>					Clie	nt San		Lab Contro	I Samal	~ D
Matrix: Solid	<b>D-A</b>					Cile	ni San	ipie ib.			
Analysis Batch: 9261										ype: Tot p Batch:	
Analysis Batch. 9201			Spike	1.050	LCSD				%Rec.	p Daten.	. 931 RP
Analyte			Added		Qualifier	Unit	D	%Rec	Limits	RPD	Lim
Gasoline Range Organics			1000	1032	Quanner	mg/Kg		103	70 - 130	7	2
(GRO)-C6-C10			1000	1052		mg/itg		100	70 - 150	1	2
Diesel Range Organics (Over C10-C28)			1000	984.4		mg/Kg		98	70 - 130	1	2
,	LCSD	LCSD									
Surrogate	%Recovery		Limits								
1-Chlorooctane	101		70 - 130								
o-Terphenyl	101		70 - 130								
	101		10 - 100								
Lab Sample ID: 890-1382-1 MS									<b>Client Sar</b>	nple ID:	BH0
Matrix: Solid									Prep 1	ype: Tot	tal/N
Analysis Batch: 9261									Pre	p Batch:	: 931
-	Sample	Sample	Spike	MS	MS				%Rec.	-	
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Gasoline Range Organics	<49.9	U F1	997	1314	F1	mg/Kg		132	70 - 130		
(GRO)-C6-C10											
Diesel Range Organics (Over	124		997	1290		mg/Kg		117	70 - 130		
C10-C28)											
	MS	MS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	118		70 - 130								
o-Terphenyl	115		70 - 130								
Lab Sample ID: 890-1382-1 MSD									Client Sar	nple ID:	BH0
Matrix: Solid										· ype: Tot	
Analysis Batch: 9261										p Batch:	
	Sample	Sample	Spike	MSD	MSD				%Rec.		RP
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Lim
Gasoline Range Organics (GRO)-C6-C10	<49.9		1000	1419		mg/Kg		142	70 - 130	8	2
Diesel Range Organics (Over C10-C28)	124		1000	1297		mg/Kg		117	70 <sub>-</sub> 130	1	2
		Men									
	MSD	WSD									
Surrogate	MSD %Recovery		Limits								
Surrogate			Limits 70 - 130								

Client: WSP USA Inc.

Project/Site: Tiger CS

#### **QC Sample Results**

Job ID: 890-1382-1
SDG: 31403236.022.0129

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-9194/1-A Matrix: Solid								0	Client S	ample ID:		
										Prep	Type: So	oiubie
Analysis Batch: 9216		МВ МВ										
Analyte	Ba	sult Qualifie		RL	Unit		D	Dr	epared	Analy		Dil Fac
Chloride			·	5.00	0mit mg/K	~	<u> </u>	FI	epareu			1 DII Fac
		5.00 0		5.00	iiig/K	y				10/11/21	13.59	1
Lab Sample ID: LCS 880-9194/2-4	4						Cli	ent	Sample	ID: Lab C	ontrol Sa	ample
Matrix: Solid											Type: So	
Analysis Batch: 9216												
-			Spike	LCS	LCS					%Rec.		
Analyte			Added	Result	Qualifier	Unit		D	%Rec	Limits		
Chloride			250	241.0		mg/Kg			96	90 _ 110		
												_
Lab Sample ID: LCSD 880-9194/3	- <b>A</b>					CI	ient S	Sam	pie ID: I	_ab Contro		
Matrix: Solid										Pren	Type: So	oluble
											<b>2</b> 10	
Analysis Batch: 9216												
			Spike		LCSD			_	~-	%Rec.		RPD
Analyte			Added	Result	LCSD Qualifier	Unit		D	%Rec	%Rec. Limits	RPD	RPD Limit
						Unit mg/Kg		<u>D</u>	<b>%Rec</b> 98	%Rec.		RPD Limit
Analyte Chloride			Added	Result				D _	98	%Rec. Limits 90 - 110	<b>RPD</b> 1	RPD Limit 20
Analyte	MS		Added	Result				<u>D</u>	98	%Rec. Limits 90 - 110 Sample ID	RPD 1	RPD Limit 20 Spike
Analyte Chloride Lab Sample ID: 880-6899-A-22-C Matrix: Solid	MS		Added	Result				<u>D</u>	98	%Rec. Limits 90 - 110 Sample ID	<b>RPD</b> 1	RPD Limit 20 Spike
Analyte Chloride Lab Sample ID: 880-6899-A-22-C	MS Sample	Sample	Added	Result 243.8				<u>D</u>	98	%Rec. Limits 90 - 110 Sample ID	RPD 1	RPD Limit 20 Spike
Analyte Chloride Lab Sample ID: 880-6899-A-22-C Matrix: Solid	Sample	Sample Qualifier	Added 250	Result 243.8 MS	Qualifier			<u>D</u> _	98	%Rec. Limits 90 - 110 Sample ID Prep	RPD 1	RPD Limit 20 Spike
Analyte Chloride Lab Sample ID: 880-6899-A-22-C Matrix: Solid Analysis Batch: 9216	Sample	•	Added 250 Spike	Result 243.8 MS	Qualifier	mg/Kg			98 Client	%Rec. Limits 90 - 110 Sample ID Prep %Rec.	RPD 1	RPD Limit 20 Spike
Analyte Chloride Lab Sample ID: 880-6899-A-22-C Matrix: Solid Analysis Batch: 9216 Analyte Chloride	Sample Result 42.4	•	Added 250 Spike Added	Result 243.8 MS Result	Qualifier	Unit mg/Kg		<u>D</u>	98 Client %Rec 90	%Rec. Limits 90 - 110 Sample IE Prep %Rec. Limits 90 - 110	 1 P: Matrix Type: So	RPD Limit 20 Spike oluble
Analyte Chloride Lab Sample ID: 880-6899-A-22-C Matrix: Solid Analysis Batch: 9216 Analyte Chloride Lab Sample ID: 880-6899-A-22-D	Sample Result 42.4	•	Added 250 Spike Added	Result 243.8 MS Result	Qualifier	Unit mg/Kg	Clien	<u>D</u>	98 Client %Rec 90	%Rec. Limits 90 - 110 Sample IE Prep %Rec. Limits 90 - 110 P: Matrix S	 P: Matrix Type: So 	RPD Limit 20 Spike oluble
Analyte Chloride Lab Sample ID: 880-6899-A-22-C Matrix: Solid Analysis Batch: 9216 Analyte Chloride Lab Sample ID: 880-6899-A-22-D Matrix: Solid	Sample Result 42.4	•	Added 250 Spike Added	Result 243.8 MS Result	Qualifier	Unit mg/Kg	Clien	<u>D</u>	98 Client %Rec 90	%Rec. Limits 90 - 110 Sample IE Prep %Rec. Limits 90 - 110 P: Matrix S	 1 P: Matrix Type: So	RPD Limit 20 Spike oluble
Analyte Chloride Lab Sample ID: 880-6899-A-22-C Matrix: Solid Analysis Batch: 9216 Analyte Chloride Lab Sample ID: 880-6899-A-22-D	Sample Result 42.4 MSD	Qualifier _	Added 250 Spike Added 250	Result 243.8 MS Result 266.4	Qualifier MS Qualifier	Unit mg/Kg	Clien	<u>D</u>	98 Client %Rec 90	%Rec. Limits 90 - 110 Sample ID Prep %Rec. Limits 90 - 110 : Matrix S Prep	 P: Matrix Type: So 	RPD Limit 20 Spike oluble
Analyte Chloride Lab Sample ID: 880-6899-A-22-C Matrix: Solid Analysis Batch: 9216 Analyte Chloride Lab Sample ID: 880-6899-A-22-D Matrix: Solid	Sample Result 42.4 MSD Sample	Qualifier _	Added 250 Spike Added	Result 243.8 MS Result 266.4 MSD	Qualifier	Unit mg/Kg	Clien	<u>D</u>	98 Client %Rec 90	%Rec. Limits 90 - 110 Sample IE Prep %Rec. Limits 90 - 110 P: Matrix S	 P: Matrix Type: So 	RPD Limit 20 Spike oluble

#### **QC Association Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1382-1 SDG: 31403236.022.0129

#### GC VOA

#### Prep Batch: 8942

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1382-1	BH01	Total/NA	Solid	5035	
890-1382-2	BH01A	Total/NA	Solid	5035	
890-1382-3	BH01B	Total/NA	Solid	5035	
890-1382-4	BH01C	Total/NA	Solid	5035	
890-1382-5	FS01	Total/NA	Solid	5035	
890-1382-6	FS02	Total/NA	Solid	5035	
890-1382-7	SW01	Total/NA	Solid	5035	
890-1382-8	SW02	Total/NA	Solid	5035	
MB 880-8942/5-B	Method Blank	Total/NA	Solid	5035	
LCS 880-8942/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-8942/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
890-1382-1 MS	BH01	Total/NA	Solid	5035	
890-1382-1 MSD	BH01	Total/NA	Solid	5035	

#### Analysis Batch: 9282

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1382-1	BH01	Total/NA	Solid	8021B	8942
890-1382-2	BH01A	Total/NA	Solid	8021B	8942
890-1382-3	BH01B	Total/NA	Solid	8021B	8942
890-1382-4	BH01C	Total/NA	Solid	8021B	8942
890-1382-5	FS01	Total/NA	Solid	8021B	8942
890-1382-6	FS02	Total/NA	Solid	8021B	8942
890-1382-7	SW01	Total/NA	Solid	8021B	8942
890-1382-8	SW02	Total/NA	Solid	8021B	8942
MB 880-8942/5-B	Method Blank	Total/NA	Solid	8021B	8942
LCS 880-8942/1-A	Lab Control Sample	Total/NA	Solid	8021B	8942
LCSD 880-8942/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	8942
890-1382-1 MS	BH01	Total/NA	Solid	8021B	8942
890-1382-1 MSD	BH01	Total/NA	Solid	8021B	8942

#### Analysis Batch: 9297

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1382-1	BH01	Total/NA	Solid	Total BTEX	
890-1382-2	BH01A	Total/NA	Solid	Total BTEX	
890-1382-3	BH01B	Total/NA	Solid	Total BTEX	
890-1382-4	BH01C	Total/NA	Solid	Total BTEX	
890-1382-5	FS01	Total/NA	Solid	Total BTEX	
890-1382-6	FS02	Total/NA	Solid	Total BTEX	
890-1382-7	SW01	Total/NA	Solid	Total BTEX	
890-1382-8	SW02	Total/NA	Solid	Total BTEX	
<u> </u>					

#### GC Semi VOA

#### Analysis Batch: 9189

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1382-1	BH01	Total/NA	Solid	8015 NM	
890-1382-2	BH01A	Total/NA	Solid	8015 NM	
890-1382-3	BH01B	Total/NA	Solid	8015 NM	
890-1382-4	BH01C	Total/NA	Solid	8015 NM	
890-1382-5	FS01	Total/NA	Solid	8015 NM	
890-1382-6	FS02	Total/NA	Solid	8015 NM	

Eurofins Xenco, Carlsbad

#### **QC** Association Summary

Client: WSP USA Inc. Project/Site: Tiger CS

#### GC Semi VOA (Continued)

#### Analysis Batch: 9189 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1382-7	SW01	Total/NA	Solid	8015 NM	
890-1382-8	SW02	Total/NA	Solid	8015 NM	

#### Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	
890-1382-1	BH01	Total/NA	Solid	8015B NM	9312	
890-1382-2	BH01A	Total/NA	Solid	8015B NM	9312	-
890-1382-3	BH01B	Total/NA	Solid	8015B NM	9312	8
890-1382-4	BH01C	Total/NA	Solid	8015B NM	9312	
890-1382-5	FS01	Total/NA	Solid	8015B NM	9312	9
890-1382-6	FS02	Total/NA	Solid	8015B NM	9312	
890-1382-7	SW01	Total/NA	Solid	8015B NM	9312	
890-1382-8	SW02	Total/NA	Solid	8015B NM	9312	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312	
890-1382-1 MS	BH01	Total/NA	Solid	8015B NM	9312	
890-1382-1 MSD	BH01	Total/NA	Solid	8015B NM	9312	

#### Prep Batch: 9312

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1382-1	BH01	Total/NA	Solid	8015NM Prep	
890-1382-2	BH01A	Total/NA	Solid	8015NM Prep	
890-1382-3	BH01B	Total/NA	Solid	8015NM Prep	
890-1382-4	BH01C	Total/NA	Solid	8015NM Prep	
890-1382-5	FS01	Total/NA	Solid	8015NM Prep	
890-1382-6	FS02	Total/NA	Solid	8015NM Prep	
890-1382-7	SW01	Total/NA	Solid	8015NM Prep	
890-1382-8	SW02	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-1 MS	BH01	Total/NA	Solid	8015NM Prep	
890-1382-1 MSD	BH01	Total/NA	Solid	8015NM Prep	

#### HPLC/IC

#### Leach Batch: 9194

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1382-1	BH01	Soluble	Solid	DI Leach	
890-1382-2	BH01A	Soluble	Solid	DI Leach	
890-1382-3	BH01B	Soluble	Solid	DI Leach	
890-1382-4	BH01C	Soluble	Solid	DI Leach	
890-1382-5	FS01	Soluble	Solid	DI Leach	
890-1382-6	FS02	Soluble	Solid	DI Leach	
890-1382-7	SW01	Soluble	Solid	DI Leach	
890-1382-8	SW02	Soluble	Solid	DI Leach	
MB 880-9194/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9194/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9194/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	
880-6899-A-22-C MS	Matrix Spike	Soluble	Solid	DI Leach	

#### Eurofins Xenco, Carlsbad

Page 157 of 331

#### Job ID: 890-1382-1 SDG: 31403236.022.0129

Job ID: 890-1382-1 SDG: 31403236.022.0129

#### HPLC/IC (Continued)

#### Leach Batch: 9194 (Continued)

each Batch: 9194 (Cor	ntinued)				
Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
880-6899-A-22-D MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	
analysis Batch: 9216					
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1382-1	BH01	Soluble	Solid	300.0	9194
890-1382-2	BH01A	Soluble	Solid	300.0	9194
890-1382-3	BH01B	Soluble	Solid	300.0	9194
890-1382-4	BH01C	Soluble	Solid	300.0	9194
890-1382-5	FS01	Soluble	Solid	300.0	9194
890-1382-6	FS02	Soluble	Solid	300.0	9194
890-1382-7	SW01	Soluble	Solid	300.0	9194
890-1382-8	SW02	Soluble	Solid	300.0	9194
MB 880-9194/1-A	Method Blank	Soluble	Solid	300.0	9194
LCS 880-9194/2-A	Lab Control Sample	Soluble	Solid	300.0	9194
LCSD 880-9194/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9194
880-6899-A-22-C MS	Matrix Spike	Soluble	Solid	300.0	9194
880-6899-A-22-D MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9194

Job ID: 890-1382-1

Matrix: Solid

Matrix: Solid

SDG: 31403236.022.0129

Lab Sample ID: 890-1382-1

Lab Sample ID: 890-1382-2

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger CS

#### Client Sample ID: BH01 Date Collected: 10/07/21 12:37

Date Received: 10/08/21 08:47

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 13:24	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9189	10/11/21 10:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/12/21 21:04	AJ	XEN MID
Soluble	Leach	DI Leach			9194	10/11/21 11:17	СН	XEN MID
Soluble	Analysis	300.0		1	9216	10/11/21 14:42	SC	XEN MID

#### Client Sample ID: BH01A Date Collected: 10/07/21 12:39

#### Date Received: 10/08/21 08:47

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 13:44	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9189	10/11/21 10:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/12/21 22:07	AJ	XEN MID
Soluble	Leach	DI Leach			9194	10/11/21 11:17	СН	XEN MID
Soluble	Analysis	300.0		1	9216	10/11/21 14:49	SC	XEN MID

#### Client Sample ID: BH01B

#### Date Collected: 10/07/21 12:42 Date Received: 10/08/21 08:47

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 14:05	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9189	10/11/21 10:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/12/21 22:28	AJ	XEN MID
Soluble	Leach	DI Leach			9194	10/11/21 11:17	СН	XEN MID
Soluble	Analysis	300.0		1	9216	10/11/21 14:57	SC	XEN MID

#### Client Sample ID: BH01C Date Collected: 10/07/21 12:43 Date Received: 10/08/21 08:47

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 14:25	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID

Eurofins Xenco, Carlsbad

Lab Sample ID: 890-1382-4

#### Lab Sample ID: 890-1382-3 Matrix: Solid

Matrix: Solid

Job ID: 890-1382-1

Matrix: Solid

Matrix: Solid

Matrix: Solid

SDG: 31403236.022.0129

Lab Sample ID: 890-1382-4

Lab Sample ID: 890-1382-6

Lab Sample ID: 890-1382-7

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger CS

#### Client Sample ID: BH01C Date Collected: 10/07/21 12:43

Date Received: 10/08/21 08:47

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	8015 NM		1	9189	10/11/21 10:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/12/21 22:49	AJ	XEN MID
Soluble	Leach	DI Leach			9194	10/11/21 11:17	СН	XEN MID
Soluble	Analysis	300.0		1	9216	10/11/21 15:04	SC	XEN MID
lient Samp	le ID: FS01							Lab Sample ID: 890-1382-

#### Client Sample ID: FS01 Date Collected: 10/07/21 11:40 Date Received: 10/08/21 08:47

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 14:58	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9189	10/11/21 10:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/12/21 23:10	AJ	XEN MID
Soluble	Leach	DI Leach			9194	10/11/21 11:17	СН	XEN MID
Soluble	Analysis	300.0		1	9216	10/11/21 15:25	SC	XEN MID

#### Client Sample ID: FS02

Date Collected: 10/07/21 13:50 Date Received: 10/08/21 08:47

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 15:18	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9189	10/11/21 10:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/12/21 23:31	AJ	XEN MID
Soluble	Leach	DI Leach			9194	10/11/21 11:17	СН	XEN MID
Soluble	Analysis	300.0		1	9216	10/11/21 15:33	SC	XEN MID

#### Client Sample ID: SW01

Date Collected: 10/07/21 14:00 Date Received: 10/08/21 08:47

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 15:39	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9189	10/11/21 10:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/12/21 23:52	AJ	XEN MID

Eurofins Xenco, Carlsbad

#### Released to Imaging: 3/14/2022 1:38:16 PM

Matrix: Solid

Job ID: 890-1382-1

Matrix: Solid

9

SDG: 31403236.022.0129

Lab Sample ID: 890-1382-7

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger CS

#### Client Sample ID: SW01 Date Collected: 10/07/21 14:00

Date Received: 10/08/21 08:47

		Batch	Batch		Dilution	Batch	Prepared		
Pre	ер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Sol	luble	Leach	DI Leach			9194	10/11/21 11:17	СН	XEN MID
Sol	luble	Analysis	300.0		1	9216	10/11/21 15:40	SC	XEN MID

#### Client Sample ID: SW02 Date Collected: 10/07/21 14:15 Date Received: 10/08/21 08:47

Lab Sample ID:	890-1382-8
	Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 15:59	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9189	10/11/21 10:26	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/13/21 00:13	AJ	XEN MID
Soluble	Leach	DI Leach			9194	10/11/21 11:17	СН	XEN MID
Soluble	Analysis	300.0		1	9216	10/11/21 15:47	SC	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

Page 162 of 331

Client: WSP USA Inc.				Job ID: 890-1382-1
Project/Site: Tiger CS				SDG: 31403236.022.0129
Laboratory: Eurofi	ins Xenco, Midl	and		
Unless otherwise noted, all a	nalytes for this laborato	ry were covered under each acc	reditation/certification below.	
 Authority		Program	Identification Number	Expiration Date
Texas		NELAP	T104704400-21-22	06-30-22
The following analytes the agency does not of Analysis Method		rt, but the laboratory is not certif Matrix	fied by the governing authority. This list ma	ay include analytes for which
8015 NM		Solid	Total TPH	
Total BTEX		Solid	Total BTEX	

Eurofins Xenco, Carlsbad

.

#### **Method Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1382-1 SDG: 31403236.022.0129

Method	Method Description	Protocol	Laboratory
3021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Fotal BTEX	Total BTEX Calculation	TAL SOP	XEN MID
3015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
3015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
3015NM Prep	Microextraction	SW846	XEN MID
OI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### Protocol References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

: 31403236.022.0129

Eurofins Xenco, Carlsbad

#### **Sample Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1382-1 SDG: 31403236.022.0129

ab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth	
0-1382-1	BH01	Solid	10/07/21 12:37	10/08/21 08:47	1	
0-1382-2	BH01A	Solid	10/07/21 12:39	10/08/21 08:47	2	
0-1382-3	BH01B	Solid	10/07/21 12:42	10/08/21 08:47	3	
0-1382-4	BH01C	Solid	10/07/21 12:43	10/08/21 08:47	4	
0-1382-5	FS01	Solid	10/07/21 11:40	10/08/21 08:47	1 - 1.5	
0-1382-6	FS02	Solid	10/07/21 13:50	10/08/21 08:47	4	
0-1382-7	SW01	Solid	10/07/21 14:00	10/08/21 08:47	0 - 4	
0-1382-8	SW02	Solid	10/07/21 14:15	10/08/21 08:47	0 - 4	
						- 1
						ľ

			Houston,⊺X Midland,TX	(281) 240-4200 ( (432-704-544(	Dallas,	TX (214 ISO,TX (9	902-030	Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-3334 Midland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)794-1296			
3	Kalei Jenninge	Hobbs,N	IM (575-392-755	.7550) Phoenix,AZ Bill to: (if different)	(480-35	)-355-0900) At Adrian Baker	Atlanta,(	Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (813-620-2000) Bill to: (if different) Adrian Baker	-620-2000)	www.xenco.com <sup>D</sup> age Work Order Comments	<u>ige 1 of 1</u>
Company Name: WSP USA	USA		Co	Company Name:		0			Program: UST/PST	TRP Trownfields	רת C Perfund □
	3300 North A Street Bldg 1, Unit 222	lg 1, Unit 222	Ad	Address:		)4 E Gr	3104 E Green Strret		State of Project:		
e ZIP:	Midland, Texas 79705		Cit	City, State ZIP:	Ca	rlsbad,	Carlsbad, NM 88220		Reporting:Level II		
	817-683-2503		Email: <u>ka</u>	lei.jennings@	<sup>ŷ</sup> wsp.c	om, pa	ivton.be	Email: kalei.jennings@wsp.com, payton.benner@wsp.com	Deliverables: EDD	ADaPT	Other:
Project Name: Tider CS	CS		Turn	Turn Around				ANALYSIS REQUEST	EST		Work Order Notes
÷.	31403236.022.0129	2.0129	Routine							CC:2	CC:2027031001
P.O. Number:			Rush: 2	DAY		-			, , 		
ne:	Payton Benner		Due Date:	Ö			-			NAPF	NAPP2123231376
SAMPLE RECEIPT	Temp Blank:	Ves No	Wet Ice. Yes	No							
Temperature (°C):	6.0/5.8	H.	Thermometer ID		ners						
Received Intact:	Yes No		NW-00	, T				890-1382 Chain of Custody	Custody		
Cooler Custody Seals:		Correct	Correction Factor:	C N		-				TAT	TAT starts the day received by the
			- 1 - 1 - 1			_					
Sample Identification	on Matrix	Sampled	Sampled	Depth	Num	BTE	Chlo				Sample Comments
BH01	S	10/7/2021	12:37 1'		-1 ×	×	×				Discrete
BH01A	S	10/7/2021	12:39 2'		1 ×	××	×				Discrete
BH01B	S	10/7/2021	12:42 3'		1 ×	×	×				Discrete
BH01C	S	10/7/2021	12:43 4'		-1  ×	×	×				Discrete
FS01	S	10/7/2021	11:40 1	1-1.5	 ~	××	×				Composite
FS02	S	10/7/2021	13:50 4'			××	×				Composite
SW01	S	10/7/2021	14:00 0-4			××	×				Composite
SW02	s	10/7/2021	14:15 0-4		-1 ×	×	×				Composite
Total 200.7 / 6010 200.8 / 6020: Circle Method(s) and Metal(s) to be analyzed	200.8 / 6020: Metal(s) to be an	œ	8RCRA 13PPM Tex TCLP / SPLP 6010:	1 Texas 11 A	Al Sb	As	Be	Cd Ca Cr Co d Cr Co Cu Pb	Cu Fe Pb Mg Mn Mo Ni K Mn Mo Ni Se Ag TI U	Se Ag SiO2	2 Na Sr TI Sn U V Zn 1631 / 245.1 / 7470 / 7471 : Hg
Notice: Signature of this documen of service. Xenco will be liable onl of Xenco. A minimum charge of \$7	t and relinquishment of ly for the cost of sampl 75.00 will be applied to	samples constitues and shall not a each project and	ites a valid purch ssume any respoi	ase order from cl nsibility for any lu each sample sut	ient com osses or omitted to	pany to ) expense > Xenco,	incurred s incurred	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of service. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.	is standard terms and cor circumstances beyond the nless previously negotlate	iditions ; control id.	
Relinquished by: (Signature)	ature)	Received b	Received by: (Signature)		D	Date/Time	e	Relinquished by: (Signature)	ure) Rece	Received by: (Signature)	Date/Time
NOWNA OF.	0	ive Cuy	•	01	2/36	6	6 0847	2			
3								0			-
Ű	_			_							Revised Date 051418 Rev 2018 1

Released to Imaging: 3/14/2022 1:38:16 PM



5

13

# Eurofins Xenco, Carlsbad 1089 N Canal St.

# Chain of C 2 U

13

🔅 eurofins 📔 Envir

Released to	Imaging:	3/14/2022	1:38:16	PM	

P Ell

Ver 06/08/2021

Page	27 (	of	29
------	------	----	----

	Relinquished by	Kelingersned by			Constraint independent in the Current (specially)	Unconfirmed Deliverable Regularized 1 II III IV Other (specify)	Possible Hazard Identification	Note: Since laboratory accreditations are subject to change Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed, the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC.		SW02 (890-1382-8)	SW01 (890-1382-7)	FS02 (890-1382-6)	FS01 (890-1382-5)	BH01C (890-1382-4)	BH01B (890-1382-3)	BH01A (890-1382-2)	BH01 (890-1382-1)		Sample Identification - Client ID (Lab ID)		Project Name Tiger CS	Email	Phone: 432-704-5440(Tel)	State Zip: TX, 79701	City Midland	1211 W Florida Ave	Eurofins Xenco	Shipping/Receiving	Client Information (Sub Contract Lab)	Carlsbad NM 88220 Phone 575-988-3199 Fax 575-988-3199
	Date/Time	Date/Time	Date/Time:		Fililialy Deliverable Rank. 2			laces the ownership ( eing analyzed, the sa signed Chain of Cus		10/7/21	10/7/21	10/7/21	10/7/21	10/7/21	10/7/21	10/7/21	10/7/21	X	Sample Date	SSOW# <sup>.</sup>	Project # <sup>.</sup> 89000004	WO #	PO #:		TAT Requested (days):	Due Date Requested 10/12/2021		Phone	Sampler.	
				Date	able Kank.			of method an amples must b stody attesting		14 15 Mountain	14 00 Mountain	13 50 Mountain	11 40 Mountain	12 43 Mountain	12 42 Mountain	12-39 Mountain	12 37 Mountain	X	Sample Time						iys):	ă				, nam
						2		alyte & accredi e shipped back to said compli										Preserva	Sample Type (C=comp, G=grab)											
	Company	Company	Company					tation complian c to the Eurofins cance to Eurofi		Solid	Solid	Solid	Solid	Solid	Solid	Solid	Solid	Preservation Code:	Matrix (W=water S=solid, O=waste/oil, BT=Tissue, A=Air									E-Mail jessic	Lab PM Krame	Chain of Custody Record
				Time <sup>.</sup>	ч И	2	S	ce upon 3 Xenco ns Xenc			_							$\bigotimes$	Field Filtered Perform MS/W				<b>)</b>					E-Mail jessica.kramer@eurofinset.com	Lab PM Kramer Jessica	(ecc
Coole	Rece	Reco	Rece		Special Instructions/QC	 ح	Sample Disposal ( A fee may	out sub LLC lab o LLC.		×	×	×	×	×	×	×	×		8015MOD_NM/8	015NN	I_S_Pr	ep (MC	D) Full	TPH			Accreditations Required (See note) NELAP - Louisiana NELAP	mer@	ssica	ă
Cooler Temperature(s) °C	Received by	fved by	A DA	11	nstru	Return To Client	Disp	contrac oratory		×	×	×	×	×	×	×	×		8015MOD_Calc								Require	eurofi		
berature			Da		ctions	To Cl	osal (	t labon or othe		×	×	×	×	×	X	×	×		300_ORGFM_28 8021B/5035FP_0			~	de				ed (See	nset.c		
			¥				A fee	atories. er instru		××	××	××	×××	×××	x x	× ×	××		Total_BTEX_GC							Anal	AP):	й		
and Ot			Ã		Requi	1.	may	This																		ysis	- Texas			_
and Other Remarks.			Ř		Requirements		be a	sample will be																		ysis Requested	S			
marks.			l		its	Disposal By Lab	sses	shipm provid																		uest		State of Origin: New Mexico	Carrier	
				Method		ial By	sed ii	entis f ed Ar										- Andrew Control of the								ed		of Origi Mexic	Track	
$\mathbf{h}$	9	D		Method of Shipment:		Lab	sam	orward ly chan														· · · · ·						8 3	Carrier Tracking No(s)	
	Date/Time	Date/Time	Date/Time:	ipment			ples	led und liges to																					(s)	
	ne	Ъ					aren	der cha accrec	$\left  - \right $		-														$\neg$					
0 Ú			Ô			Arch	staine	lin-of-c litation		A	`حە	4	4	Selecteral	Å.	<u>(</u> 42)		X	Total Number	163236234-7	ntainei	8	A.S.							
ע			Y			Archive For	be assessed if samples are retained longer than	ustody status												Other:	55		HGF-Me		B - NaOH	Preservation Codes	Job #: 890-1382-1	Page Page 1 of 1	COC Nº 890-454 1	
						Ĭ	ger ti	If the should											Spec		EDTA EDA	Nater	MeOH Amchlor Ascorbic Acid	Nitric Acid NaHSO4	NaOH Zh Acetata	rvatio	382-1	1 of 1	。 54 1	
						1	han 1	laborato be brou										Y	ial In:							n Cod				
F	Company	Company	Company			ş	month)	ory doe ught to									- Contractory Agency (199	1	struct		N ≶ otrp			oro zzz		ŝ				Ame
	bany	oany	bany			Months	É	s not cu Eurofint										$\ $	Special Instructions/Note:		pH 4-5 other (specify)	Acetone MCAA	R - Na2S2O3 S H2SO4 T - TSP Dodecahydrate	1204S	N None					Environment Testing America
								ırrentiy s Xenco										11	Vote:		⊧cify)	a series a	icahvdi							int les
								5 LLC															ate							ang

Job Number: 890-1382-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Carlsbad

#### Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1382 List Number: 1 Creator: Clifton, Cloe

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	

N/A

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

14

#### Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1382 List N Creat

<6mm (1/4").

List Number: 2 Creator: Kramer, Jessica			List Creation: 10/11/21 08:46 A
Question	Answer	Comment	
The cooler's custody seal, if present, is intact.	True		
Sample custody seals, if present, are intact.	True		
The cooler or samples do not appear to have been compromised or tampered with.	True		
Samples were received on ice.	True		
Cooler Temperature is acceptable.	True		
Cooler Temperature is recorded.	True	2.4/2.9	
COC is present.	True		
COC is filled out in ink and legible.	True		
COC is filled out with all pertinent information.	True		
Is the Field Sampler's name present on COC?	True		
There are no discrepancies between the containers received and the COC.	True		
Samples are received within Holding Time (excluding tests with immediate HTs)	True		
Sample containers have legible labels.	True		
Containers are not broken or leaking.	True		
Sample collection date/times are provided.	True		
Appropriate sample containers are used.	True		
Sample bottles are completely filled.	True		
Sample Preservation Verified.	True		
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True		

N/A

Job Number: 890-1382-1 SDG Number: 31403236.022.0129 List Source: Eurofins Xenco, Midland AM 6 7 8 9 10 11 12 13

14

Containers requiring zero headspace have no headspace or bubble is

Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

# Environment Testing America

## **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

#### Laboratory Job ID: 890-1395-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS

#### For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/13/2021 4:23:10 PM Jessica Kramer, Project Manager (432)704-5440

jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access **Have a Question?** Ask-The Expert Visit us at: www.eurofinsus.com/Env

Released to Imaging: 3/14/2022 1:38:16 PM

.

Page 170 of 331

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	7
QC Sample Results	8
QC Association Summary	13
Lab Chronicle	15
Certification Summary	16
Method Summary	17
Sample Summary	18
Chain of Custody	19
	21

Client: WSP USA Inc. Project/Site: Tiger CS Page 171 of 331

Job ID: 890-1395-1
SDG: 31403236.022.0129

#### Qualifiers

Quaimers		3
GC VOA		
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
U	Indicates the analyte was analyzed for but not detected.	5
GC Semi VO	Α	
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	
HPLC/IC		8
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	9
U	Indicates the analyte was analyzed for but not detected.	
Glossary		
Abbreviation	These commonly used abbreviations may or may not be present in this report.	
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis	
%R	Percent Recovery	
CFL	Contains Free Liquid	

CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)

Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)

LOQ Limit of Quantitation (DoD/DOE)

MCL EPA recommended "Maximum Contaminant Level"

MDA Minimum Detectable Activity (Radiochemistry)

MDC Minimum Detectable Concentration (Radiochemistry)

MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit

 NC
 Not Calculated

 ND
 Not Detected at the repo

ND Not Detected at the reporting limit (or MDL or EDL if shown)

NEG Negative / Absent POS Positive / Present POL Practical Quantitatio

PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control

 RER
 Relative Error Ratio (Radiochemistry)

- RL Reporting Limit or Requested Limit (Radiochemistry)
- RPD Relative Percent Difference, a measure of the relative difference between two points
- TEF Toxicity Equivalent Factor (Dioxin)
- TEQ Toxicity Equivalent Quotient (Dioxin)
- TNTC Too Numerous To Count

Job ID: 890-1395-1 SDG: 31403236.022.0129

#### Job ID: 890-1395-1

Client: WSP USA Inc.

Project/Site: Tiger CS

#### Laboratory: Eurofins Xenco, Carlsbad

#### Narrative

Job Narrative 890-1395-1

#### Receipt

The samples were received on 10/8/2021 3:50 PM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice.

#### GC VOA

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-8975 and analytical batch 880-9324 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

Method 300\_ORGFM\_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-9210 and analytical batch 880-9307 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Method: 8021B - Volatile Organic Compounds (GC)

Method: Total BTEX - Total BTEX Calculation

Method: 8015 NM - Diesel Range Organics (DRO) (GC)

Result Qualifier

Qualifier

<0.00202 U

<0.00202 U

<0.00202 U

<0.00403 U

0.00760

0.00760

%Recovery

111

83

0.00760

77.2

Result Qualifier

Result Qualifier

#### **Client Sample Results**

RL

0.00202

0.00202

0.00202

0.00403

0.00202

0.00403

Limits

70 - 130

70 - 130

RL

RL

49.8

0.00403

Unit

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

Unit

Unit

mg/Kg

mg/Kg

D

D

D

Prepared

10/11/21 11:00

10/11/21 11:00

10/11/21 11:00

10/11/21 11:00

10/11/21 11:00

10/11/21 11:00

Prepared

10/11/21 11:00

10/11/21 11:00

Prepared

Prepared

Job ID: 890-1395-1
SDG: 31403236.022.0129

Analyzed

10/12/21 21:37

10/12/21 21:37

10/12/21 21:37

10/12/21 21:37

10/12/21 21:37

10/12/21 21:37

Analyzed

10/12/21 21:37

10/12/21 21:37

Analyzed

10/13/21 08:57

Analyzed

10/13/21 15:09

#### **Client Sample ID: FS03**

Date Collected: 10/08/21 10:58 Date Received: 10/08/21 15:50

Sample Depth: 0 - 1.5

Analyte

Benzene

Toluene

o-Xylene

Surrogate

Analyte

Analyte

Total TPH

Total BTEX

Ethylbenzene

**Xylenes**, Total

m-Xylene & p-Xylene

4-Bromofluorobenzene (Surr)

1,4-Difluorobenzene (Surr)

Client: WSP USA Inc. Project/Site: Tiger CS

Lab Sample ID: 890-1395-1

Matrix: Solid

5

Dil Fac	
1	
1	
1	
1	
1	8
1	
Dil Fac	9
1	
1	
Dil Fac	
1	

Dil Fac	
1	
Dil Fac	

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 03:41	1
Diesel Range Organics (Over C10-C28)	77.2		49.8	mg/Kg		10/12/21 14:04	10/13/21 03:41	1
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 03:41	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	109		70 - 130			10/12/21 14:04	10/13/21 03:41	1
o-Terphenyl	123		70 - 130			10/12/21 14:04	10/13/21 03:41	1
Method: 300.0 - Anions, Ion Chro	matography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	28.7		4.95	mg/Kg			10/12/21 16:47	1
lient Sample ID: FS04						Lab Sar	nple ID: 890-	1395-2
ate Collected: 10/08/21 11:18							•	x: Solid

Date Received: 10/08/21 15:50 Sample Depth: 0 - 1.5

Method: 8021B - Volatile Organic Compounds (GC)								
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/11/21 11:00	10/12/21 21:58	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/11/21 11:00	10/12/21 21:58	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/11/21 11:00	10/12/21 21:58	1
m-Xylene & p-Xylene	<0.00399	U	0.00399	mg/Kg		10/11/21 11:00	10/12/21 21:58	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/11/21 11:00	10/12/21 21:58	1
Xylenes, Total	<0.00399	U	0.00399	mg/Kg		10/11/21 11:00	10/12/21 21:58	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	92		70 - 130			10/11/21 11:00	10/12/21 21:58	1

Eurofins Xenco, Carlsbad

#### **Client Sample Results**

Job ID: 890-1395-1 SDG: 31403236.022.0129

## Lab Sample ID: 890-1395-2

Matrix: Solid

5

Date Collected: 10/08/21 11:18 Date Received: 10/08/21 15:50 nlo Donth: 0 1 5

**Client Sample ID: FS04** 

Samp	le Depth	: 0 - 1.5

Client: WSP USA Inc.

Project/Site: Tiger CS

Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1,4-Difluorobenzene (Surr)	85		70 - 130			10/11/21 11:00	10/12/21 21:58	1
Method: Total BTEX - Total BTEX	Calculation							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00399	U	0.00399	mg/Kg			10/13/21 08:57	1
Method: 8015 NM - Diesel Range	Organics (DR	O) (GC)						
Analyte	- · ·	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<49.8	U	49.8	mg/Kg			10/13/21 15:09	1
Method: 8015B NM - Diesel Rang	e Organics (D	RO) (GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 04:02	1
(GRO)-C6-C10								
Diesel Range Organics (Over	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 04:02	1
C10-C28)								
Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 04:02	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	110		70 - 130			10/12/21 14:04	10/13/21 04:02	1
o-Terphenyl	123		70 - 130			10/12/21 14:04	10/13/21 04:02	1
Method: 300.0 - Anions, Ion Chro	matography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
							10/12/21 15:56	

#### **Surrogate Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1395-1 SDG: 31403236.022.0129

#### Method: 8021B - Volatile Organic Compounds (GC)

#### Matrix: Solid

				Percent Surrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1		5
Lab Sample ID 890-1390-A-1-B MSD	Client Sample ID     Matrix Spike Duplicate	(70-130) 	(70-130) 96		
890-1390-A-1-F MS	Matrix Spike	74	89		6
890-1395-1	FS03	111	83		
890-1395-2	FS04	92	85		
LCS 880-8975/1-A	Lab Control Sample	96	101		
LCSD 880-8975/2-A	Lab Control Sample Dup	82	93		8
MB 880-8975/5-A	Method Blank	113	109		
Surrogate Legend					9

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC)

#### Matrix: Solid

				Percent Surrogate Recovery (Acceptance Limits)
		1CO1	OTPH1	
Sample ID	Client Sample ID	(70-130)	(70-130)	
382-A-1-K MS	Matrix Spike	118	115	
382-A-1-L MSD	Matrix Spike Duplicate	118	113	
1395-1	FS03	109	123	
395-2	FS04	110	123	
380-9312/2-A	Lab Control Sample	92	90	
D 880-9312/3-A	Lab Control Sample Dup	101	101	
880-9312/1-A	Method Blank	115	133 S1+	

#### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Page 175 of 331

Prep Type: Total/NA

Prep Type: Total/NA

Project/Site: Tiger CS

Client: WSP USA Inc.

#### Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-897	5/5-A								С	lient Sa	ample ID: N		
Matrix: Solid											Prep Ty	-	
Analysis Batch: 9324											Prep	Batch	: 897
		MB											
Analyte			Qualifier	RI		Unit		D		pared	Analyze		Dil Fa
Benzene		0198		0.00198		mg/K	-			21 11:00	10/12/21 1		
Toluene	<0.0	0198	U	0.00198	3	mg/K	-		10/11/2	21 11:00	10/12/21 1	9:53	
Ethylbenzene	<0.0	0198	U	0.00198	3	mg/K	g		10/11/:	21 11:00	10/12/21 1	9:53	
m-Xylene & p-Xylene	<0.0	0397	U	0.00397	7	mg/K	g		10/11/2	21 11:00	10/12/21 1	9:53	
o-Xylene	<0.0	0198	U	0.00198	3	mg/K	g		10/11/2	21 11:00	10/12/21 1	9:53	
Xylenes, Total	<0.0	0397	U	0.00397	7	mg/K	g		10/11/2	21 11:00	10/12/21 1	9:53	
		MB	МВ										
Surrogate	%Reco	-	Qualifier	Limits	_					pared	Analyze		Dil Fa
4-Bromofluorobenzene (Surr)		113		70 - 130					10/11/	21 11:00	10/12/21 1	9:53	
1,4-Difluorobenzene (Surr)		109		70 - 130					10/11/	21 11:00	10/12/21 1	9:53	
Lab Sample ID: LCS 880-897	75/1-A							Cli	ent S	ample	ID: Lab Co	ntrol S	ampl
Matrix: Solid										-	Prep Ty		
Analysis Batch: 9324												Batch	
				Spike	LCS	LCS					«Rec.		
Analyte				Added	Result	Qualifier	Unit		D	%Rec	Limits		
Benzene				0.100	0.08714		mg/Kg			87	70 - 130		
Toluene				0.100	0.1017		mg/Kg			102	70 - 130		
Ethylbenzene				0.100	0.1005		mg/Kg			100	70 - 130		
m-Xylene & p-Xylene				0.200	0.1713		mg/Kg			86	70 - 130		
				0.200	0.08029					80	70 - 130 70 - 130		
o-Xylene				0.100	0.06029		mg/Kg			80	70 - 130		
	LCS	LCS											
Surrogate		Qual	ifier	Limits									
4-Bromofluorobenzene (Surr)	96			70 - 130									
1,4-Difluorobenzene (Surr)	101			70 - 130									
Lab Sample ID: LCSD 880-8	975/2-A						CI	ent S	amp	le ID: L	ab Control	Samp	e Du
Matrix: Solid											Prep Ty	pe: To	tal/N
Analysis Batch: 9324											Prep	Batch	: 897
				Spike	LCSD	LCSD					%Rec.		RP
Analyte				Added	Result	Qualifier	Unit		D	%Rec	Limits	RPD	Lim
Benzene				0.100	0.08186		mg/Kg			82	70 - 130	6	3
Toluene				0.100	0.09746		mg/Kg			97	70 - 130	4	3
Ethylbenzene				0.100	0.08894		mg/Kg			89	70 - 130	12	3
m-Xylene & p-Xylene				0.200	0.1547		mg/Kg			77	70 - 130	10	
o-Xylene				0.100	0.07544		mg/Kg			75	70 <sub>-</sub> 130	6	3
,				0.100	0.07044							Ŭ	
Surrogata	LCSD			Limite									
Surrogate 4-Bromofluorobenzene (Surr)	%Recovery	Qual		Limits									
4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	82 93			70 - 130 70 - 130									
				· · · •									
								<b></b>					
	1-B MSD							Client	t San	nple ID:	Matrix Spi		
Lab Sample ID: 890-1390-A-	1-B MSD							Client	t San	nple ID:	: Matrix Spi Prep Ty		
Lab Sample ID: 890-1390-A- Matrix: Solid	1-B MSD							Client	t San	nple ID:	Prep Ty		tal/N
Lab Sample ID: 890-1390-A- Matrix: Solid Analysis Batch: 9324	1-B MSD Sample	Samp	ble	Spike	MSD	MSD		Client	t San	nple ID:	Prep Ty	vpe: To	tal/N/
Lab Sample ID: 890-1390-A- Matrix: Solid		-		Spike Added		MSD Qualifier	Unit	Client		nple ID: %Rec	Prep Ty Prep	vpe: To	tal/N

68

81

70 - 130

70 - 130

5

Released to Imaging: 3/14/2022 1:38:16 PM

Benzene

Toluene

<0.00199 U F1

<0.00199 UF1

0.06752 F1

0.08128

mg/Kg

mg/Kg

0.100

0.100

28

21

35

35

Client: WSP USA Inc. Project/Site: Tiger CS

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Job ID: 890-1395-1 SDG: 31403236.022.0129

#### Lab Sample ID: 890-1390-A-1-B MSD **Client Sample ID: Matrix Spike Duplicate** Matrix: Solid Prep Type: Total/NA Analysis Batch: 9324 Prep Batch: 8975 Sample Sample Spike MSD MSD %Rec. RPD Analyte **Result Qualifier** Added **Result Qualifier** Unit %Rec Limits RPD Limit D Ethylbenzene <0.00199 U F1 0.100 0.07810 78 70 - 130 35 mg/Kg 14 m-Xylene & p-Xylene <0.00398 UF1 0.200 0.1340 F1 mg/Kg 67 70 - 130 16 35 0.06389 F1 o-Xylene <0.00199 UF1 0.100 70 - 130 35 mg/Kg 64 14 MSD MSD Surrogate %Recovery Qualifier Limits 70 - 130 4-Bromofluorobenzene (Surr) 90 70 - 130 1,4-Difluorobenzene (Surr) 96 **Client Sample ID: Matrix Spike** Lab Sample ID: 890-1390-A-1-F MS Matrix: Solid Prep Type: Total/NA Analysis Batch: 9324 Prep Batch: 8975

	Sample	Sample	Spike	MS	MS				%Rec.	
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	<0.00199	U F1	0.100	0.05117	F1	mg/Kg		51	70 - 130	
Toluene	<0.00199	U F1	0.100	0.06554	F1	mg/Kg		65	70 - 130	
Ethylbenzene	<0.00199	U F1	0.100	0.06790	F1	mg/Kg		68	70 - 130	
m-Xylene & p-Xylene	<0.00398	U F1	0.201	0.1146	F1	mg/Kg		57	70 - 130	
o-Xylene	<0.00199	U F1	0.100	0.05541	F1	mg/Kg		55	70 - 130	
	MS	MS								
Surrogate	%Recovery	Qualifier	Limits							
4-Bromofluorobenzene (Surr)	74		70 - 130							

70 - 130

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC)

89

Lab Sample ID: MB 880-9312/1-A Matrix: Solid Analysis Batch: 9261						Client Sa	mple ID: Metho Prep Type: ⊺ Prep Bato	Total/NA
	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
(GRO)-C6-C10								
Diesel Range Organics (Over	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
C10-C28)								
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
	MB	МВ						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	115		70 - 130			10/12/21 14:04	10/12/21 20:01	1
o-Terphenyl	133	S1+	70 - 130			10/12/21 14:04	10/12/21 20:01	1
Lab Sample ID: LCS 880-9312/2-A					c	lient Sample I	D: Lab Control	Sample

#### Lab Sample ID: LCS 880-9312/2-A Matrix: Solid Analysis Batch: 9261

1,4-Difluorobenzene (Surr)

Analysis Batch: 9261							Pre	p Batch: 9312
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	1102		mg/Kg		110	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	973.2		mg/Kg		97	70 - 130	
C10-C28)								

Eurofins Xenco, Carlsbad

Prep Type: Total/NA

Page 178 of 331

Job ID: 890-1395-1

SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger CS

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Matrix: Solid	12/2-A						Client	Sample	ID: Lab Co	ontrol Sa Type: Tot	
Analysis Batch: 9261										p Batch:	
Analysis Datch. 5201									110	p Daten.	551
	LCS	LCS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	92		70 - 130								
o-Terphenyl	90		70 - 130								
Lab Sample ID: LCSD 880-9	312/3-4					Clie	nt Sam		Lab Contro	Sample	- Du
Matrix: Solid	512/3-A					Oller	it Gan	ipie ib. i		ype: Tot	
Analysis Batch: 9261										p Batch:	
Analysis Batch. 9201			Spike		LCSD				%Rec.	p Daten.	RP
Analyte			Added		Qualifier	Unit	D	%Rec	Limits	RPD	Lin
-				1032	Quaimer			103	70 - 130	7	2
Gasoline Range Organics (GRO)-C6-C10			1000	1032		mg/Kg		103	70 - 130	/	2
Diesel Range Organics (Over			1000	984.4		mg/Kg		98	70 - 130	1	2
C10-C28)			1000	001.1		mg/rtg		00	10-100		
,											
		LCSD									
Surrogate		Qualifier	Limits								
1-Chlorooctane	101		70 - 130								
o-Terphenyl	101		70 - 130								
Lab Sample ID: 890-1382-A-								Client	Sample ID	Motrix	Cnil
								Client	Sample ID		
Matrix: Solid										ype: Tot	
Analysis Batch: 9261										p Batch:	931
	-	Sample	Spike	MS			_	~-	%Rec.		
Analyte		Qualifier	Added		Qualifier	Unit	<u>D</u>	%Rec	Limits		
Gasoline Range Organics	<49.9	UF1	997	1314	F1	mg/Kg		132	70 - 130		
(GRO)-C6-C10	124		997	1290		ma/Ka		117	70 - 130		
Disasl Bango Organico (Over			997	1290		mg/Kg		117	70 - 130		
C10-C28)	MS	MS	l incide								
C10-C28) Surrogate	MS %Recovery		Limits								
C10-C28) Surrogate 1-Chlorooctane	MS <u>%Recovery</u> 118		70 - 130								
C10-C28) Surrogate 1-Chlorooctane	MS %Recovery										
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl	MS 		70 - 130			CI	ient Sa	ample IC	): Matrix Sp	bike Dup	licat
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A-	MS 		70 - 130			CI	ient Sa	ample IE	): Matrix Sp Prep T	-	
Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261	MS 		70 - 130			CI	ient Sa	ample IE	Prep T	ype: Tot	al/N
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid	MS <u>%Recovery</u> 118 115 -1-L MSD	Qualifier	70 - 130 70 - 130	MSD	MSD	CI	ient Si	ample IC	Prep T Pre	-	al/N 931
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261	MS <u>%Recovery</u> 118 115 -1-L MSD Sample	Qualifier	70 - 130 70 - 130 <b>Spike</b>		MSD Qualifier			-	Prep T Pre %Rec.	ype: Tot p Batch:	al/N 931 RP
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte	MS %Recovery 118 115 -1-L MSD Sample Result	Qualifier Sample Qualifier	70 - 130 70 - 130 Spike Added	Result	Qualifier	Unit	ient Sa	%Rec	Prep T Pre %Rec. Limits	Type: Tot p Batch: 	al/N 931 RP Lim
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	MS <u>%Recovery</u> 118 115 -1-L MSD Sample	Qualifier Sample Qualifier	70 - 130 70 - 130 <b>Spike</b>		Qualifier			-	Prep T Pre %Rec.	ype: Tot p Batch:	al/N 931 RP Lim
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10	MS %Recovery 118 115 -1-L MSD Sample Result	Qualifier Sample Qualifier	70 - 130 70 - 130 Spike Added	Result	Qualifier	Unit		%Rec	Prep T Pre %Rec. Limits	Type: Tot p Batch: 	al/N 931 RP Lim
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	MS %Recovery 118 115 -1-L MSD -1-L MSD Sample Result <49.9	Qualifier Sample Qualifier	70 - 130 70 - 130 <b>Spike</b> Added 1000	<b>Result</b> 1419	Qualifier	- <mark>Unit</mark> mg/Kg		<b>%Rec</b>	Prep T Pre %Rec. Limits 70 - 130	ype: Tot p Batch: 	al/N 931 RF Lin
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A-	MS %Recovery 118 115 -1-L MSD -1-L MSD Sample Result <49.9 124	Qualifier Sample Qualifier U F1	70 - 130 70 - 130 <b>Spike</b> Added 1000	<b>Result</b> 1419	Qualifier	- <mark>Unit</mark> mg/Kg		<b>%Rec</b>	Prep T Pre %Rec. Limits 70 - 130	ype: Tot p Batch: 	al/N 931 RP Lim
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	MS %Recovery 118 115 -1-L MSD -1-L MSD Sample Result <49.9 124 MSD	Qualifier Sample Qualifier U F1	70 - 130 70 - 130 <b>Spike</b> Added 1000	<b>Result</b> 1419	Qualifier	- <mark>Unit</mark> mg/Kg		<b>%Rec</b>	Prep T Pre %Rec. Limits 70 - 130	ype: Tot p Batch: 	al/N 931 RP Lim
C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	MS %Recovery 118 115 -1-L MSD -1-L MSD Sample Result <49.9 124	Qualifier Sample Qualifier U F1	70 - 130 70 - 130 <b>Spike</b> Added 1000	<b>Result</b> 1419	Qualifier	- <mark>Unit</mark> mg/Kg		<b>%Rec</b>	Prep T Pre %Rec. Limits 70 - 130	ype: Tot p Batch: 	al/N

Client: WSP USA Inc.

Project/Site: Tiger CS

#### **QC Sample Results**

Job ID: 890-1395-1
SDG: 31403236.022.0129

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-9281/1-A Matrix: Solid											Client S	ample ID: Prep		d Blank Soluble
Analysis Batch: 9303														
		MB	МВ											
Analyte			Qualifier		RL		Unit		<u>D</u>	Pr	repared	Analyz	zed	Dil Fac
Chloride	•	<5.00	U		5.00		mg/Kg	9				10/12/21	12:50	1
Lab Sample ID: LCS 880-9281/2-A Matrix: Solid									CI	ient	Sample	ID: Lab C Prep	ontrol S Type: S	
Analysis Batch: 9303														
				Spike		LCS	LCS					%Rec.		
Analyte				Added		Result	Qualifier	Unit		D	%Rec	Limits		
Chloride				250		246.8		mg/Kg			99	90 _ 110		
Lab Sample ID: LCSD 880-9281/3-A Matrix: Solid	N							Cli	ent	Sam	ple ID: I	Lab Contro	ol Samp Type: S	-
Analysis Batch: 9303												Frep	Type: 3	Soluple
				Spike		LCSD	LCSD					%Rec.		RPD
Analyte				Added	1		Qualifier	Unit		D	%Rec	Limits	RPD	Limit
Chloride				250		254.3		mg/Kg		_	102	90 - 110	3	
Lab Sample ID: 880-7069-A-10-E M Matrix: Solid	S										Client	Sample ID Prep	: Matrix Type: S	
Analysis Batch: 9303														
-	Sample	Samp	ole	Spike		MS	MS					%Rec.		
Analysia	Posult	Quali	fier	Added		Result	Qualifier	Unit		D	%Rec	Limits		
Analyte	Result	aduun		Auueu										
Chloride	20.5	Quun		497		547.9		mg/Kg			106	90 _ 110		
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid	20.5		<u></u>						Clier	nt Sa		): Matrix S		-
Chloride Lab Sample ID: 880-7069-A-10-F M	20.5 SD			497		547.9	<u> </u>		Clier	nt Sa		): Matrix S Prep		Soluble
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303	20.5 SD Sample	Samp	ble	497 Spike		547.9 MSD	MSD		Clier		imple ID	): Matrix S  Prep %Rec.	Type: \$	Soluble RPD
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid	20.5 SD	Samp	ble	497		547.9 MSD	<u> </u>		Clier	nt Sa		): Matrix S Prep		Soluble RPD Limit
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303 Analyte Chloride	20.5 SD Sample Result	Samp	ble	497 Spike Added		547.9 MSD Result	MSD	Unit	Clier	<u>D</u>	<b>%Rec</b> 106	): Matrix S Prep %Rec. Limits 90 - 110	<b>Type: \$ RPD</b> 0	RPD Limit
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A	20.5 SD Sample Result	Samp	ble	497 Spike Added		547.9 MSD Result	MSD	Unit	Clier	<u>D</u>	<b>%Rec</b> 106	9: Matrix S Prep %Rec. Limits 90 - 110 Gample ID:	Type: \$ <u> RPD</u> 0 Method	RPD Limit 20
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid	20.5 SD Sample Result	Samp	ble	497 Spike Added		547.9 MSD Result	MSD	Unit	Clier	<u>D</u>	<b>%Rec</b> 106	9: Matrix S Prep %Rec. Limits 90 - 110 Gample ID:	Type: \$ <u> RPD</u> 0 Method	RPD Limit 20
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A	20.5 SD Sample Result	Samp Quali	ble fier	497 Spike Added		547.9 MSD Result	MSD	Unit	Clier	<u>D</u>	<b>%Rec</b> 106	9: Matrix S Prep %Rec. Limits 90 - 110 Gample ID:	Type: \$ <u> RPD</u> 0 Method	RPD Limit 20
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307	20.5 SD Sample Result 20.5	Samp Quali MB	ble fier	497 Spike Added		547.9 MSD Result	MSD Qualifier	Unit		<u>D</u>	%Rec 106 Client S	0: Matrix S Prep %Rec. Limits 90 - 110 Gample ID: Prep	RPD       0       Method       Type: \$	RPD Limit 20 d Blank Soluble
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte	20.5 SD Sample Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added	RL	547.9 MSD Result	MSD Qualifier	Unit mg/Kg	D .	<u>D</u>	<b>%Rec</b> 106	0: Matrix S Prep %Rec. Limits 90 - 110 Cample ID: Prep Analyz	Type: §	RPD Limit 20 d Blank Soluble Dil Fac
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte	20.5 SD Sample Result 20.5	Samp Quali MB	ole fier MB Qualifier	497 Spike Added		547.9 MSD Result	MSD Qualifier	Unit mg/Kg		<u>D</u>	%Rec 106 Client S	0: Matrix S Prep %Rec. Limits 90 - 110 Gample ID: Prep	Type: §	RPD Limit 20 d Blank Soluble Dil Fac
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride	20.5 SD Sample Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added	RL	547.9 MSD Result	MSD Qualifier	Unit mg/Kg	<u>D</u>	D Pr	wind the second	0: Matrix S Prep %Rec. Limits 90 - 110 Cample ID: Prep Analyz	RPD       0       Method       Type: \$       2ed       13:31	RPD Limit 20 d Blank Soluble Dil Fac
Chloride Lab Sample ID: 880-7069-A-10-F M Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307	20.5 SD Sample Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added	RL	547.9 MSD Result	MSD Qualifier	Unit mg/Kg	<u>D</u>	D Pr	wind the second	D: Matrix S Prep %Rec. Limits 90 - 110 Sample ID: Prep Analy: 10/12/21 s ID: Lab C	RPD       0       Method       Type: \$       2ed       13:31       ontrol \$	Soluble RPD Limit 20 d Blank Soluble Dil Fac 1 Sample
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/2-A	20.5 SD Sample Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added 497	RL	547.9 MSD Result 548.0	MSD Qualifier Unit mg/Kg	Unit mg/Kg	<u>D</u>	D Pr	wind the second	2: Matrix S Prep %Rec. Limits 90 - 110 Sample ID: Prep Analy: 10/12/21 e ID: Lab C Prep	RPD       0       Method       Type: \$       2ed       13:31       ontrol \$	Soluble RPD Limit 20 d Blank Soluble Dil Fac 1 Sample
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/2-A Matrix: Solid Analysis Batch: 9307	20.5 SD Sample Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added 497		547.9 MSD Result 548.0	MSD Qualifier Unit mg/Kg	Unit mg/Kg	<u>D</u>	D Pr ient	wple ID %Rec 106 Client S repared Sample	0: Matrix S Prep %Rec. Limits 90 - 110 Gample ID: Prep - Analy: 10/12/21 0 ID: Lab C Prep %Rec.	RPD       0       Method       Type: \$       2ed       13:31       ontrol \$	RPD Limit 20 d Blank Soluble Dil Fac 1 Sample
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/2-A Matrix: Solid Analysis Batch: 9307 Analyte Analysis Batch: 9307 Analyte	20.5 SD Sample Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added 497 Spike Added		547.9 MSD Result 548.0	MSD Qualifier Unit mg/Kg	Unit mg/Kg	<u>D</u>	D Pr	%Rec         106         Client S         repared         Sample         %Rec	0: Matrix S Prep %Rec. Limits 90 - 110 Gample ID: Prep Analy: 10/12/21 9 ID: Lab C Prep %Rec. Limits	RPD       0       Method       Type: \$       2ed       13:31       ontrol \$	RPD Limit 20 d Blank Soluble Dil Fac 1 Sample
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/2-A Matrix: Solid Analysis Batch: 9307 Analyte Analysis Batch: 9307 Analyte	20.5 SD Sample Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added 497		547.9 MSD Result 548.0	MSD Qualifier Unit mg/Kg	Unit mg/Kg	<u>D</u>	D Pr ient	%Rec       106       Client S       repared       Sample	0: Matrix S Prep %Rec. Limits 90 - 110 Gample ID: Prep - Analy: 10/12/21 0 ID: Lab C Prep %Rec.	RPD       0       Method       Type: \$       2ed       13:31       ontrol \$	RPD Limit 20 d Blank Soluble Dil Fac 1 Sample
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/2-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/3-A	20.5 SD Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added 497 Spike Added		547.9 MSD Result 548.0	MSD Qualifier Unit mg/Kg	Unit mg/Kg	D CI	D Pr ient	%Rec         106         Client S         repared         Sample         %Rec         97	D: Matrix S Prep %Rec. Limits 90 - 110 Cample ID: Prep Analyz 10/12/21 Prep %Rec. Limits 90 - 110 Lab Contro	RPD         0         Method         Type: \$         2zed         13:31         ontrol \$         Type: \$         Ontrol \$         D         Samp	Soluble RPD Limit 20 d Blank Soluble Dil Fac 1 Sample Soluble Dil Fac
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/2-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCSD 880-9210/3-A Matrix: Solid	20.5 SD Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added 497 Spike Added		547.9 MSD Result 548.0	MSD Qualifier Unit mg/Kg	Unit mg/Kg	D CI	D Pr ient	%Rec         106         Client S         repared         Sample         %Rec         97	D: Matrix S Prep %Rec. Limits 90 - 110 Cample ID: Prep Analyz 10/12/21 Prep %Rec. Limits 90 - 110 Lab Contro	RPD         0         Method         Type: \$         2zed         13:31         ontrol \$         Type: \$         Ontrol \$         D         Samp	Soluble RPD Limit 20 Blank Soluble Dil Fac 1 Sample Soluble Lind Dil Fac 1 Soluble D
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/2-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/3-A	20.5 SD Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added 497 Spike Added 250		547.9 MSD Result 548.0 LCS Result 242.3	MSD Qualifier Unit mg/Kg LCS Qualifier	Unit mg/Kg	D CI	D Pr ient	%Rec         106         Client S         repared         Sample         %Rec         97	2: Matrix S Prep %Rec. Limits 90 - 110 Cample ID: Prep Analy: 10/12/21 Cample ID: Lab C Prep %Rec. Limits 90 - 110 Lab Contro Prep	RPD         0         Method         Type: \$         2zed         13:31         ontrol \$         Type: \$         Ontrol \$         D         Samp	Soluble RPD Limit 20 Blank Soluble Dil Fac 1 Sample Soluble Dil Fac ble Dup Soluble
Chloride Lab Sample ID: 880-7069-A-10-F Mi Matrix: Solid Analysis Batch: 9303 Analyte Chloride Lab Sample ID: MB 880-9210/1-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCS 880-9210/2-A Matrix: Solid Analysis Batch: 9307 Analyte Chloride Lab Sample ID: LCSD 880-9210/3-A Matrix: Solid	20.5 SD Result 20.5	Samp Quali MB essult	ole fier MB Qualifier	497 Spike Added 497 Spike Added	<b>RL</b> 5.00	547.9 MSD Result 548.0 LCSD	MSD Qualifier Unit mg/Kg LCS Qualifier	Unit mg/Kg	D CI	D Pr ient	%Rec         106         Client S         repared         Sample         %Rec         97	D: Matrix S Prep %Rec. Limits 90 - 110 Cample ID: Prep Analyz 10/12/21 Prep %Rec. Limits 90 - 110 Lab Contro	RPD         0         Method         Type: \$         2zed         13:31         ontrol \$         Type: \$         Ontrol \$         D         Samp	Soluble RPD Limit 20 Blank Soluble Dil Fac 1 Sample Soluble Lind Dil Fac 1 Soluble D

Eurofins Xenco, Carlsbad

Client: WSP USA Inc.

Project/Site: Tiger CS

#### **QC Sample Results**

Job ID: 890-1395-1
SDG: 31403236.022.0129

#### Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: 880-7011-A	A-11-E MS							Client	Sample ID	: Matrix	Spike
Matrix: Solid									Prep	Type: So	oluble
Analysis Batch: 9307											
	Sample	Sample	Spike	MS	MS				%Rec.		
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Chloride	58.4	F1	495	339.1	F1	mg/Kg		57	90 - 110		
						0 0					
Matrix: Solid	A-11-F MSD					Cli	ent Sa	ample ID	): Matrix S Prep	pike Dup Type: So	
Matrix: Solid	A-11-F MSD Sample	Sample	Spike	MSD	MSD	Cli	ent Sa	ample ID			
Lab Sample ID: 880-7011-4 Matrix: Solid Analysis Batch: 9307 Analyte	Sample	Sample Qualifier	Spike Added		MSD Qualifier	Cli	ent Sa D	ample ID %Rec	Prep		oluble

Eurofins Xenco, Carlsbad
## **QC Association Summary**

Client: WSP USA Inc. Project/Site: Tiger CS

Job ID: 890-1395-1 SDG: 31403236.022.0129

## GC VOA

## Prep Batch: 8975

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1395-1	FS03	Total/NA	Solid	5035	
390-1395-2	FS04	Total/NA	Solid	5035	
MB 880-8975/5-A	Method Blank	Total/NA	Solid	5035	
CS 880-8975/1-A	Lab Control Sample	Total/NA	Solid	5035	
CSD 880-8975/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
390-1390-A-1-B MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	
390-1390-A-1-F MS	Matrix Spike	Total/NA	Solid	5035	

#### Lab Sample ID **Client Sample ID** Prep Type Matrix Method Prep Batch 890-1395-1 FS03 Total/NA 8021B Solid 8975 890-1395-2 FS04 Total/NA Solid 8021B 8975 MB 880-8975/5-A Method Blank Total/NA Solid 8021B 8975 LCS 880-8975/1-A Lab Control Sample Total/NA Solid 8021B 8975 LCSD 880-8975/2-A Lab Control Sample Dup Total/NA Solid 8021B 8975 890-1390-A-1-B MSD Matrix Spike Duplicate Total/NA Solid 8021B 8975 890-1390-A-1-F MS Total/NA Solid 8021B 8975 Matrix Spike

#### Analysis Batch: 9366

	Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
	890-1395-1	FS03	Total/NA	Solid	Total BTEX	
L	890-1395-2	FS04	Total/NA	Solid	Total BTEX	

## GC Semi VOA

#### Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1395-1	FS03	Total/NA	Solid	8015B NM	9312
890-1395-2	FS04	Total/NA	Solid	8015B NM	9312
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015B NM	9312
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9312

#### Prep Batch: 9312

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1395-1	FS03	Total/NA	Solid	8015NM Prep	
890-1395-2	FS04	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

#### Analysis Batch: 9387

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1395-1	FS03	Total/NA	Solid	8015 NM	
890-1395-2	FS04	Total/NA	Solid	8015 NM	

Eurofins Xenco, Carlsbad

Page 181 of 331

5

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

Method Blank

Matrix Spike

FS04

Method Blank

Matrix Spike

FS03

## **QC Association Summary**

Prep Type

Soluble

Soluble

Soluble

Soluble

Soluble

Soluble

Prep Type

Soluble

Soluble

Soluble

Soluble

Soluble

Soluble

Client: WSP USA Inc. Project/Site: Tiger CS

#### Leach Batch: 9210

Lab Sample ID

MB 880-9210/1-A

LCS 880-9210/2-A

LCSD 880-9210/3-A

880-7011-A-11-E MS

880-7011-A-11-F MSD

Leach Batch: 9281

Lab Sample ID

MB 880-9281/1-A

LCS 880-9281/2-A

LCSD 880-9281/3-A

880-7069-A-10-E MS

890-1395-2

890-1395-1

Prep Batch

Prep Batch

#### Job ID: 890-1395-1 SDG: 31403236.022.0129

Method

DI Leach

DI Leach

DI Leach

DI Leach

DI Leach

DI Leach

Method

DI Leach

DI Leach

DI Leach

DI Leach

DI Leach

DI Leach

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

## 880-7069-A-10-F MSD Analysis Batch: 9303

Lah Sa	mple ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	
890-13	•	FS04	Soluble	Solid	300.0	9281	
MB 880	)-9281/1-A	Method Blank	Soluble	Solid	300.0	9281	
LCS 88	80-9281/2-A	Lab Control Sample	Soluble	Solid	300.0	9281	
LCSD	380-9281/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9281	
880-70	69-A-10-E MS	Matrix Spike	Soluble	Solid	300.0	9281	
880-70	69-A-10-F MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9281	

#### Analysis Batch: 9307

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1395-1	FS03	Soluble	Solid	300.0	9210
MB 880-9210/1-A	Method Blank	Soluble	Solid	300.0	9210
LCS 880-9210/2-A	Lab Control Sample	Soluble	Solid	300.0	9210
LCSD 880-9210/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9210
880-7011-A-11-E MS	Matrix Spike	Soluble	Solid	300.0	9210
880-7011-A-11-F MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9210

Client: WSP USA Inc. Project/Site: Tiger CS

## Client Sample ID: FS03 Date Collected: 10/08/21 10:58

Date Received: 10/08/21 15:50

	Batch	Batch		Dilution	Batch	Prepared		
Ргер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8975	10/11/21 11:00	KL	XEN MID
Total/NA	Analysis	8021B		1	9324	10/12/21 21:37	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9366	10/13/21 08:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9387	10/13/21 15:09	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/13/21 03:41	AJ	XEN MID
Soluble	Leach	DI Leach			9210	10/11/21 12:29	СН	XEN MID
Soluble	Analysis	300.0		1	9307	10/12/21 16:47	СН	XEN MID

#### Client Sample ID: FS04 Date Collected: 10/08/21 11:18

Date Received: 10/08/21 15:50

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8975	10/11/21 11:00	KL	XEN MID
Total/NA	Analysis	8021B		1	9324	10/12/21 21:58	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9366	10/13/21 08:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9387	10/13/21 15:09	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/13/21 04:02	AJ	XEN MID
Soluble	Leach	DI Leach			9281	10/12/21 08:19	СН	XEN MID
Soluble	Analysis	300.0		1	9303	10/12/21 15:56	СН	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

SDG: 31403236.022.0129 Lab Sample ID: 890-1395-1

Job ID: 890-1395-1

Matrix: Solid

Lab Sample ID: 890-1395-2

		Accreditation/Co	ertification Summary		
Client: WSP USA Inc. Project/Site: Tiger CS				Job ID: 890-139 SDG: 31403236.022.01	
Laboratory: Eurofi					3
		v were covered under each acc			_
Authority		Program	Identification Number	Expiration Date	
Texas		NELAP	T104704400-21-22	06-30-22	-
The following analytes a	are included in this repor	t. but the laboratory is not certifi	ied by the governing authority. This list ma	y include analytes for which	5
the agency does not off		, , , ,		,	
Analysis Method	Prep Method	Matrix	Analyte		
8015 NM		Solid	Total TPH		
Total BTEX		Solid	Total BTEX		
					8
					9
					10
					13
					14

Eurofins Xenco, Carlsbad

.

## **Method Summary**

Client: WSP USA Inc. Project/Site: Tiger CS

Job ID: 890-1395-1 SDG: 31403236.022.0129

lethod	Method Description	Protocol	Laboratory
3021B	Volatile Organic Compounds (GC)	SW846	XEN MID
fotal BTEX	Total BTEX Calculation	TAL SOP	XEN MID
3015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
3015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
3015NM Prep	Microextraction	SW846	XEN MID
I Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### Protocol References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

## **Sample Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1395-1 SDG: 31403236.022.0129

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
890-1395-1	FS03	Solid	10/08/21 10:58	10/08/21 15:50	0 - 1.5
890-1395-2	FS04	Solid	10/08/21 11:18	10/08/21 15:50	0 - 1.5

Revised Date 051418 Rev 2018		6							5
		\$				V			3 /
		2	1850	10-9-2		Ino Gult		NON	MAGON 1
Date/Time	Received by: (Signature)	Relinquished by: (Signature)	Date/Time	Da	ure)	Received by: (Signature)	,	by: (Signature	Relinquished by: (Signature
	are due to circumstances beyond the control enforced unless previously negotiated.	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Aerico, its animates and subcum accurs, it assigns summary termine and commons of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the contro of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.	expenses incurred t Xenco, but not ana	y losses or o submitted to	urcnase order from sponsibility for an 5 for each sample s	npies constitutes a valid p nd shall not assume any ri i project and a charge of S	ilinquishment of sam the cost of samples ar ill be applied to each	is document and re be liable only for th charge of \$75.00 w	Notice: Signature of th of service. Xenco will of Xenco. A minimum
5.1 / 7470 /		Sb As Ba Be Cd Cr Co Cu Pb Mn Mo Ni Se /	As Ba Be C	CRA Sb	TCLP / SPLP 6010: 8RCRA	zed TCLP/SP	Circle Method(s) and Metal(s) to be analyzed	od(s) and Meta	Circle Metho
Sr TI Sn U V Zn	Pb Mg Mn Mo Ni K Se Ag SiO2 Na S	Cd Ca Cr Co Cu Fe	As Ba Be B	1 Al Sb	13PPM Texas 11	8RCRA 13F	200.8/6020:		Total 200 7 / 6010
				_					
				-					
				-					
Composite			x x	1 ×	0-1.5'			FS04	Fo
Composite			x x	1 ×	0-1.5'	10/8/2021 10:58	S 10	FS03	FQ
Sample Comments			BTEX ( Chloric	Numb	Depth	Date Time Sampled Sampled	Matrix S	Sample Identification	Sample Id
lab, if received by 4:30pm	_  		EPA	_		Total Containers:	No		Sample Custody Seals:
TAT starts the day recevied by the		890-1395 Chain of Custody	0=80		2.0-	18.1	ş	Ye	Cooler Custody Seals:
			-	itain	L)	MM Q	No	(Yes	Received Intact:
				ers	k	Ther		2.4	Temperature /°C):
					es No	Ves No Wet Ice:	Temp Blank:	EIPT	SAMPLE RECEIPT
NAPP2123231376		_			Due Date:	Due	Iner	Payton Benner	Sampler's Name:
					Rush:2DAV	Rust			P.O. Number:
CC:2027031001	CC				ine []	129 Routine	31403236.022.0129		Project Number:
Work Order Notes		ANALYSIS REQUEST			Turn Around	1		Tiger CS	Project Name:
Other:	Deliverables: EDD ADaPT	payton.benner@wsp.com Delive		@wsp.c	kalei.jennings@wsp.com,	Email:	03	817-683-2503	Phone:
	Reporting:Level IIT/UST		Carlsbad, NM 88220		City, State ZIP:		xas 79705	Midland, Texas 79705	City, State ZIP:
	State of Project:		3104 E Green Strret		Address:	, Unit 222	3300 North A Street Bldg 1, Unit 222	3300 North	Address:
ds []PC {]perfund []	Program: UST/PST _RP _rownfields	Progr	0	ie: XTO	Company Name:			WSP USA	Company Name:
nments	Work Order Comments		Adrian Baker	t) Adr	Bill to: (if different)		ngs	Kalei Jennings	Project Manager:
<sup>2</sup> age1 of1	www.xenco.com	Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (813-620-2000)	5-0900) Atlanta,G,	AZ (480-35)	-7550) Phoenix,#	Hobbs,NM (575-392	L Z T L		
		Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-3334 Midland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)794-1296	TX (214) 902-0300 so,TX (915)585-34	00 Dallas, <sup>1</sup> 40) EL Pa:	ı,TX (281) 240-42 d,TX (432-704-54	Houstor Midlan		XINZO	
	Work Order No:	ustody	Chain of Custody	Cha					



5

## Received by OCD: 11/5/2021 12:00:19 PM

Tuse N Canal St. Carlsbad, NM 88220 Phone: 575-988-3199 Fax 575-988-3199 Client Information (Sub Contract Lab)	Sampler C	Chain of Custody Record	f Cust	Lab PM Krame	r Record						Carrier Tracking No(s)	acking	No(s)			COC No 890-456 1	COC Nº 890-456 1	America
Company Eurofins Xenco				7 >	Accreditations Required (See NELAP - Louisiana, NE	s Require ouisian	ed (See	LAP	e note): ELAP - Texas							<u>م</u> ب	Job #: 890-1395-1	
Address 1211 W Florida Ave	Due Date Requested 10/13/2021	a						Anal	Analysis Requested	lequ	este	°					Preservation Codes	· I
City Midland	TAT Requested (days):	ys):										-1'				<u> </u>	A - HCL B NaOH	M Hexane
State Zip. TX 79701					трн											<u>Mana sin</u>	C - Zn Acetate D Nitric Acid E NaHSO4	O AsNaO2 P Na2O4S Q - Na2SO3
Phone: 432-704-5440(Tel)	PO#						6	·										R Na2S2O3 S - H2SO4
Email	WO #:				0)												H - ASCOIDIC ACIO	I ISP Dodecahydrate U Acetone
Project Name: Tiger CS	Project #: 890000014			1944	s or N										10000 10000	liners	k edta L eda	W pH 4-5 Z other (specify)
Site.	SSOW#				D (Ye										-Helitzenwards	114 03 05 05	Other <sup>.</sup>	
			_		S/MSD										de se se terte	0.000		
		Sample	Sample Type	Matrix (W=water S=solid,	form MS/	MOD_Cal	ORGFM_: B/5035FP	LBTEX_G							Carterian Cares, units	l Numbe		
Sample Identification - Client ID (Lab ID)	Sample Date			E	Pe		8	8								Tot	Special In	Special Instructions/Note:
	X	Constant Constant	Preservation Code:	on Code:	X				10.00	Confirmed and				Saint		Х		
FS03 (890-1395-1)	10/8/21	10 58 Mountain		Solid	×	×	××	×								<u>نې</u>		
FS04 (890-1395-2)	10/8/21	11 18 Mountain		Solid	×	×	××	×										
												-				Ľź		
			:															
																Que 2		
														_		<u>.</u>		
																pll" Nordani		
International secondary excremance as support to charge currents activities the ownership or memod analyte & accreditation compliance upon out subcontract laborat maintain accreditation in the State of Crigin listed above for analysis/itest/matrix being analyzed the samples must be shiped back to the Eurofins Xenco LLC laboratory or other attention immediately. If all requested accreditations are current to date, return the signed Chain of Custody attesting to said complicance to Eurofins Xenco LLC.	the signed Chain of Cus	mples must be s tody attesting to	te & accreditat shipped back to said complica	ion compliance the Eurofins X nce to Eurofins	upon out su enco LLC la Xenco LLC.	bcontrac boratory	t labon or othe	r instru	This sa ctions w	mple si ill be pr	nipmen ovided	t is fon Any o	/arded	to ac	chain- credita	of-cu	tories. This sample shipment is forwarded under chain-of-custody if the laboratory does not currently instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC	ught to Eurofi
Possible Hazard Identification					Sample Disposal ( A fee	Disp	sal (	A fee	may		esse	difs	mpl	is an	⊔ret	ine	may be assessed if samples are retained longer than 1 month)	month)
Deliverable Requested I, II III IV Other (specify)	Primary Deliverable Rank. 2	ble Rank. 2			Special Instructions/QC Requirements.	al Instructions/QC	tions	QC T	equire	ments	ents.	27.7	Ś			1011		CUDUDIAL
Empty Kit Relinguished by		Date			Time		2	~			Me	thod o	Method of Shipment:	ent:				
Reinquished by Use Curry 15.11.2	Date/Times/2/A			Con Mar	Rede	Ked by	$( \ \ )$	T					Date	Date/Time:				Company
	Date/Time:		0	Company		Received <sup>/</sup> by	d						Date	Date/Time:				Company
Relinquished by	Date/Time		0	Company	Rec	Received by							Date	Date/Time				Company
Custody Seals Intact. Custody Seal No ∆ Yes ∆ No					Co	Cooler Temperature	erature	(s) C	and Other Remarks.	r Rem	arks.		F					F
					╞													

Is the Field Sampler's name present on COC?

## Login Sample Receipt Checklist

True

Client: WSP USA Inc.

Login Number: 1395 List Number: 1 Creator: Clifton, Cloe

Question Answer The cooler's custody seal, if present, is intact. True Sample custody seals, if present, are intact. True The cooler or samples do not appear to have been compromised or True tampered with. Samples were received on ice. True True Cooler Temperature is acceptable. Cooler Temperature is recorded. True COC is present. True COC is filled out in ink and legible. True COC is filled out with all pertinent information. True

There are no discrepancies between the containers received and the COC. True Samples are received within Holding Time (excluding tests with immediate True HTs) Sample containers have legible labels. True Containers are not broken or leaking. True Sample collection date/times are provided. True Appropriate sample containers are used. True Sample bottles are completely filled. True Sample Preservation Verified. N/A There is sufficient vol. for all requested analyses, incl. any requested True MS/MSDs Containers requiring zero headspace have no headspace or bubble is N/A <6mm (1/4").

Job Number: 890-1395-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Carlsbad

Comment

Eurofins Xenco, Carlsbad Released to Imaging: 3/14/2022 1:38:16 PM

## Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1395 List Number: 2 Creator: Lowe, Katie

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	True	

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

14

Job Number: 890-1395-1 SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Midland List Creation: 10/12/21 11:43 AM Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

# Environment Testing America

## **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

## Laboratory Job ID: 890-1394-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS

## For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/13/2021 4:13:59 PM

Jessica Kramer, Project Manager (432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access Have a Question? Ask-The Expert

www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Visit us at:

Page 192 of 331

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	6
QC Sample Results	7
QC Association Summary	11
Lab Chronicle	13
Certification Summary	14
Method Summary	15
Sample Summary	16
Chain of Custody	17
Receipt Checklists	19

Client: WSP USA Inc. Project/Site: Tiger CS Page 193 of 331

Job ID: 890-1394-1
SDG: 31403236.022.0129

## Qualifiers

Qualifiers		3
GC VOA		
Qualifier	Qualifier Description Indicates the analyte was analyzed for but not detected.	
-	Indicates the analyte was analyzed for but not detected.	
GC Semi VOA		5
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	
HPLC/IC		
Qualifier	Qualifier Description	8
F1	MS and/or MSD recovery exceeds control limits.	
U	Indicates the analyte was analyzed for but not detected.	9
Glossary		
Abbreviation	These commonly used abbreviations may or may not be present in this report.	
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis	
%R	Percent Recovery	
CFL	Contains Free Liquid	
CFU	Colony Forming Unit	
CNF	Contains No Free Liquid	12
DER	Duplicate Error Ratio (normalized absolute difference)	13
Dil Fac	Dilution Factor	
DL	Detection Limit (DoD/DOE)	
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample	
DLC	Decision Level Concentration (Radiochemistry)	
EDL	Estimated Detection Limit (Dioxin)	
LOD	Limit of Detection (DoD/DOE)	
LOQ	Limit of Quantitation (DoD/DOE)	

- MCL
   EPA recommended "Maximum Contaminant Level"

   MDA
   Minimum Detectable Activity (Radiochemistry)
- MDC Minimum Detectable Concentration (Radiochemistry)
- MDLMethod Detection LimitMLMinimum Level (Dioxin)MPNMost Probable NumberMQLMethod Quantitation Limit
- NC
   Not Calculated

   ND
   Not Detected at the reporting limit (or MDL or EDL if shown)

   NEG
   Negative / Absent
- POS Positive / Present PQL Practical Quantitation Limit
- PRES
   Presumptive

   QC
   Quality Control

   RER
   Relative Error Ratio (Radiochemistry)

   RL
   Reporting Limit or Requested Limit (Radiochemistry)
- RL
   Reporting Limit or Requested Limit (Radiochemistry)

   RPD
   Relative Percent Difference, a measure of the relative difference between two points
- TEF Toxicity Equivalent Factor (Dioxin)
- TEQ Toxicity Equivalent Quotient (Dioxin)
- TNTC Too Numerous To Count

## Job ID: 890-1394-1 SDG: 31403236.022.0129

#### Job ID: 890-1394-1

Client: WSP USA Inc.

Project/Site: Tiger CS

#### Laboratory: Eurofins Xenco, Carlsbad

#### Narrative

Job Narrative 890-1394-1

#### Receipt

The sample was received on 10/8/2021 3:50 PM. Unless otherwise noted below, the sample arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

#### GC VOA

Method 8021B: Surrogate recovery for the following sample was outside control limits: (890-1382-A-1-I). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

Method 300\_ORGFM\_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-9210 and analytical batch 880-9307 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

## **Client Sample Results**

Job ID: 890-1394-1 SDG: 31403236.022.0129

## Client Sample ID: SS01

Date Collected: 10/08/21 12:09 Date Received: 10/08/21 15:50

Sample Depth: 0.5

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab Sample ID: 890-1394-1

Matrix: Solid

Method: 8021B - Volatile Organic	Compounds (	(GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 21:06	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 21:06	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 21:06	1
m-Xylene & p-Xylene	<0.00401	U	0.00401	mg/Kg		10/11/21 16:18	10/12/21 21:06	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 21:06	1
Xylenes, Total	<0.00401	U	0.00401	mg/Kg		10/11/21 16:18	10/12/21 21:06	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	128		70 - 130			10/11/21 16:18	10/12/21 21:06	1
1,4-Difluorobenzene (Surr)	79		70 - 130			10/11/21 16:18	10/12/21 21:06	1
Method: Total BTEX - Total BTEX	Calculation							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00401	U	0.00401	mg/Kg			10/12/21 10:57	1
Method: 8015 NM - Diesel Range	Organics (DR	O) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total TPH	<50.0	U	50.0	mg/Kg			10/11/21 10:08	1
Method: 8015B NM - Diesel Rang	je Organics (D	RO) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/13/21 03:20	1
Diesel Range Organics (Over C10-C28)	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/13/21 03:20	1
Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/13/21 03:20	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	103		70 - 130			10/12/21 14:04	10/13/21 03:20	1
o-Terphenyl	119		70 - 130			10/12/21 14:04	10/13/21 03:20	1
Method: 300.0 - Anions, Ion Chro	omatography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	12.2		5.00	mg/Kg			10/12/21 16:41	1

10/13/2021

Prep Type: Total/NA

## Job ID: 890-1394-1 SDG: 31403236.022.0129

## Method: 8021B - Volatile Organic Compounds (GC)

#### Matrix: Solid

				Percent Surrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1		÷.
.ab Sample ID	Client Sample ID	(70-130)	(70-130)		
390-1382-A-1-G MS	Matrix Spike	119	77		÷
390-1382-A-1-H MSD	Matrix Spike Duplicate	118	88		
390-1394-1	SS01	128	79		2
_CS 880-8942/1-A	Lab Control Sample	112	88		
_CSD 880-8942/2-A	Lab Control Sample Dup	116	76		
MB 880-8942/5-B	Method Blank	112	79		
Surrogate Legend					ŝ
BFB = 4-Bromofluorobe	nzene (Surr)				

DFBZ = 1,4-Difluorobenzene (Surr)

## Method: 8015B NM - Diesel Range Organics (DRO) (GC)

#### Matrix: Solid Prep Type: Total/NA Percent Surrogate Recovery (Acceptance Limits) 1CO1 OTPH1 Lab Sample ID **Client Sample ID** (70-130) (70-130) 890-1382-A-1-K MS Matrix Spike 118 115 890-1382-A-1-L MSD Matrix Spike Duplicate 118 113 890-1394-1 SS01 119 103 LCS 880-9312/2-A Lab Control Sample 92 90 LCSD 880-9312/3-A Lab Control Sample Dup 101 101 MB 880-9312/1-A Method Blank 115 133 S1+

#### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Eurofins Xenco, Carlsbad

Page 196 of 331

## **QC Sample Results**

Job ID: 890-1394-1 SDG: 31403236.022.0129

Project/Site: Tiger CS

Client: WSP USA Inc.

## Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-894	IZ/5-B									Client Sa	Imple ID: N		
Matrix: Solid											Prep Ty		
Analysis Batch: 9282											Prep	Batch	1: 894
Analuta	Ba	MB MB sult Qua	lifior	RL		Unit		D	D.,	operad	Analyza	d	Dil Fa
Analyte Benzene		200 U	linter	0.00200		mg/Kg		<u> </u>		repared 1/21 16:18	Analyze		DIIFa
Toluene		200 U		0.00200		mg/Kg				1/21 16:18	10/12/21 1		
Ethylbenzene		200 U		0.00200		mg/Kg				1/21 16:18	10/12/21 1		
m-Xylene & p-Xylene		400 U		0.00200		mg/Kg				1/21 16:18	10/12/21 1		
o-Xylene		200 U		0.00400		mg/Kg				1/21 16:18	10/12/21 1		
Xylenes, Total		400 U		0.00200		mg/Kg				1/21 16:18	10/12/21 1		
	40.00	400 0		0.00400		ing/itg	,		10/1	1/21 10.10	10/12/21 1	0.02	
		MB MB											
Surrogate	%Reco	<u> </u>	lifier	Limits				-		repared	Analyze		Dil F
4-Bromofluorobenzene (Surr)		112		70 - 130						1/21 16:18	10/12/21 1		
1,4-Difluorobenzene (Surr)		79		70 - 130					10/11	1/21 16:18	10/12/21 1	3:02	
Lab Sample ID: LCS 880-89	42/4 A							CI	lont	Sampla		ntrol S	
Matrix: Solid	42/1-A								ient	Sample	ID: Lab Co Prep Ty		
Analysis Batch: 9282												Batch	
Analysis Batch. 9202				Spike	105	LCS					%Rec.	Datci	1. 034
Analyte				Added		Qualifier	Unit		D	%Rec	Limits		
Benzene				0.100	0.09008	Quaimer	mg/Kg		<u> </u>	90	70 - 130		
Toluene				0.100	0.09025		mg/Kg			90	70 - 130 70 - 130		
Ethylbenzene				0.100	0.09403		mg/Kg			90 94	70 - 130 70 - 130		
				0.200	0.1959		mg/Kg			98	70 - 130		
							my/rxy			90	10 - 130		
m-Xylene & p-Xylene							ma/Ka			97	70 130		
o-Xylene				0.100	0.09732		mg/Kg			97	70 - 130		
	LCS	LCS					mg/Kg			97	70 - 130		
o-Xylene Surrogate	%Recovery	LCS Qualifier		0.100 <i>Limits</i>			mg/Kg			97	70 - 130		
o-Xylene Surrogate 4-Bromofluorobenzene (Surr)	<b>%Recovery</b> 112			0.100 Limits 70 - 130			mg/Kg			97	70 - 130		
o-Xylene Surrogate	%Recovery			0.100 <i>Limits</i>			mg/Kg			97	70 - 130		
o-Xylene <b>Surrogate</b> 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	%Recovery 112 88			0.100 Limits 70 - 130				iont (	Sam			Samo	
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8	%Recovery 112 88			0.100 Limits 70 - 130				ent S	Sam		ab Control		
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid	%Recovery 112 88			0.100 Limits 70 - 130				ent (	Sam		ab Control Prep Ty	/pe: To	otal/N
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8	%Recovery 112 88			0.100 <i>Limits</i> 70 - 130 70 - 130	0.09732	LCSD		ent (	Sam		ab Control Prep Ty Prep		otal/N 1: 894
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282	%Recovery 112 88			0.100 <u>Limits</u> 70 - 130 70 - 130 Spike	0.09732 LCSD	LCSD	Cli	ent (		ple ID: L	ab Control Prep Ty Prep %Rec.	/pe: To Batch	otal/N 1: 894 RI
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte	%Recovery 112 88			0.100 Limits 70 - 130 70 - 130 Spike Added	0.09732 LCSD Result	LCSD Qualifier	Cli <u>Unit</u>	ent (	Sam	ple ID: La	ab Control Prep Ty Prep %Rec. Limits	RPD	otal/N n: 894 Ri Lir
o-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene	%Recovery 112 88			0.100 Limits 70 - 130 70 - 130 Spike Added 0.100	0.09732 LCSD Result 0.08283		Cli <u>Unit</u> mg/Kg	ent (		<b>ple ID: L</b> <u>%Rec</u> 83	ab Control Prep Ty Prep %Rec. Limits 70 - 130	Pe: To Batch RPD 8	otal/N n: 894 Ri Lir
o-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene	%Recovery 112 88			0.100 <i>Limits</i> 70 - 130 70 - 130 <b>Spike</b> Added 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609		Cli unit mg/Kg mg/Kg	ient S		<b>ple ID: L</b> <b>%Rec</b> 83 86	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130	Pe: To Batch RPD 8 5	otal/N n: 894 Ri Lir
o-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene	%Recovery 112 88			0.100 Limits 70 - 130 70 - 130 70 - 130 8 Spike Added 0.100 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041		Cli <u>Unit</u> mg/Kg mg/Kg mg/Kg	ient S		<b>ple ID: L</b> a % <b>Rec</b> 83 86 90	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	rpe: To Batch RPD 8 5 4	n: 894 RI
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene	%Recovery 112 88			0.100 <i>Limits</i> 70 - 130 70 - 130 <b>Spike</b> <b>Added</b> 0.100 0.100 0.100 0.200	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		Cli mg/Kg mg/Kg mg/Kg mg/Kg	ient (		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	RPD 8 5 4 3	otal/N n: 894 Rf Lin
o-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene	%Recovery 112 88			0.100 Limits 70 - 130 70 - 130 70 - 130 8 Spike Added 0.100 0.100 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041		Cli <u>Unit</u> mg/Kg mg/Kg mg/Kg	ent (		<b>ple ID: L</b> a % <b>Rec</b> 83 86 90	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	rpe: To Batch RPD 8 5 4	otal/N n: 894 Rf Lin
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene	%Recovery 112 88	Qualifier		0.100 <i>Limits</i> 70 - 130 70 - 130 <b>Spike</b> <b>Added</b> 0.100 0.100 0.100 0.200	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent \$		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	RPD 8 5 4 3	otal/N n: 894 RI Lir
o-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate	<u>%Recovery</u> 112 88 3942/2-A	Qualifier		0.100 <i>Limits</i> 70 - 130 70 - 130 <b>Spike</b> <b>Added</b> 0.100 0.100 0.100 0.200	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent (		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	RPD 8 5 4 3	otal/N n: 894 RI Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr)	<u>%Recovery</u> 112 88 3942/2-A	<u>Qualifier</u>		0.100 Limits 70 - 130 70 - 130 70 - 130 8 Spike Added 0.100 0.100 0.100 0.200 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent (		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	RPD 8 5 4 3	otal/N n: 894 RI Lir
o-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate	<u>%Recovery</u> 112 88 3942/2-A 	<u>Qualifier</u>		0.100  Limits 70 - 130 70 - 130 70 - 130  Spike Added 0.100 0.100 0.100 0.200 0.100 Limits	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		Cli mg/Kg mg/Kg mg/Kg mg/Kg	ient \$		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	RPD 8 5 4 3	otal/N n: 894 RI Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr)	<u>%Recovery</u> 112 88 3942/2-A <u>LCSD</u> %Recovery 116 76	<u>Qualifier</u>		0.100  Limits 70 - 130 70 - 130 70 - 130  Spike Added 0.100 0.100 0.100 0.200 0.100 0.100  Limits 70 - 130	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent \$		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95 96	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	vpe: To Batch RPD 8 5 4 3 2	otal/N n: 894 RF Lin
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A-	<u>%Recovery</u> 112 88 3942/2-A <u>LCSD</u> %Recovery 116 76	<u>Qualifier</u>		0.100  Limits 70 - 130 70 - 130 70 - 130  Spike Added 0.100 0.100 0.100 0.200 0.100 0.100  Limits 70 - 130	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent \$		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95 96	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	Appe: To Batch RPD 8 5 4 3 2 2 Matrix	n: 894 RI Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A-Matrix: Solid	<u>%Recovery</u> 112 88 3942/2-A <u>LCSD</u> %Recovery 116 76	<u>Qualifier</u>		0.100  Limits 70 - 130 70 - 130 70 - 130  Spike Added 0.100 0.100 0.100 0.200 0.100 0.100  Limits 70 - 130	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906		Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent (		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95 96	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	RPD 8 5 4 3 2 Matrix ype: To	tal/N n: 894 Rl Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A-	<u>%Recovery</u> 112 88 3942/2-A <u>LCSD</u> %Recovery 116 76 -1-G MS	Qualifier LCSD Qualifier		0.100  Limits 70 - 130 70 - 130 70 - 130  Spike Added 0.100 0.100 0.100 0.200 0.100 0.100  Limits 70 - 130 70 - 130	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906 0.09563	Qualifier	Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent (		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95 96	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	Appe: To Batch RPD 8 5 4 3 2 2 Matrix	tal/N n: 894 RI Lir
o-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofiluorobenzene (Surr) 1,4-Difluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A-Matrix: Solid Analysis Batch: 9282	<u>%Recovery</u> 112 88 3942/2-A <u>LCSD</u> %Recovery 116 76 -1-G MS Sample	Qualifier LCSD Qualifier Sample		0.100  Limits 70 - 130 70 - 130 70 - 130  Spike Added 0.100	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906 0.09563	Qualifier	Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent (	<u>D</u>	ple ID: La %Rec 83 86 90 95 96 95 96	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130	RPD 8 5 4 3 2 Matrix ype: To	tal/N n: 894 RI Lir
o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: LCSD 880-8 Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene m-Xylene & p-Xylene o-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A-Matrix: Solid	<u>%Recovery</u> 112 88 3942/2-A <u>LCSD</u> %Recovery 116 76 -1-G MS Sample	Qualifier LCSD Qualifier Sample Qualifier		0.100  Limits 70 - 130 70 - 130 70 - 130  Spike Added 0.100 0.100 0.100 0.200 0.100 0.100  Limits 70 - 130 70 - 130	0.09732 LCSD Result 0.08283 0.08609 0.09041 0.1906 0.09563	Qualifier	Cli mg/Kg mg/Kg mg/Kg mg/Kg	ent (		<b>ple ID: L</b> <b>%Rec</b> 83 86 90 95 96	ab Control Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130 70 - 130	RPD 8 5 4 3 2 Matrix ype: To	s Spil

Eurofins Xenco, Carlsbad

Client: WSP USA Inc.

Project/Site: Tiger CS

## Job ID: 890-1394-1 SDG: 31403236.022.0129

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 890-1382-A-1-G M Matrix: Solid	IS										Client S	Sample ID: M Prep Typ		
Analysis Batch: 9282												Prep		
Analysis Datch. 5202	Sample	Sam	nlo	Spike	,	MS.	MS					%Rec.	Jaton	. 034
Analyte	Result		•	Added			Qualifier	Unit		D	%Rec	Limits		
	0.0114	Qua		0.0990	0.10		Quaimer			_	90			
Ethylbenzene								mg/Kg				70 - 130		
m-Xylene & p-Xylene	0.00511			0.198	0.21			mg/Kg			104	70 - 130		
o-Xylene	0.0275			0.0990	0.10	61		mg/Kg			79	70 <sub>-</sub> 130		
	MS	мs												
Surrogate	%Recovery	Qua	lifier	Limits										
4-Bromofluorobenzene (Surr)	119			70 - 130										
1,4-Difluorobenzene (Surr)	77			70 - 130										
,														
_ab Sample ID: 890-1382-A-1-H N	ISD								Clie	nt Sa	ample ID:	Matrix Spik	e Dur	olica
Aatrix: Solid												Prep Ty		
Analysis Batch: 9282												Prep		
	Sample	Sam	ple	Spike	M	SD	MSD					%Rec.		R
Analyte	Result		•	Added			Qualifier	Unit		D	%Rec	Limits	RPD	Lir
lenzene	<0.00199			0.0992	0.095			mg/Kg		_		70 - 130	7	
oluene	< 0.00199			0.0992	0.095						95 94	70 - 130 70 - 130	, 1	
	<0.00199 0.0114	0		0.0992	0.094			mg/Kg mg/Kg			94 89	70 <sub>-</sub> 130 70 <sub>-</sub> 130	0	
thylbenzene														
n-Xylene & p-Xylene	0.00511			0.198	0.20			mg/Kg			102	70 <sub>-</sub> 130	2	
-Xylene	0.0275			0.0992	0.10	47		mg/Kg			78	70 <sub>-</sub> 130	1	
	MSD	MSD	)											
Surrogate	%Recovery	Qua	lifier	Limits										
-Bromofluorobenzene (Surr)	118			70 - 130										
,4-Difluorobenzene (Surr)	88			70 - 130										
ethod: 8015B NM - Diesel F	Range Or	gar	nics (DR	(GC)										
_ab Sample ID: MB 880-9312/1-A											Client Sa	mple ID: Me	thod	Bla
Matrix: Solid												Prep Ty	e: To	tal/N
Analysis Batch: 9261												Prep		
		мв	МВ											
Analyte	R	esult	Qualifier		RL		Unit		D	Р	repared	Analyzed		Dil F
Basoline Range Organics		50.0	U		50.0		mg/K		_		2/21 14:04	10/12/21 20:	01 -	
GRO)-C6-C10		20.0	-		- • • •		mgn	5						
Diesel Range Organics (Over	<	50.0	U		50.0		mg/K	g		10/1	2/21 14:04	10/12/21 20:	01	
C10-C28)							5	-						
Oll Range Organics (Over C28-C36)	<	50.0	U		50.0		mg/K	g		10/1	2/21 14:04	10/12/21 20:	01	
	· · -		MB							_	_			
Surrogate	%Reco		Qualifier	Limit							repared	Analyzed		Dil F
-Chlorooctane		115		70 - 1							2/21 14:04	10/12/21 20		
-Terphenyl		133	S1+	70 - 1	30					10/1	2/21 14:04	10/12/21 20.	01	
									_					
ab Sample ID: LCS 880-9312/2-4	4								C	lient	Sample	ID: Lab Con		
Aatrix: Solid												Prep Typ		
Analysis Batch: 9261												Prep	Batch	: 93
				Spike	L	cs	LCS					%Rec.		
nalyte				Added			Qualifier	Unit		D	%Rec	Limits		
Basoline Range Organics				1000	11	02		mg/Kg			110	70 - 130		
GRO)-C6-C10														
Diesel Range Organics (Over				1000	97	2 2		ma/Ka			97	70 130		

97

70 - 130

Diesel Range Organics (Over

C10-C28)

973.2

mg/Kg

## **QC Sample Results**

Page 199 of 331

Job ID: 890-1394-1

SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger CS

## Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: LCS 880-93	12/2-A						Client	Sample	ID: Lab Co		
Matrix: Solid										ype: Tot	
Analysis Batch: 9261									Pre	p Batch:	9312
	LCS	LCS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	92		70 - 130								
o-Terphenyl	90		70 - 130								
-											
Lab Sample ID: LCSD 880-9	312/3-A					Clier	nt Sam	ple ID:	Lab Contro	I Sample	e Dup
Matrix: Solid									Prep 1	ype: Tot	al/NA
Analysis Batch: 9261									Pre	p Batch:	9312
			Spike	LCSD	LCSD				%Rec.		RPD
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics			1000	1032		mg/Kg		103	70 - 130	7	20
(GRO)-C6-C10											
Diesel Range Organics (Over			1000	984.4		mg/Kg		98	70 - 130	1	20
C10-C28)											
	LCSD	LCSD									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane			70 - 130								
o-Terphenyl	101		70 - 130								
Lab Sample ID: 890-1382-A	-1-K MS							Client	Sample ID	: Matrix	Spike
Matrix: Solid										ype: Tot	
Analysis Batch: 9261										p Batch:	
· ····· <b>,</b> ··· · ···· · ····	Sample	Sample	Spike	MS	MS				%Rec.		
Analyte	•	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Gasoline Range Organics	<49.9		997	1314		mg/Kg		132	70 - 130		
(GRO)-C6-C10						5 5					
Diesel Range Organics (Over	124		997	1290		mg/Kg		117	70 - 130		
C10-C28)											
	MS	MS									
Surrogate	%Recovery		Limits								
1-Chlorooctane		Quanner	70 - 130								
o-Terphenyl	115		70 - 130 70 - 130								
	115		70 - 750								
Lab Sample ID: 890-1382-A	-1-L MSD					CI	ient Sa	ample IF	): Matrix Sp	nike Dun	licate
Matrix: Solid										ype: Tot	
Analysis Batch: 9261										p Batch:	
Analysis Daten. 3201	Sample	Sample	Spike	MSD	MSD				%Rec.	p Daten.	RPD
Analyte	•	Qualifier	Added		Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics			1000	1419		mg/Kg		142	70 - 130	8	20
(GRO)-C6-C10	~49.9	011	1000	1419	11	myrky		142	10 - 130	0	20
Diesel Range Organics (Over	124		1000	1297		mg/Kg		117	70 <sub>-</sub> 130	1	20
C10-C28)						5.5				-	_0
,											
•		MSD									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	118		70 - 130								
o-Terphenyl	113		70 - 130								

## **QC Sample Results**

Job ID: 890-1394-1
SDG: 31403236.022.0129

Project/Site: Tiger CS
Method: 300.0 - Anions, Ion Chromatography

Client: WSP USA Inc.

Lab Sample ID: MB 880-9210/1-A Matrix: Solid											Client S	ample ID: I Prep	Method Type: So	
Analysis Batch: 9307		мв	мр											
Analyte	Ba		мв Qualifier		RL		Unit		D	р.	repared	Analyz	ad	Dil Fac
Chloride	-	5.00			5.00		0mit mg/k	ία	<u> </u>	FI	epareu			1
-							0	0						
Lab Sample ID: LCS 880-9210/2-A									Cli	ient	Sample	ID: Lab Co	ontrol Sa	ample
Matrix: Solid												Prep	Type: So	oluble
Analysis Batch: 9307														
				Spike		LCS	LCS					%Rec.		
Analyte				Added			Qualifier	Unit		D	%Rec	Limits		
Chloride				250		242.3		mg/Kg			97	90 - 110		
Lab Sample ID: LCSD 880-9210/3-A								CI	ient S	Sam	ple ID: I	Lab Contro	l Sampl	e Dup
Matrix: Solid													Type: So	
Analysis Batch: 9307													<i>.</i>	
				Spike		LCSD	LCSD					%Rec.		RPD
Analyte				Added		Result	Qualifier	Unit		D	%Rec	Limits	RPD	Limit
Chloride				250		243.5		mg/Kg		_	97	90 - 110	0	20
- Lab Sample ID: 880-7011-A-11-E M	s										Client	Sample ID:	Matrix	Spike
Matrix: Solid											•		Type: So	
Analysis Batch: 9307													.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
	Sample	Samp	le	Spike		MS	MS					%Rec.		
-	Jailiple						o	11		D	%Rec	Limits		
	Result		fier	Added		Result	Qualifier	Unit						
Analyte		Quali	fier	Added 495		<b>Result</b> 339.1		mg/Kg		<u> </u>	57	90 - 110		
Analyte Chloride	Result 58.4	Quali	fier					mg/Kg	Clion		57	90 - 110		licato
Analyte Chloride Lab Sample ID: 880-7011-A-11-F MS	Result 58.4	Quali	fier					mg/Kg	Clien		57	90 - 110 <b>): Matrix Sp</b>		
Analyte Chloride Lab Sample ID: 880-7011-A-11-F MS Matrix: Solid	Result 58.4	Quali	fier					mg/Kg	Clien		57	90 - 110 <b>): Matrix Sp</b>	oike Dup Type: Se	
Analyte Chloride Lab Sample ID: 880-7011-A-11-F MS	Result 58.4	Qualif F1		495		339.1	F1	mg/Kg	Clien		57	90 - 110 9: Matrix Sp Prep		oluble
Analyte Chloride Lab Sample ID: 880-7011-A-11-F MS Matrix: Solid	Result 58.4	Qualif F1	le			339.1 MSD	F1	mg/Kg	Clien		57	90 - 110 <b>): Matrix Sp</b>		

Eurofins Xenco, Carlsbad

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

**Client Sample ID** 

SS01

Method Blank

Matrix Spike

SS01

Method Blank

Matrix Spike

SS01

## **QC** Association Summary

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Prep Type

Total/NA

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

Matrix

Solid

Client: WSP USA Inc. Project/Site: Tiger CS

Prep Batch: 8942 Lab Sample ID

MB 880-8942/5-B

LCS 880-8942/1-A

LCSD 880-8942/2-A

890-1382-A-1-G MS

890-1382-A-1-H MSD

Lab Sample ID

MB 880-8942/5-B

LCS 880-8942/1-A

LCSD 880-8942/2-A

890-1382-A-1-G MS

890-1382-A-1-H MSD

Analysis Batch: 9297

890-1394-1

Analysis Batch: 9282

**GC VOA** 

890-1394-1

Prep Batch

Prep Batch

8942

8942

8942

8942

8942

8942

Prep Batch

## Job ID: 890-1394-1 SDG: 31403236.022.0129

Method

5035

5035

5035

5035

5035

5035

Method

8021B

8021B

8021B

8021B

8021B

8021B

Method

Total BTEX

GC Semi VOA

Lab Sample ID

890-1394-1

#### Analysis Batch: 9187

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1394-1	SS01	Total/NA	Solid	8015 NM	

#### Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1394-1	SS01	Total/NA	Solid	8015B NM	9312
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015B NM	9312
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9312

#### Prep Batch: 9312

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1394-1	SS01	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

### HPLC/IC

#### Leach Batch: 9210

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1394-1	SS01	Soluble	Solid	DI Leach	
MB 880-9210/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9210/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9210/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Eurofins Xenco, Carlsbad

880-7011-A-11-F MSD

Matrix Spike Duplicate

Job ID: 890-1394-1 SDG: 31403236.022.0129

## HPLC/IC (Continued)

## Leach Batch: 9210 (Continued)

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
880-7011-A-11-E MS	Matrix Spike	Soluble	Solid	DI Leach	
880-7011-A-11-F MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	
nalysis Batch: 9307					
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1394-1	SS01	Soluble	Solid	300.0	9210
	Method Blank	Opticipite	Solid	300.0	0010
IVIB 880-9210/1-A		Soluble	30110	300.0	9210
	Lab Control Sample	Soluble	Solid	300.0	9210
MB 880-9210/1-A LCS 880-9210/2-A LCSD 880-9210/3-A					

Soluble

Solid

300.0

Eurofins Xenco, Carlsbad

4 5 6

8

## Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger CS

## Client Sample ID: SS01 Date Collected: 10/08/21 12:09

Date Received: 10/08/21 15:50

Job ID: 890-1394-1
SDG: 31403236.022.0129

## Lab Sample ID: 890-1394-1 Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
lotal/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
lotal/NA	Analysis	8021B		1	9282	10/12/21 21:06	KL	XEN MID
lotal/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
lotal/NA	Analysis	8015 NM		1	9187	10/11/21 10:08	AJ	XEN MID
lotal/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
lotal/NA	Analysis	8015B NM		1	9261	10/13/21 03:20	AJ	XEN MID
Soluble	Leach	DI Leach			9210	10/11/21 12:29	СН	XEN MID
Soluble	Analysis	300.0		1	9307	10/12/21 16:41	СН	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

**Released to Imaging: 3/14/2022 1:38:16 PM** 

Client: WSP USA Inc.

Project/Site: Tiger CS

10

## Job ID: 890-1394-1 SDG: 31403236.022.0129

## Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

ithority	Pr	ogram	Identification Number	Expiration Date
xas	NE	ELAP	T104704400-21-22	06-30-22
• ,	are included in this report, bu	at the laboratory is not certil	ied by the governing authority. This list ma	ay include analytes for
the agency does not of Analysis Method		Matrix	Analyte	
the agency does not of Analysis Method 8015 NM	fer certification. Prep Method	Matrix Solid	Analyte Total TPH	

Eurofins Xenco, Carlsbad

## **Method Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1394-1 SDG: 31403236.022.0129

Method	Method Description	Protocol	Laboratory
3021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Fotal BTEX	Total BTEX Calculation	TAL SOP	XEN MID
3015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
3015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
3015NM Prep	Microextraction	SW846	XEN MID
OI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### Protocol References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

\_\_\_\_\_

5
8
9
11

Eurofins Xenco, Carlsbad

## **Sample Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1394-1 SDG: 31403236.022.0129

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth	
890-1394-1	SS01	Solid	10/08/21 12:09	10/08/21 15:50	0.5	4
						5
						8
						9
						12
						13

Revised Date 051418 Rev 2018			6				G
					10.00		3
			0-9-21 1550		100 (17-		· soberner
Received by: (Signature) Date/Time	(Signature) Rec		Date/Time	Signature)	Received by: (Signature)	- 11	Relinquished by: (Signature)
the control ited.	are due to circumstances beyond the c enforced unless previously negotiated.	y the client if such losses are c yzed. These terms will be enfo	induistimitation of samples constructes a term particular or on one or non-overpary, to solve or the citent if such losses cost of samples and shall not assume any responsibility for any losses or expenses incurred by the citent if such losses be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be	rge of \$5 for each sample s	s and shall not assum s ch project and a cha	only for the cost of sample: \$75.00 will be applied to e.	produce: Signature of this document and termingrounding to early be constructed a varie performance of control of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.
	assions standard terms and co	illiates and subcontractors. It	niant company to Yanco its af	volid nurohana avdar from	iyzeu	Crice Metricu(s) and Meta(s) to be analyzed	
K Se Ag SiO2 Na Sr TI Sn U V Zn 1631/245.1/7470 /7471 : Hg	u Fe Pb Mg Mn Mo Ni K Mn Mo Ni Se Aa TI U	Cd Ca Cr Co C	I Sb As Ba Be Sh As Ba Be	RCRA 13PPM Texas 11 A	8	200.8 / 6020:	Total 200.7 / 6010
						6	
Discrete		_		12:09 0.5'	10/8/2021 12	S	SS01
Sample Comments			Numb TPH (E BTEX ( Chlorid	Time Depth Sampled	Date Ti Sampled San	tion Matrix	Sample Identification
lab, if received by 4:30pm	_		EPA 8	ainers:	Total Containers:	Yes NO WA	Sample Custody Seals:
TAT starts the day received by the			015 0=8	Factor: -D. C	Correction Factor:	No	Cooler Custody Seals:
	Chain of Custody	890-1394 Cha	) 1021)	Ц	IWM-	es N	Received Intact:
			· · · · · · · · · · · · · · · · · · ·	Thermometer ID	Therm	24/2.2	Temperature (°C):
			S	Wet Ice: Yes No	(Yes) NO V	Temp Blank:	SAMPLE RECEIPT
NAPP2123231376				Due Date:		Payton Benner	Sampler's Name: Pay
				Rush: 2 DAY			P.O. Number:
CC:2027031001				Routine	.0129	31403236.022.0129	Project Number:
Work Order Notes	QUEST	ANALYSIS REQUEST		Turn Around		Tiger CS	Project Name: Tige
ADaPT Other:	Deliverables: EDD	ner@wsp.com	Email: kalei.jennings@wsp.com, payton.benner@wsp.com	Email: kalei.jennings		817-683-2503	Phone: 817
	Reporting:Level II		Carlsbad, NM 88220	City, State ZIP:		Midland, Texas 79705	City, State ZIP: Mid
	State of Project:		3104 E Green Strret	Address:	1, Unit 222	3300 North A Street Bldg 1, Unit 222	
STRPrownfields IRCperfund	Program: UST/PST		3: XTO	Company Name:		WSP USA	
Work Order Comments			Adrian Baker	Bill to: (if different)		Kalei Jennings	Project Manager: Kale
www.xenco.com <sup>D</sup> age1 of1_	509-3334 94-1296 pa,FL (813-6 <u>20-2000)</u>	San Antonio, I X (210) 509-3359 43 Lubbock,TX (806)794-1296 A (770-449-8800) Tampa,FL (81	Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-333 Midland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)794-1296 Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (8	1ouston,TX (281) 240-420 Midland,TX (432-704-54 ;75-392-7550) Phoenix,A	Hobbs,NM (		
Work Order No:			Chain of Custody				

## Received by OCD: 11/5/2021 12:00:19 PM



1089 N Canal St.	2																		•	т. П	🔅 eurofins	fins						
Carlsbad NM 88220 Phone 575-988-3199 Fax: 575-988-3199		Chain of Custody Record			.ecc	ora					_													America	rica	ent i	Environment lesting America	
Client Information (Sub Contract Lab)	Sampler Bhone			Lab PM Kramer	1 - 1	Jessica	_						Carri	Carrier Tracking No(s).	king	Vo(s)				COC No 890-45	COC No 890-456 1							
Shipping/Receiving				jessic:	8	mer@	euro	ofins	et.co	З			State of Origin New Mexico	State of Origin New Mexico	ic gin					Page: Page	Page: Page 1 of 1	4				ĺ		
Eurofins Xenco					Accreditations Required (See note) NELAP - Louisiana, NELAP	ELAP - Louisiana, NELAP	: Requisia	Jired (	NEL NEL	AP -	): ' - Texas	ŝ								Job #:	Job #: 890-1394-1	<u>ٺ</u>						
Address 1211 W Florida Ave, ,	Due Date Requested 10/12/2021	ā							>	Analy	sis	Rec	lysis Requested	fed						Pres	Preservation Codes	g C	odes					
City Midland	TAT Requested (days):	ys):				and the second sec													'A'		âĤ	t	722		Hexane			
State Zip: TX, 79701						ТРН									_	_			<del>,</del> testet Da		D - Nitric Acid E NaHSO4	t ate	ວະດ		AsNaO2 Na2O4S Na2SO3			
Phone: 432-704-5440(Tel)	PO#				)	D) Full		e											the star	יד ח: א א	MeOH Amchlor			H2S	Na2S2O3 H2SO4	ω		
Email	WO #:				100 Million Contractor			Chloric	ΈX							_				_	DI Water				Acetone	lecany	drate	
Project Name Tiger CS	Project #: 89000004				Difference in the			АСН	DD) B1										ainer	K-EDTA L EDA	DADTA		N₹		pH 4-5 other (specify)	ecify)		
Site:	SSOW#:				CT1000000000000000000000000000000000000			D/DI_LI	alc (M	/									of con	Other <sup>.</sup>	7							
			Sample Type	Matrix (w=water	Filtered S m MS/M	OD_NM/80	OD_Calc	RGFM_28	5035FP_C	BTEX_GC									Number o	T								
Sample Identification - Client ID (Lab ID)	Sample Date	Time	(∪=comp, G=grab) ⊫	O=waste/oil, BT=Tissue, A=Air)	(NG)		8016	300_0	8021	Total								_	Total		Spe	Special Instructions/Note	Inst	ructi	ons/	Note	•	
	X	\$X	Preservation Code:	on Code:	X		-			2	1	E THE		all all		e Sentit			X			$\ $				1		Sec.3
SS01 (890-1394-1)	10/8/21	Mountain		Solid	_	×	×	×	×	×		1																L.
											T								H.			1						L
					$\vdash$														and and									L
						<u> </u>																						
					—	$\square$					Γ																	
					┯	1		1	1	T	T	T						Τ										
					—	+					Τ							T		T								
								1	1									1	Je .								Ì	
																												1
Inver. Since accountly accreation are subject to change, Eurothis Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC adventory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC adventory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC adventory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC adventory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC adventory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC adventory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC adventory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC adventory or other instructions will be provided.	places the ownership c being analyzed the sar e signed Chain of Cust	nples must be tody attesting to	yte & accredita shipped back to said complice	ition compliance to the Eurofins ance to Eurofir	e upon Xenco I S Xenco	LC lat	bcontr	ny or o	borato other i	nies. nstruc	This s	ample vill be	) shipr provic	hent is	ny ch	ange	under s to ac	- chai credi	n-of-c	ustod I statu	y Ifth sshou	e labo Id be t	iratory prough	t to E	not ci urofin	urrenti s Xen	so LLC	
Possible Hazard Identification Unconfirmed					Sa	Sample Disposal ( A fe	le Disposal ( A fi	posa		fee	_may	∐e a	sses	sed	if sa	, mpl	s ar		tain	0 0	e may be assessed if samples are retained longer than 1 month)	than	1	S att	· =			
Deliverable Requested 1 II III IV Other (specify)	Primary Deliverable Rank 2	ble Rank 2			ş	Special Instructions/QC	Instr	uctio	ns/C		quin	Requirements	ints			ľ					2			1	NOTION IS			
Empty Kit Relinquished by		Date			Time:			.	>		1			Meth	Method of Shipment:	Shipm	ent:											
Reinquisted by Cure Curl 10.11.21	Dale Time 14/2			MM		Receiv	And the		A I							Date	Date/Time							Company	any			
	Uate/Inne:			Company		Rece	Received by	Ž		• • •						Date.	Date/Time:							Company	any			[
1	Date/Time <sup>.</sup>			Company		Rece	Received by	ÿ								Date	Date/Time.							Company	any			
Custody Seals Intact. Custody Seal No ∆ Yes ∆ No						Cool	Cooler Temperature(s) °C	npera	ture(s		nd Ott	ier Re	and Other Remarks										ļ					
						ľ					1													/er 0	Ver 06/08/2021	/2021		L

Eurofins Xenco, Carlsbad

Job Number: 890-1394-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Carlsbad

## Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1394 List Number: 1

Creator: Clifton, Cloe

<6mm (1/4").

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	N/A	

Job Number: 890-1394-1

SDG Number: 31403236.022.0129

List Creation: 10/12/21 11:43 AM

List Source: Eurofins Xenco, Midland

## Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1394 List Number: 2 Creator: Lowe, Katie

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	True	

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

# Environment Testing America

# **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

## Laboratory Job ID: 890-1393-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS

## For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/13/2021 4:22:15 PM Jessica Kramer, Project Manager

(432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access Have a Question? Ask-The Expert Visit us at:

www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Page 212 of 331

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	6
QC Sample Results	7
QC Association Summary	
Lab Chronicle	13
Certification Summary	14
Method Summary	15
Sample Summary	16
Chain of Custody	17
Receipt Checklists	19

Client: WSP USA Inc. Project/Site: Tiger CS Page 213 of 331

Job ID: 890-1393-1
SDG: 31403236.022.0129

### Qualifiers

	3
Qualifier Description	
MS and/or MSD recovery exceeds control limits.	
Indicates the analyte was analyzed for but not detected.	5
Α	
Qualifier Description	
MS and/or MSD recovery exceeds control limits.	
Surrogate recovery exceeds control limits, high biased.	
Indicates the analyte was analyzed for but not detected.	
	8
Qualifier Description	
MS and/or MSD recovery exceeds control limits.	9
Indicates the analyte was analyzed for but not detected.	
These commonly used abbreviations may or may not be present in this report.	
Listed under the "D" column to designate that the result is reported on a dry weight basis	
Percent Recovery	
Contains Free Liquid	
Colony Forming Unit	40
-	MS and/or MSD recovery exceeds control limits.         Indicates the analyte was analyzed for but not detected.         Qualifier Description         MS and/or MSD recovery exceeds control limits.         Surrogate recovery exceeds control limits, high biased.         Indicates the analyte was analyzed for but not detected.         Qualifier Description         MS and/or MSD recovery exceeds control limits.         Indicates the analyte was analyzed for but not detected.         Qualifier Description         MS and/or MSD recovery exceeds control limits.         Indicates the analyte was analyzed for but not detected.         These commonly used abbreviations may or may not be present in this report.         Listed under the "D" column to designate that the result is reported on a dry weight basis         Percent Recovery         Contains Free Liquid

CNF Contains No Free Liquid DER Duplicate Error Ratio (normalized absolute difference) Dil Fac **Dilution Factor** 

DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)

DLC	Decision Level Concentration (Radioch
EDL	Estimated Detection Limit (Dioxin)

LOD Limit of Detection (DoD/DOE)

LOQ Limit of Quantitation (DoD/DOE) MCL EPA recommended "Maximum Contaminant Level"

MDA Minimum Detectable Activity (Radiochemistry)

MDC Minimum Detectable Concentration (Radiochemistry)

MDL Method Detection Limit ML Minimum Level (Dioxin) MPN Most Probable Number MQL

Method Quantitation Limit NC Not Calculated

ND Not Detected at the reporting limit (or MDL or EDL if shown)

NEG Negative / Absent Positive / Present POS

Practical Quantitation Limit PQL PRES Presumptive

Quality Control QC RER Relative Error Ratio (Radiochemistry)

RL Reporting Limit or Requested Limit (Radiochemistry)

- RPD Relative Percent Difference, a measure of the relative difference between two points
- TEF Toxicity Equivalent Factor (Dioxin)
- TEQ Toxicity Equivalent Quotient (Dioxin)
- Too Numerous To Count TNTC

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1393-1 SDG: 31403236.022.0129

#### Job ID: 890-1393-1

#### Laboratory: Eurofins Xenco, Carlsbad

#### Narrative

Job Narrative 890-1393-1

#### Receipt

The sample was received on 10/8/2021 3:50 PM. Unless otherwise noted below, the sample arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

#### GC VOA

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-8975 and analytical batch 880-9324 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

Method 300\_ORGFM\_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-9210 and analytical batch 880-9307 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Method: 8021B - Volatile Organic Compounds (GC)

## **Client Sample Results**

Job ID: 890-1393-1 SDG: 31403236.022.0129

## **Client Sample ID: SS02**

Date Collected: 10/08/21 12:07 Date Received: 10/08/21 15:50

Sample Depth: 0.5

Analyte

Benzene

Toluene

o-Xylene

Ethylbenzene

Xylenes, Total

m-Xylene & p-Xylene

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab Sample ID:	890-1393-1
	Matrix: Solid

10/12/21 21:17

Analyzed

10/12/21 21:17

10/12/21 21:17

5

Dil Fac

1

1

1

1

1

Dil Fac	9
1 1	
Dil Fac	
1	
Dil Fac	13
1	

RL	Unit	D	Prepared	Analyzed
	Unit		Frepareu	Analyzeu
0.00200	mg/Kg		10/11/21 11:00	10/12/21 21:17
0.00200	mg/Kg		10/11/21 11:00	10/12/21 21:17
0.00200	mg/Kg		10/11/21 11:00	10/12/21 21:17
0.00400	mg/Kg		10/11/21 11:00	10/12/21 21:17
0.00200	mg/Kg		10/11/21 11:00	10/12/21 21:17

10/11/21 11:00

Prepared

10/11/21 11:00

10/11/21 11:00

mg/Kg

Result Qualifier

<0.00200 U

<0.00200 U

<0.00200 U

<0.00400 U

<0.00200 U

<0.00400 U

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00400	U	0.00400	mg/Kg			10/13/21 08:57	1

0.00400

Method: 8015 NM - Diesel Range O	015 NM - Diesel Range Organics (DRO) (GC)								
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Total TPH	<50.0	U	50.0	mg/Kg			10/13/21 15:09	1	

Method: 8015B NM - Diesel Rang	e Organics (D	RO) (GC)						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/13/21 02:59	1
(GRO)-C6-C10								
Diesel Range Organics (Over	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/13/21 02:59	1
C10-C28)								
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/13/21 02:59	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	104		70 - 130			10/12/21 14:04	10/13/21 02:59	1
o-Terphenyl	120		70 - 130			10/12/21 14:04	10/13/21 02:59	1
Method: 300.0 - Anions, Ion Chro	omatography -	Soluble						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	33.3		4.96	mg/Kg			10/12/21 16:35	1

Eurofins Xenco, Carlsbad

## Job ID: 890-1393-1 SDG: 31403236.022.0129

Prep Type: Total/NA

## Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

_				Percent Surrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1		
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		5
890-1390-A-1-B MSD	Matrix Spike Duplicate	90	96		
890-1390-A-1-F MS	Matrix Spike	74	89		6
890-1393-1	SS02	92	105		
LCS 880-8975/1-A	Lab Control Sample	96	101		
LCSD 880-8975/2-A	Lab Control Sample Dup	82	93		
MB 880-8975/5-A	Method Blank	113	109		8
Surrogate Legend					
BFB = 4-Bromofluorobe	nzene (Surr)				9

DFBZ = 1,4-Difluorobenzene (Surr)

## Method: 8015B NM - Diesel Range Organics (DRO) (GC)

#### Matrix: Solid Prep Type: Total/NA Percent Surrogate Recovery (Acceptance Limits) 1CO1 OTPH1 Lab Sample ID **Client Sample ID** (70-130) (70-130) 890-1382-A-1-K MS Matrix Spike 118 115 890-1382-A-1-L MSD Matrix Spike Duplicate 118 113 890-1393-1 SS02 120 104 LCS 880-9312/2-A Lab Control Sample 92 90 LCSD 880-9312/3-A Lab Control Sample Dup 101 101 MB 880-9312/1-A Method Blank 115 133 S1+

#### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Eurofins Xenco, Carlsbad

Page 216 of 331
Client: WSP USA Inc. Project/Site: Tiger CS

#### Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-8975 Matrix: Solid Analysis Batch: 9324	i/5-A								Client S	ample ID: Meth Prep Type Prep Ba	: Tot	al/NA
		MB										
Analyte			Qualifier		RL	Unit		D	Prepared	Analyzed		Dil Fa
Benzene		198		0.001	98	mg/K	(g	1	10/11/21 11:00	10/12/21 19:53		
Toluene	<0.00	198	U	0.001	98	mg/K	-	1	10/11/21 11:00	10/12/21 19:53		
Ethylbenzene	<0.00	198	U	0.001	98	mg/K	g	1	10/11/21 11:00	10/12/21 19:53		
m-Xylene & p-Xylene	<0.00	397	U	0.003	897	mg/K	(g	1	10/11/21 11:00	10/12/21 19:53		
o-Xylene	<0.00	198	U	0.001	98	mg/K	(g	1	10/11/21 11:00	10/12/21 19:53		
Xylenes, Total	<0.00	397	U	0.003	397	mg/K	g	1	10/11/21 11:00	10/12/21 19:53		
<b>•</b> (	<b>4</b> /5	ΜВ							- ·			
Surrogate	%Reco	-	Qualifier	Limits				_	Prepared	Analyzed		Dil Fa
4-Bromofluorobenzene (Surr)		113		70 - 130					10/11/21 11:00			
1,4-Difluorobenzene (Surr)		109		70 - 130	0			1	10/11/21 11:00	10/12/21 19:53		
Lab Sample ID: LCS 880-897	5/1-A							Clie	ent Sample	ID: Lab Contro		
Matrix: Solid										Prep Type		
Analysis Batch: 9324										Prep Ba	itch:	897
				Spike		LCS				%Rec.		
Analyte				Added		Qualifier	Unit		D %Rec	Limits		
Benzene				0.100	0.08714		mg/Kg		87	70 - 130		
Toluene				0.100	0.1017		mg/Kg		102	70 - 130		
Ethylbenzene				0.100	0.1005		mg/Kg		100	70 - 130		
m-Xylene & p-Xylene				0.200	0.1713		mg/Kg		86	70 - 130		
o-Xylene				0.100	0.08029		mg/Kg		80	70 - 130		
	LCS	LCS										
Surrogate	%Recovery	Quali	fier	Limits								
4-Bromofluorobenzene (Surr)	96			70 - 130								
1,4-Difluorobenzene (Surr)	101			70 - 130								
Lab Sample ID: LCSD 880-89	)75/2-A						Cli	ent S	ample ID: L	ab Control Sa	mple	) Duj
Matrix: Solid										Prep Type	: Tot	al/N/
Analysis Batch: 9324										Prep Ba	tch:	<b>897</b>
				Spike	LCSD	LCSD				%Rec.		RP
Analyte				Added	Result	Qualifier	Unit		D %Rec	Limits R	PD	Lim
Benzene				0.100	0.08186		mg/Kg		82	70 - 130	6	3
Toluene				0.100	0.09746		mg/Kg		97	70 - 130	4	3
Ethylbenzene				0.100	0.08894		mg/Kg		89	70 - 130	12	3
m-Xylene & p-Xylene				0.200	0.1547		mg/Kg		77	70 <sub>-</sub> 130	10	3
o-Xylene				0.100	0.07544		mg/Kg		75	70 - 130	6	3
	LCSD	LCSE	)									
Surrogate	%Recovery	Quali	fier	Limits								
4-Bromofluorobenzene (Surr)	82			70 _ 130								
1,4-Difluorobenzene (Surr)	93			70 - 130								
Lab Sample ID: 890-1390-A-1	I-B MSD						(	Client	: Sample ID	: Matrix Spike	Dup	icat
Matrix: Solid										Prep Type		
Analysis Batch: 9324										Prep Ba		
•	Sample	Samp	ole	Spike	MSD	MSD				%Rec.		RP
Analyte	Result	-		Added		Qualifier	Unit		D %Rec		PD	Lim
-					0.007	<b>F</b> 4						

Eurofins Xenco, Carlsbad

68

81

70 - 130

70 - 130

Released to Imaging: 3/14/2022 1:38:16 PM

Benzene

Toluene

<0.00199 U F1

<0.00199 UF1

0.06752 F1

0.08128

mg/Kg

mg/Kg

0.100

0.100

28

21

35

35

Client: WSP USA Inc. Project/Site: Tiger CS

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Page	218

-

Job ID: 890-1393-1 SDG: 31403236.022.0129

**Client Sample ID: Matrix Spike** 

Prep Type: Total/NA

#### Lab Sample ID: 890-1390-A-1-B MSD **Client Sample ID: Matrix Spike Duplicate** Matrix: Solid Prep Type: Total/NA Analysis Batch: 9324 Prep Batch: 8975 Sample Sample Spike MSD MSD %Rec. Analyte Result Qualifier Added **Result Qualifier** Unit %Rec Limits RPD D Ethylbenzene <0.00199 UF1 0.100 0.07810 78 mg/Kg 70 - 130 14 m-Xylene & p-Xylene <0.00398 UF1 0.200 0.1340 F1 mg/Kg 67 70 - 130 16 0.100 0.06389 F1 o-Xylene <0.00199 UF1 64 70 - 130 mg/Kg 14

	MSD	MSD	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	90		70 - 130
1,4-Difluorobenzene (Surr)	96		70 - 130

#### Lab Sample ID: 890-1390-A-1-F MS Matrix: Solid

#### Details and - 1.

4-Bromofluorobenzene (Surr)

1,4-Difluorobenzene (Surr)

Analysis Batch: 9324									Pre	p Batch: 8975
	Sample	Sample	Spike	MS	MS				%Rec.	
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	<0.00199	U F1	0.100	0.05117	F1	mg/Kg		51	70 - 130	
Toluene	<0.00199	U F1	0.100	0.06554	F1	mg/Kg		65	70 - 130	
Ethylbenzene	<0.00199	U F1	0.100	0.06790	F1	mg/Kg		68	70 - 130	
m-Xylene & p-Xylene	<0.00398	U F1	0.201	0.1146	F1	mg/Kg		57	70 - 130	
o-Xylene	<0.00199	U F1	0.100	0.05541	F1	mg/Kg		55	70 - 130	
	MS	MS								
Surrogate	%Recovery	Qualifier	Limits							

70 - 130

70 - 130

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC)

74

89

Lab Sample ID: MB 880-9312/1-A Matrix: Solid Analysis Batch: 9261						Client Sa	mple ID: Metho Prep Type: 1 Prep Bato	Fotal/NA
	MB	MB					-	
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
(GRO)-C6-C10								
Diesel Range Organics (Over	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
C10-C28)								
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
	МВ	МВ						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	115		70 - 130			10/12/21 14:04	10/12/21 20:01	1
o-Terphenyl	133	S1+	70 - 130			10/12/21 14:04	10/12/21 20:01	1
Lab Sample ID: LCS 880-9312/2-A					c	lient Sample I	D: Lab Control	Sample

#### Lab Sample ID: LCS 880-9312/2-A Matrix: Solid Analysis Batch: 9261

Analysis Batch: 9261							Pre	p Batch: 9312
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	1102		mg/Kg		110	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	973.2		mg/Kg		97	70 - 130	
C10-C28)								

Eurofins Xenco, Carlsbad

Prep Type: Total/NA

RPD

Limit

35

35

35

7

#### Released to Imaging: 3/14/2022 1:38:16 PM

Page 219 of 331

Job ID: 890-1393-1

SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger CS

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: LCS 880-931 Matrix: Solid	2/2-A						Client	Sample	ID: Lab Co		
										ype: Tot	
Analysis Batch: 9261									Pre	p Batch:	9312
	LCS	LCS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	92		70 - 130								
o-Terphenyl	90		70 - 130								
_ Lab Sample ID: LCSD 880-93	12/3-4					Clier	nt Sam	nlo ID· I	Lab Contro	l Sample	
Matrix: Solid						oner				ype: Tot	
										p Batch:	
Analysis Batch: 9261			Spike	1.080	LCSD				%Rec.	рвают	RPD
Analysis			-			11	<b>_</b>	0/ Daa		000	
Analyte			Added		Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics			1000	1032		mg/Kg		103	70 - 130	7	20
(GRO)-C6-C10 Diesel Range Organics (Over			1000	984.4		mg/Kg		98	70 - 130	1	20
C10-C28)			1000	504.4		ilig/itg		90	70 - 130		20
,	LCSD	LCSD									
Surragata	%Recovery		Limits								
Surrogate	·	Quaimer									
1-Chlorooctane	101		70 - 130								
o-Terphenyl	101		70 - 130								
Lab Sample ID: 890-1382-A-1	-K MS							Client	Sample ID	: Matrix	Spike
Matrix: Solid										ype: Tot	
Analysis Batch: 9261										p Batch:	
	Sample	Sample	Spike	MS	MS				%Rec.	p Datoin	
Analyte		Qualifier	Added		Qualifier	Unit	D	%Rec	Limits		
Gasoline Range Organics	<49.9		997	1314		mg/Kg		132	70 - 130		
(GRO)-C6-C10		0									
Diesel Range Organics (Over	124		997	1290		mg/Kg		117	70 - 130		
C10-C28)											
	MS	MS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	118		70 - 130								
o-Terphenyl	115		70 - 130								
_											
1 - 1 - 0 ID - 000 4000 A 4						CI	ent Sa	ample IL	): Matrix Sp		
Lab Sample ID: 890-1382-A-1	-L MSD									VDO' TO	
Matrix: Solid	-L MSD								Prep 1		
									Pre	p Batch:	9312
Matrix: Solid Analysis Batch: 9261	Sample	Sample	Spike		MSD				Pre %Rec.	p Batch:	9312 RPD
Matrix: Solid Analysis Batch: 9261 Analyte	Sample Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Pre %Rec. Limits	p Batch: 	8 <mark>9312</mark> RPD Limit
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	Sample	Qualifier	-		Qualifier	- <mark>Unit</mark> mg/Kg	<u>D</u>	%Rec 142	Pre %Rec.	p Batch:	9312 RPD
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10	Sample Result	Qualifier	Added	<b>Result</b> 1419	Qualifier	mg/Kg	D		Pre %Rec. Limits	p Batch: 	8 <mark>9312</mark> RPD Limit
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	Sample Result <49.9	Qualifier	Added	Result	Qualifier		<u>D</u>	142	Pre %Rec. Limits 70 - 130	P Batch: 8	: 9312 RPD Limit 20
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Sample Result <49.9	Qualifier	Added	<b>Result</b> 1419	Qualifier	mg/Kg	D	142	Pre %Rec. Limits 70 - 130	P Batch: 8	: 9312 RPD Limit
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Sample Result <49.9	Qualifier U F1 MSD	Added	<b>Result</b> 1419	Qualifier	mg/Kg	D	142	Pre %Rec. Limits 70 - 130	P Batch: 8	: 9312 RPD Limit
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	Sample Result <49.9 124 MSD	Qualifier U F1 MSD	Added	<b>Result</b> 1419	Qualifier	mg/Kg	D_	142	Pre %Rec. Limits 70 - 130	P Batch: 8	: 9312 RPD Limit

#### **QC Sample Results**

Job ID: 890-1393-1
SDG: 31403236.022.0129

Project/Site: Tiger CS
Method: 300.0 - Anions, Ion Chromatography

Client: WSP USA Inc.

 Lab Sample ID: MB 880-9210/1-A Matrix: Solid										Client S	Sample ID: Prep	Method Type: S	
Analysis Batch: 9307												.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
Analysis Baton. coor		МВ МВ											
Analyte	Re	esult Qualifier		RL		Unit		D	Р	repared	Analy	zed	Dil Fac
Chloride		5.00 U		5.00		mg/K	a				10/12/21		1
_						5	5						
Lab Sample ID: LCS 880-9210/2-A								Cli	ent	Sample	D: Lab C	ontrol S	ample
Matrix: Solid											Prep	Type: S	oluble
Analysis Batch: 9307													
-			Spike	LC	S LC	cs					%Rec.		
Analyte			Added	Resu	lt Qu	ualifier	Unit		D	%Rec	Limits		
Chloride			250	242	3		mg/Kg		_	97	90 _ 110		
Lab Sample ID: LCSD 880-9210/3-4	4						CI	ient S	Sam	ple ID:	Lab Contro		
Matrix: Solid											Prep	Type: S	oluble
Analysis Batch: 9307													
			Spike		D LC						%Rec.		RPD
Analyte			Added			ualifier	Unit		<u>D</u>	%Rec	Limits	RPD	Limit
Chloride			250	243	5		mg/Kg			97	90 _ 110	0	20
_ Lab Sample ID: 880-7011-A-11-E M	s									Client	Sample IE	): Matrix	Snike
Matrix: Solid	- -											Type: S	
Analysis Batch: 9307												.,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
· · · · · · · · · · · · · · · · · · ·	Sample	Sample	Spike	N	S MS	s					%Rec.		
Analyte	Result	Qualifier	Added	Resu	lt Qu	ualifier	Unit		D	%Rec	Limits		
Chloride	58.4	F1	495	339	1 F1	1	mg/Kg		_	57	90 - 110		
-													
Lab Sample ID: 880-7011-A-11-F M	SD							Clien	t Sa	ample IC	D: Matrix S		
Matrix: Solid											Prep	Type: S	oluble
Analysis Batch: 9307													
	Sample	-	Spike	MS							%Rec.		RPD
Analyte		Qualifier	Added			ualifier	Unit		D	%Rec	Limits	RPD	Limit
Chloride	58.4	F1	495	321	0 F1	1	mg/Kg			53	90 _ 110	6	20

#### **QC Association Summary**

Client: WSP USA Inc. Project/Site: Tiger CS

Job ID: 890-1393-1 SDG: 31403236.022.0129

#### GC VOA

#### Prep Batch: 8975

ep Batch: 8975					
Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1393-1	SS02	Total/NA	Solid	5035	
MB 880-8975/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-8975/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-8975/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
890-1390-A-1-B MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	
890-1390-A-1-F MS	Matrix Spike	Total/NA	Solid	5035	
nalysis Batch: 9324					
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1393-1	SS02	Total/NA	Solid	8021B	8975
MB 880-8975/5-A	Method Blank	Total/NA	Solid	8021B	8975
LCS 880-8975/1-A	Lab Control Sample	Total/NA	Solid	8021B	8975
LCSD 880-8975/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	8975
890-1390-A-1-B MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	8975
890-1390-A-1-F MS	Matrix Spike	Total/NA	Solid	8021B	8975
nalysis Batch: 9366					
Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1393-1	SS02	Total/NA	Solid	Total BTEX	

#### Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1393-1	SS02	Total/NA	Solid	8015B NM	9312
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015B NM	9312
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9312

#### Prep Batch: 9312

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1393-1	SS02	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	
Analysis Batch: 9387					
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1393-1	SS02	Total/NA	Solid	8015 NM	

#### HPLC/IC

#### Leach Batch: 9210

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1393-1	SS02	Soluble	Solid	DI Leach	
MB 880-9210/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9210/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9210/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Job ID: 890-1393-1 SDG: 31403236.022.0129

#### HPLC/IC (Continued)

880-7011-A-11-E MS

880-7011-A-11-F MSD

Matrix Spike

Matrix Spike Duplicate

#### Leach Batch: 9210 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
880-7011-A-11-E MS	Matrix Spike	Soluble	Solid	DI Leach	
880-7011-A-11-F MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
!	Client Sample ID SS02	Prep Type Soluble	Matrix Solid	Method 300.0	Prep Batch 9210
890-1393-1					
Lab Sample ID 890-1393-1 MB 880-9210/1-A LCS 880-9210/2-A	SS02	Soluble	Solid	300.0	9210

Soluble

Soluble

Solid

Solid

300.0

300.0

9210

9210

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger CS

#### **Client Sample ID: SS02** Date Collected: 10/08/21 12:07 104 45.50 р.

Dat

Job ID: 890-1393-1
SDG: 31403236.022.0129

#### Lab Sample ID: 890-1393-1 Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
ер Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
al/NA	Prep	5035			8975	10/11/21 11:00	KL	XEN MID
I/NA	Analysis	8021B		1	9324	10/12/21 21:17	KL	XEN MID
I/NA	Analysis	Total BTEX		1	9366	10/13/21 08:57	KL	XEN MID
NA	Analysis	8015 NM		1	9387	10/13/21 15:09	AJ	XEN MID
IA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
NA	Analysis	8015B NM		1	9261	10/13/21 02:59	AJ	XEN MID
ble	Leach	DI Leach			9210	10/11/21 12:29	СН	XEN MID
	Analysis	300.0		1	9307	10/12/21 16:35	СН	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

Client: WSP USA Inc. Project/Site: Tiger CS

10

Job ID: 890-1393-1
SDG: 31403236.022.0129

#### Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

thority	P	rogram	Identification Number	Expiration Date
as	N	ELAP	T104704400-21-22	06-30-22
the agency does not of	fer certification.	,	ed by the governing authority. This list ma	ay include analytes for w
the agency does not of Analysis Method	•	Matrix	Analyte	ay include analytes for w
the agency does not of	fer certification.	,		ay include analytes for w

#### **Method Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1393-1 SDG: 31403236.022.0129

lethod	Method Description	Protocol	Laboratory
021B	Volatile Organic Compounds (GC)	SW846	XEN MID
otal BTEX	Total BTEX Calculation	TAL SOP	XEN MID
015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
00.0	Anions, Ion Chromatography	MCAWW	XEN MID
035	Closed System Purge and Trap	SW846	XEN MID
015NM Prep	Microextraction	SW846	XEN MID
I Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### Protocol References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

\_\_\_\_\_

	5
	8
	9
-	1
	13

#### **Sample Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1393-1 SDG: 31403236.022.0129

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth	
890-1393-1	SS02	Solid	10/08/21 12:07	10/08/21 15:50	0.5	4
						5
						8
						9
						12
						13

				origin of orderody	holody			
Xm	mZCO	Hous	ston, TX (281) 240-4200	Dallas, TX (214) 902-0300	Houston, TX (281) 240-4200 Dallas, TX (214) 902-0300 San Antonio, TX (210) 509-3334			
LABO	RATORIES	Hobbs,NM (575-0	392-7550) Phoenix,AZ (	480-355-0900) Atlanta,G	Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (813-620-2000)		www.xenco.com <sup>つ</sup> age	_1 of1
Project Manager: Kale	Kalei Jennings		Bill to: (if different)	Adrian Baker			Work Order Comments	
	WSP USA		Company Name:	хто		Program: UST/PST	rownfields RC	1) perfund
	3300 North A Street Bldg 1, Unit 222	dg 1, Unit 222	Address:	3104 E Green Strret		State of Project:		
City, State ZIP: Mid	Midland, Texas 79705		City, State ZIP:	Carlsbad, NM 88220	0	Reporting:Level II evel III		
	817-683-2503	Em	ail: kalei.jennings@\	Email: kalei.jennings@wsp.com, payton.benner@wsp.com	nner@wsp.com	Deliverables: EDD	ADaPT D Other:	er:
Project Name: Tige	Tiger CS		Turn Around		ANALYSIS REQUEST	ST	Work (	Work Order Notes
er:	31403236.022.0129		Routine				CC:2027031001	001
P.O. Number:		Ru	Rush: 2 DAY					
Sampler's Name: Pay	Payton Benner	Þ	Due Date:	_			NAPP2123231376	31376
SAMPLE RECEIPT	Temp Blank:	Yes No Wet Ice:	(Yes No					
Temperature (°C):	2.4/2.2	Thermometer ID		_				
Received Intact:	No No	MM		) 021)				
Cooler Custody Seals:	R	Correction Factor:	·0·2	015 0=8			TAT starts the	TAT starts the day recevied by the
Sample Custody Seals:	Yes No WA	Total Containers:		(EPA (				erved by 4:supm
Sample Identification	ation Matrix	Date Time Sampled Sampled	d Depth Numb	TPH (E BTEX Chlorid			Sample	Sample Comments
SS02	S	10/8/2021 12:07	0.5' 1	× × ×				Discrete
Total 200.7 / 6010 Circle Method(s) a	otal 200.7 / 6010 200.8 / 6020: Circle Method(s) and Metal(s) to be analyzed	8F	TCRA 13PPM Texas 11 A	l Sb As Ba Be Sb As Ba Be	B Cd Ca Cr Co Cu Fe Pb Mg Cd Cr Co Cu Pb Mn Mo Ni Se	Fe Pb Mg Mn Mo Ni K Se Ag Mo Ni Se Ag Ti U	SiO	2 Na Sr TI Sn U V Zn 1631/245.1/7470 /7471 : Hg
Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractors of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses of Xenco. A minimum charce of \$75.00 will be applied to each project and a charce of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be	ment and relinquishment o only for the cost of sample of \$75.00 will be applied to	f samples constitutes a vali les and shall not assume an each project and a charge c	d purchase order from clie y responsibility for any los of \$5 for each sample subn	nt company to Xenco, its a ses or expenses incurred I nitted to Xenco, but not ana	iffliates and subcontractors. It assign by the client if such losses are due to alyzed. These terms will be enforced u	<ol> <li>It assigns standard terms and conditions are due to circumstances beyond the control enforced unless previously negotiated.</li> </ol>		
Relinquished by: (Signature)	ignature)	Received by: (Signature)	nature)	Date/Time	Relinquished by: (Signature)	are) Received by: (Signature)	(Signature)	Date/Time
· sperince	Cr	(July)	10	10-2-21 1550	N			
3		7			4 0			
σ							Revis	Revised Date 051418 Rev 2018 1

#### Received by OCD: 11/5/2021 12:00:19 PM



## 1089 N Canal St. **Eurofins Xenco, Carlsbad**

# Chain of Custody Record

**13** 14

Seurofins Environment Testing

Chain of Custody Record     Service     <																		-					
Privace US-2013/01 // 100         Privace         Priva		ი	hain c	of Cust	ody Re	eco	ď														<b>"</b> 6	😵 eurorins	Environment Testing
Capital Marcinandian         Game         Band         Capital Marcinan         Provide Marcinan         Pro	Phone 575-988-3199 Fax 575-988-3199				•																		America
Burger Burger Burger Damme Burger B	ormation	Sampler:			Lab PN Kram	er Je	ssica	-						Carrie	9r Tra	cking	No(s	<i>"</i>				190-456 1	
P.         Terration of the Requested (Graphic Control of the Requested (Graphic Control of the Requested (Graphic Control of the Requested (Graphic Control of the Requested (Gra	Client Contact: Shipping/Receiving	Phone:			E-Mail	akra	merío	Plin	fins	3	3	- 1		State	ofOr	ŝ						age	
Control warm         Control warm<	Company E					Accredi	tations	Req	Jired (	See n	ote):		L		No.	Į					╡	ragericiii	
Carry W. Fulda Ave.     Charamer (ave)     Fundamer (ave)     Fundamer (ave)       State 2014     Fundamer (ave)     11     Fundamer (ave)     11       State 2014     Fundamer (ave)     10     10     10       State 2014     Fundamer (ave)     10     10     10       State 2014     100     10     10     10       State 2014     100     10     10     10     10       State 2014     100     10     10     10     10       State 2014     10     10     10     10     10     10       State 2014     10     10     10     10     10     10     10       State 2014     10     10     10     10     10     10     10       State 2014     10     10     10     10     10     10     10       State 2014 <td></td> <td></td> <td></td> <td></td> <td></td> <td>NELA</td> <td>P -</td> <td>ouisi</td> <td>ana,</td> <td>Ē</td> <td>₽,</td> <td>Texa</td> <td>s</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>8</td> <td>390-1393-1</td> <td></td>						NELA	P -	ouisi	ana,	Ē	₽,	Texa	s								8	390-1393-1	
Midland Midlan	1211 W Florida Ave,	Due Date Requestec 10/13/2021	-								nalv	sis	Rea	IIPS	fed							<sup>9</sup> reservation Cod	les
Bana 26: TRX, 75701     Or a     Or a       Figher: Canadian and the second and the	City Midland	TAT Requested (day	s).													٦		-	-	SHE X			M - Hexane N None
Reprint     Poper     Poper     Poper     Poper     Poper       Inna     00.0     00.0     00.0     00.0     Poper       Inna     00.0     00.0     00.0     Poper     Poper       Inna     00.0     00.0     00.0     Poper     Poper       Inna     00.0     Poper     Poper     Poper     Poper       Inna     00.0     Poper     Poper     Poper     Poper       Inna     Poper     Poper     Poper     Poper     Poper <tr< td=""><td>State Zip: TX, 79701</td><td></td><td></td><td></td><td>inter - states</td><td></td><td>ГРН</td><td></td><td></td><td></td><td></td><td></td><td></td><td>_</td><td></td><td></td><td>~</td><td></td><td></td><td></td><td></td><td>Zn Acetate Nitric Acid NaHSO4</td><td>O - AsNaO2 P Na2O4S ハョンSC03</td></tr<>	State Zip: TX, 79701				inter - states		ГРН							_			~					Zn Acetate Nitric Acid NaHSO4	O - AsNaO2 P Na2O4S ハョンSC03
Banal       MO P       Marcia       Provestion       Provide Name	Phone: 432-704-5440(Tel)	PO #					) Full '		,											11. A.S.	<u>201</u>	MeOH - Amchlor	R Na2S2O3 S H2SO4
Type Class       Bind Class <td>Email</td> <td>WO#</td> <td></td> <td></td> <td></td> <td></td> <td>) (MOE</td> <td></td> <td>hlorid</td> <td>EX</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>ar sur</td> <td><u>I. Heren</u></td> <td>ASCOTDIC ACIO Ce Di Water</td> <td>T - TSP Dodecahydrate U Acetone</td>	Email	WO#					) (MOE		hlorid	EX										ar sur	<u>I. Heren</u>	ASCOTDIC ACIO Ce Di Water	T - TSP Dodecahydrate U Acetone
Star Sample Identification - Clipnt ID (Lab ID) Sample Date Time Sample Date Time Ti	Project Name. Tiger CS	Project #: R9000004				000033000000000000000000000000000000000	S_Pre		АСНО	D) BT										10000.00	00995-5284	K - EDTA EDA	W pH 4-5 Z other (specify)
Sample Identification - Cilent ID (Lab ID) Sample Date Single Kartik Grag Bit Martik Grag Bit	Site:	SSOW#				CONSTRUCTION OF CONSTRUCTION	15NM_		D/DI_LE	alc (MC	/									( <u></u>		)ther	
Sample unmittation - client - (unmittation)     Simple Late (inf)     Time (inf)     Gradie (inf)     Cold (inf)							15MOD_NM/80	16MOD_Calc	0_ORGFM_28	21B/5035FP_C	tal_BTEX_GC										tal Number d		
SS02 (890-1393-1)     10/8/21     11/2 0/n     Solid     X			X	SE 16 74	1 de	CONT AND	8	8	3	8	Т				1205		7				Чſ	special in	structions/Note:
Image: Since laboratory accreditations are subject to change. Eurofins Xerco LLC Jaces the samples must be subject to the sample must be subject to the functions. This sample shyment is forwarded under chain-of-causedy. If the laboratory does not currently the laboratory under chain-of-causedy. If the laboratory does not currently the sample must be subject to the functions. Xenco LLC laboratory or dis information structions will be provided. Any changes to accreditation status should be trought to Eurofins Xenco LLC.         Possible Hazard Identification       Primary Deliverable Rank. 2       Sample Disposal (A fee must be accreditation status should be trought for must be accreditation status should be trought to Eurofins Xenco LLC.         Possible Hazard Identification       Primary Deliverable Rank. 2       Sample Disposal (A fee Requirements)         Sample Disposal By Lab       Archive For       Months	SS02 (890-1393-1)		12 07 Mountain		Solid		×	×	×	×	×	الاروارين	andara nd		to a second	1000					- 1		
Image: Since laboratory accreditations are subject to charge. Eurofins Xenco LLC places the ownership of method analyse & accreditation compliance upon out subcontract latoratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently statention in mediatary. If all requested accreditations are current to date return the signed Chain of Custody attesting to said complicance to Eurofins Xenco LLC aboratory or other instructions will be provided. Any charges to accreditation status should be brought to Eurofins Xenco LLC.         Possible Hazard Identification       Imple Deliverable Rank. 2       Sample Deliverable Requested 1, II, III, IV. Other (specify)       Primary Deliverable Rank. 2       Sample Deliverable Requested 1.       Possible assessed if samples are retained longer than 1 month)         Poliverable Requested 1, II, III, IV. Other (Specify)       Primary Deliverable Rank. 2       Sample Deliverable Requested 1.       Poliverable Requested 1.																				5 ' J. **			
Image: Since laboratory accreditations are subject to change. Eurofins Xenco LLC laces the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample subject to change for analysis/tests/markity being analyzed the samples must be shipped back to the Eurofins Xenco LLC.         Note: Since laboratory accreditations are subject to change. Eurofins Xenco LLC laces the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody if the laboratory does not currently attention immediately if all requessed accreditations are current to date netwith signed Chain of Custory attention immediately if all requessed accreditations are current to date netwith signed Chain of Custory attention immediately if all requessed if samples are retained longer than 1 month / Linconfirmed         Possible Hazard Identification       Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)         Unconfirmed       Imany Deliverable Rank. 2       Special Instructions/QC Requirements																				Ser. 10 2 St.	Survey and		
Image: state of the state of Crigin isset above for analysis testimative being analyzed the samples must be shipped back to the Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently attention immediately. If all requested accreditations are current to date return the signed Chain of Custody attesting to said complicance to Eurofins Xenco LLC.         Possible Hazard Identification       Image: Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently attention immediately. If all requested accreditation status should be brought to Eurofins Xenco LLC.         Possible Hazard Identification       Sample Chain of Custody attesting to said complicance to Eurofins Xenco LLC.         Possible Requested 1, II, III, IV, Other (specify)       Primary Deliverable Rank. 2         Sepcial Instructions/QC Requirements       Special Instructions/QC Requirements																				nuni igina	<u>Ma</u>		
Note: Since laboratory accreditations are subject to change. Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody if the laboratory does not currently attention immediately. If all requested accreditations are current to date return the signed Chain of Custody attesting to said compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody if the laboratory does not currently attention immediately. If all requested accreditation analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody if the laboratory does not currently attention immediately. If all requested accreditation satus should be brought to Eurofins Xenco LLC.         Possible Hazard Identification       Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)         Unconfirmed       Disposal I, II, III, IV, Other (specify)       Primary Deliverable Rank. 2       Special Instructions/OC Requirements																					ta hBh		
Image: Since laboratory accreditations are subject to change, Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody if the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC         Possible Hazard Identification       Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)         Unconfirmed       Disposal I, II, III, IV, Other (specify)       Primary Deliverable Rank. 2       Special Instructions/QC Requirements																				( <sup>10</sup> 4/ 3)	<u>B</u> Î		
Note: Since laboratory accreditations are subject to change, Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently arteniton immediately. If all requested accreditations are current to date return the signed Chain of Custody attesting to said complicance to Eurofins Xenco LLC. Possible Hazard Identification         Possible Hazard Identification       Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)         Unconfirmed       III, IVI, Other (specify)         Primary Deliverable Rank. 2       Special Instructions/QC Requirements																				1774	lass.		
Note: Since laboratory accreditations are subject to change, Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently attention immediately. If all requested accreditations are current to date return the signed Chain of Custody attesting to said complicance to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC. Possible Hazard Identification Unconfirmed Unconfirmed Deliverable Requested 1, II, III, V, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, II, III, V, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, II, III, V, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, II, III, V, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, II, III, V, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, III, IV, Other (specify) Primary Deliverable Rank. 2 Deliverable Refuested 1, IIIIIIII IV, IV, IV, IV, IV, IV, IV, I																				8788	Link		
Note Since laboratory accreditations are subject to change, Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC Possible Hazard Identification Possible Hazard Identification Pointed Primary Deliverable Rank. 2 Primary D																					Universit		
Sample Disposal ( A fee may be assessed if samples are retained longer than 1 mo         Imany Deliverable Rank. 2         Primary Deliverable Rank. 2         Special Instructions/QC Requirements	Vote: Since laboratory accreditations are subject to change, Eurofins Xenco LLC p maintain accreditation in the State of Origin listed above for analysis/tests/matrix b attention immediately If all requested accreditations are current to date return the	laces the ownership of eing analyzed the sam signed Chain of Cust	method anality must be ody attesting to	yte & accreditat shipped back to o said complica	ion compliance ) the Eurofins X nce to Eurofins	tupon ( (enco L Xenco	LC lat	bcontr	act lai ny or c	oorato other i	nies. 1struc	This sations v	ill be	shipn provic	hent is led. /	s forw Any c	/arde hang	d un	der cl	edita:	of-cut	stody If the laborate status should be brou	ory does not currently ught to Eurofins Xenco LLC
Primary Deliverable Rank. 2 Special Instructions/QC Requirements	Possible Hazard Identification					Sa	mple	Dis	oosa	(A		nay	」be a	ses	sed	ifsa	qui	les	]are	- Fa	inec	d longer than 1	month)
	Deliverable Requested I, II, III, IV, Other (specify)	Primary Deliverat	le Rank, 2			ş	ecial	Instr	uctio	ns/Q	CR	ğuire	imen	ts	sai b	Ϋ́L	8			Þ	ronv	ve For	Months

Empty Kit Relinquished by

Relinquished by: Relinquished by

160

10-11-21

Date

Time

Method of Shipment:

Received by Received by

 $\mathcal{N}$ 

Company

elinquished by

Date/Time: Date/Time J. S

Company

Received by:

Date/Time Date/Time Date/Time:

Company Company Company

Ver 06/08/2021

Cooler Temperature(s) °C and Other Remarks.

Custody Seals Intact. ∆ Yes ∆ No

Custody Seal No

Received	' by	OCD:	11/5/2021	12:00:19 PM
----------	------	------	-----------	-------------

#### Login Sample Receipt Checklist

				_1
Login Sample Rece	int Chackli	~*		
	Ipt Oliconia	51		2
Client: WSP USA Inc.			Job Number: 890-1393-1	3
			SDG Number: 31403236.022.0129	Δ
Login Number: 1393			List Source: Eurofins Xenco, Carlsbad	
List Number: 1				5
Creator: Clifton, Cloe				
Question	Answer	Comment		
The cooler's custody seal, if present, is intact.				
Sample custody seals, if present, are intact.				
The cooler or samples do not appear to have been compromised or tampered with.				8
Samples were received on ice.				
Cooler Temperature is acceptable.				9
Cooler Temperature is recorded.				
COC is present.				
COC is filled out in ink and legible.				
COC is filled out with all pertinent information.				
Is the Field Sampler's name present on COC?				
There are no discrepancies between the containers received and the COC.				
Samples are received within Holding Time (excluding tests with immediate HTs)				13
Sample containers have legible labels.				14
Containers are not broken or leaking.				
Sample collection date/times are provided.				
Appropriate sample containers are used.				
Sample bottles are completely filled.				
Sample Preservation Verified.				
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs				
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").				

#### Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1393 List Number: 2 Creator: Lowe, Katie

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	True	

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

14

Job Number: 890-1393-1 SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Midland List Creation: 10/12/21 11:43 AM Received by OCD: 11/5/2021 12:00:19 PM

### 🔅 eurofins

#### Environment Testing America

#### **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

#### Laboratory Job ID: 890-1392-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS

#### For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/13/2021 4:21:47 PM Jessica Kramer, Project Manager

(432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access Have a Question? Ask-The Expert Visit us at:

www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Page 232 of 331

#### **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	6
QC Sample Results	7
QC Association Summary	11
Lab Chronicle	13
Certification Summary	14
Method Summary	15
Sample Summary	16
Chain of Custody	17
Receipt Checklists	19

Client: WSP USA Inc. Project/Site: Tiger CS Page 233 of 331

Job ID: 890-1392-1
SDG: 31403236.022.0129

#### Qualifiers

	3
Qualifier Description	
MS and/or MSD recovery exceeds control limits.	
Indicates the analyte was analyzed for but not detected.	5
Α	
Qualifier Description	
MS and/or MSD recovery exceeds control limits.	
Surrogate recovery exceeds control limits, high biased.	
Indicates the analyte was analyzed for but not detected.	
	8
Qualifier Description	
MS and/or MSD recovery exceeds control limits.	9
Indicates the analyte was analyzed for but not detected.	
These commonly used abbreviations may or may not be present in this report.	
Listed under the "D" column to designate that the result is reported on a dry weight basis	
Percent Recovery	
Contains Free Liquid	
Colony Forming Unit	40
-	MS and/or MSD recovery exceeds control limits.         Indicates the analyte was analyzed for but not detected.         Qualifier Description         MS and/or MSD recovery exceeds control limits.         Surrogate recovery exceeds control limits, high biased.         Indicates the analyte was analyzed for but not detected.         Qualifier Description         MS and/or MSD recovery exceeds control limits.         Indicates the analyte was analyzed for but not detected.         Qualifier Description         MS and/or MSD recovery exceeds control limits.         Indicates the analyte was analyzed for but not detected.         These commonly used abbreviations may or may not be present in this report.         Listed under the "D" column to designate that the result is reported on a dry weight basis         Percent Recovery         Contains Free Liquid

 CNF
 Contains No Free Liquid

 DER
 Duplicate Error Ratio (normalized absolute difference)

 Dil Fac
 Dilution Factor

Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)

MCL EPA recommended "Maximum Contaminant Level"

MDA Minimum Detectable Activity (Radiochemistry)

MDC Minimum Detectable Concentration (Radiochemistry)

MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit

 NC
 Not Calculated

 ND
 Not Detected at the repo

D Not Detected at the reporting limit (or MDL or EDL if shown)

 NEG
 Negative / Absent

 POS
 Positive / Present

PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control

RER Relative Error Ratio (Radiochemistry)

- RL Reporting Limit or Requested Limit (Radiochemistry)
- RPD Relative Percent Difference, a measure of the relative difference between two points
- TEF Toxicity Equivalent Factor (Dioxin)
- TEQ Toxicity Equivalent Quotient (Dioxin)
- TNTC Too Numerous To Count

#### Job ID: 890-1392-1 SDG: 31403236.022.0129

#### Job ID: 890-1392-1

Client: WSP USA Inc.

Project/Site: Tiger CS

#### Laboratory: Eurofins Xenco, Carlsbad

#### Narrative

Job Narrative 890-1392-1

#### Receipt

The sample was received on 10/8/2021 3:50 PM. Unless otherwise noted below, the sample arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

#### GC VOA

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-8975 and analytical batch 880-9324 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

Method 300\_ORGFM\_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-9210 and analytical batch 880-9307 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Method: 8021B - Volatile Organic Compounds (GC)

Result Qualifier

Dil Fac

#### **Client Sample Results**

RL

Unit

D

Prepared

Job ID: 890-1392-1 SDG: 31403236.022.0129

#### Project/Site: Tiger CS **Client Sample ID: SS03**

Client: WSP USA Inc.

Date Collected: 10/08/21 12:12

Date Received: 10/08/21 15:50

Sample Depth: 0.5

Analyte

Analyzed

#### Lab Sample ID: 890-1392-1 Matrix: Solid

5

Chloride	33.3		5.04	mg/Kg	_		10/12/21 16:30	1	
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Method: 300.0 - Anions, Ion Chro	omatography -	Soluble							
o-Terphenyl	122		70 - 130			10/12/21 14:04	10/13/21 02:39	1	
1-Chlorooctane	107		70 - 130			10/12/21 14:04	10/13/21 02:39	1	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac	
								-	
C10-C28) Oll Range Organics (Over C28-C36)	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 02:39	1	
Diesel Range Organics (Over	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 02:39	1	
(GRO)-C6-C10									
Gasoline Range Organics	<49.8	U	49.8	mg/Kg		10/12/21 14:04	10/13/21 02:39	1	
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
– Method: 8015B NM - Diesel Rang	e Organics (D	RO) (GC)							
Total TPH	<49.8	U	49.8	mg/Kg			10/13/21 15:09	1	
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Method: 8015 NM - Diesel Range	Organics (DR	O) (GC)							
	<0.00596	0	0.00396	mg/Kg			10/13/21 00.57	1	
Total BTEX			0.00398			Prepared	10/13/21 08:57		
Method: Total BTEX - Total BTEX Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
- Mathadi Tatal RTEV - Tatal RTEV									
1,4-Difluorobenzene (Surr)	126		70 - 130			10/11/21 11:00	10/12/21 20:56	1	
4-Bromofluorobenzene (Surr)	93		70 - 130			10/11/21 11:00	10/12/21 20:56	1	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac	
Xylenes, Total	<0.00398	U	0.00398	mg/Kg		10/11/21 11:00	10/12/21 20:56	1	i
o-Xylene	<0.00199		0.00199	mg/Kg		10/11/21 11:00	10/12/21 20:56	1	
m-Xylene & p-Xylene	<0.00398		0.00398	mg/Kg		10/11/21 11:00	10/12/21 20:56	1	i
Ethylbenzene	<0.00199		0.00199	mg/Kg		10/11/21 11:00	10/12/21 20:56	1	
	<0.00199		0.00199	mg/Kg		10/11/21 11:00	10/12/21 20:56	1	
Benzene	<0.00199		0.00199	mg/Kg		10/11/21 11:00	10/12/21 20:56	1	
							40/40/00 50		

#### Job ID: 890-1392-1 SDG: 31403236.022.0129

Prep Type: Total/NA

#### Method: 8021B - Volatile Organic Compounds (GC) Matrix: Solid

#### Percent Surrogate Recovery (Acceptance Limits) BFB1 DFBZ1 Client Sample ID (70-130) (70-130) Lab Sample ID 890-1390-A-1-B MSD Matrix Spike Duplicate 90 96 6 890-1390-A-1-F MS Matrix Spike 74 89 890-1392-1 SS03 93 126 LCS 880-8975/1-A Lab Control Sample 96 101 LCSD 880-8975/2-A Lab Control Sample Dup 82 93 MB 880-8975/5-A Method Blank 113 109 Surrogate Legend BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC)

#### Matrix: Solid Prep Type: Total/NA Percent Surrogate Recovery (Acceptance Limits) 1CO1 OTPH1 **Client Sample ID** (70-130) (70-130) Lab Sample ID 890-1382-A-1-K MS Matrix Spike 118 115 890-1382-A-1-L MSD Matrix Spike Duplicate 118 113 890-1392-1 SS03 122 107 LCS 880-9312/2-A Lab Control Sample 92 90 LCSD 880-9312/3-A Lab Control Sample Dup 101 101 MB 880-9312/1-A Method Blank 115 133 S1+

#### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

Project/Site: Tiger CS

Client: WSP USA Inc.

#### Method: 8021B - Volatile Organic Compounds (GC)

Lab Sample ID: MB 880-897	5/3-A								Chefit 38	ample ID: Met		
Matrix: Solid										Prep Type		
Analysis Batch: 9324										Prep B	atch	: 897
		MB MB										
Analyte		ult Qualifier	RL		Unit		D		repared	Analyzed		Dil Fa
Benzene	<0.001	198 U	0.00198		mg/K	g		10/1	1/21 11:00	10/12/21 19:5	3	
Toluene	<0.001	198 U	0.00198		mg/K	g		10/1	1/21 11:00	10/12/21 19:5	.3	
Ethylbenzene	< 0.001	198 U	0.00198		mg/K	g		10/1	1/21 11:00	10/12/21 19:5	3	
m-Xylene & p-Xylene	<0.003	397 U	0.00397		mg/K	g		10/1	1/21 11:00	10/12/21 19:5	3	
o-Xylene	<0.001	198 U	0.00198		mg/K	g		10/1	1/21 11:00	10/12/21 19:5	3	
Xylenes, Total	<0.003	397 U	0.00397		mg/K	g		10/1	1/21 11:00	10/12/21 19:5	.3	
		MB MB										
Surrogate	%Recov	ery Qualifier	Limits					PI	repared	Analyzed		Dil Fac
4-Bromofluorobenzene (Surr)		113	70 - 130					10/1	1/21 11:00	10/12/21 19:5	:3	
1,4-Difluorobenzene (Surr)	1	109	70 - 130					10/1	1/21 11:00	10/12/21 19:5	3	
Lab Sample ID: LCS 880-89	75/1-A						C	lient	Sample	ID: Lab Cont		
Matrix: Solid										Prep Type	e: To	tal/NA
Analysis Batch: 9324										Prep B	atch	: 897
			Spike	LCS	LCS					%Rec.		
Analyte			Added	Result	Qualifier	Unit		D	%Rec	Limits		
Benzene			0.100	0.08714		mg/Kg		_	87	70 - 130		
Toluene			0.100	0.1017		mg/Kg			102	70 - 130		
Ethylbenzene			0.100	0.1005		mg/Kg			100	70 - 130		
m-Xylene & p-Xylene			0.200	0.1713		mg/Kg			86	70 - 130		
o-Xylene			0.100	0.08029		mg/Kg			80	70 - 130		
	LCS I	LCS										
Surrogate	%Recovery	Qualifier	Limits									
4-Bromofluorobenzene (Surr)	96		70 - 130									
1,4-Difluorobenzene (Surr)	101		70 - 130									
Lab Sample ID: LCSD 880-8	975/2-A					Cli	ient	Sam	ple ID: L	ab Control Sa	ampl	e Dup
Matrix: Solid										Prep Type	e: To	tal/NA
Analysis Batch: 9324										Prep B	atch	: 8975
			Spike	LCSD	LCSD					%Rec.		RPD
Analyte			Added	Result	Qualifier	Unit		D	%Rec	Limits	RPD	Limi
Benzene			0.100	0.08186		mg/Kg		_	82	70 - 130	6	35
Toluene			0.100	0.09746		mg/Kg			97	70 - 130	4	35
Ethylbenzene			0.100	0.08894		mg/Kg			89	70 - 130	12	35
m-Xylene & p-Xylene			0.200	0.1547		mg/Kg			77	70 <sub>-</sub> 130	10	35
o-Xylene			0.100	0.07544		mg/Kg			75	70 - 130	6	35
	LCSD I	LCSD										
Surrogate	%Recovery		Limits									
4-Bromofluorobenzene (Surr)	82		70 - 130									
1,4-Difluorobenzene (Surr)	93		70 - 130									
Lab Sample ID: 890-1390-A-	1-B MSD						Clier	nt Sa	mnla ID.	Matrix Spike	ייים ב	olicate
Matrix: Solid							Suel		inpie iD.			
										Prep Type		
Analysis Batch: 9324	<b>•</b> • •	S	0 11		MOR					Prep B	atch	
	Sample S	-	Spike		MSD			_	~ -	%Rec.		RPD
Analyte	Result (	Jualifier	Added	Result	Qualifier	Unit		D	%Rec	Limits	RPD	Lim

Analysis Datch. 5524									110	p Daten	. 03/3
	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	<0.00199	U F1	0.100	0.06752	F1	mg/Kg		68	70 - 130	28	35
Toluene	<0.00199	U F1	0.100	0.08128		mg/Kg		81	70 - 130	21	35

Client: WSP USA Inc. Project/Site: Tiger CS

Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 890-1390-A-1	I-B MSD					CI	lient Sa	ample IC	): Matrix Sp	pike Dup	olicate
Matrix: Solid									Prep 1	Гуре: То	tal/NA
Analysis Batch: 9324									Pre	p Batch	: 8975
	Sample	Sample	Spike	MSD	MSD				%Rec.		RPD
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Ethylbenzene	<0.00199	U F1	0.100	0.07810		mg/Kg		78	70 - 130	14	35
m-Xylene & p-Xylene	<0.00398	U F1	0.200	0.1340	F1	mg/Kg		67	70 - 130	16	35
o-Xylene	<0.00199	U F1	0.100	0.06389	F1	mg/Kg		64	70 _ 130	14	35
	MSD	MSD									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	90		70 - 130								
1,4-Difluorobenzene (Surr)	96		70 - 130								
_ Lab Sample ID: 890-1390-A-1	I-F MS							Client	Sample ID	: Matrix	Snike
Matrix: Solid								•		Гуре: То	
Analysis Batch: 9324										p Batch	
	Sample	Sample	Spike	MS	MS				%Rec.	p Buton	
Analyte	•	Qualifier	Added		Qualifier	Unit	D	%Rec	Limits		
Benzene	<0.00199	U F1	0.100	0.05117	F1	mg/Kg		51	70 - 130		
Toluene	<0.00199	U F1	0.100	0.06554	F1	mg/Kg		65	70 - 130		
Ethylbenzene	<0.00199	U F1	0.100	0.06790	F1	mg/Kg		68	70 - 130		
m-Xylene & p-Xylene	<0.00398	U F1	0.201	0.1146	F1	mg/Kg		57	70 - 130		
o-Xylene	<0.00199	U F1	0.100	0.05541	F1	mg/Kg		55	70 - 130		
	MS	MS									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	74		70 - 130								

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC)

89

Lab Sample ID: MB 880-9312/1-A Matrix: Solid Analysis Batch: 9261						Client Sa	mple ID: Metho Prep Type: 1 Prep Bato	Total/NA
	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
(GRO)-C6-C10								
Diesel Range Organics (Over	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
C10-C28)								
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
	МВ	MB						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
1-Chlorooctane	115		70 - 130			10/12/21 14:04	10/12/21 20:01	1
o-Terphenyl	133	S1+	70 - 130			10/12/21 14:04	10/12/21 20:01	1
Lab Sample ID: LCS 880-9312/2-A Matrix: Solid					c	lient Sample I	D: Lab Control Prep Type: ⊺	

70 - 130

#### Analysis Batch: 9261

1,4-Difluorobenzene (Surr)

	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	1102		mg/Kg		110	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	973.2		mg/Kg		97	70 _ 130	
C10-C28)								

Prep Batch: 9312

Page 239 of 331

Job ID: 890-1392-1

SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger CS

#### Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: LCS 880-93 Matrix: Solid	12/2-A						Client	Sample	D: Lab Co		
Analysis Batch: 9261										ype: Tot p Batch:	
Analysis Balch. 9201									Fre	p batch	. 931
	LCS	LCS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	92		70 - 130								
o-Terphenyl	90		70 - 130								
Lab Sample ID: LCSD 880-9	312/3-A					Clie	nt Sam	nple ID:	Lab Contro	I Sample	e Du
Matrix: Solid										ype: Tot	
Analysis Batch: 9261										p Batch:	
,			Spike	LCSD	LCSD				%Rec.		RP
Analyte			Added		Qualifier	Unit	D	%Rec	Limits	RPD	Lin
Gasoline Range Organics			1000	1032		mg/Kg		103	70 - 130	7	2
(GRO)-C6-C10									10 100		-
Diesel Range Organics (Over			1000	984.4		mg/Kg		98	70 - 130	1	2
C10-C28)											
	1000	LCSD									
Surrogate	%Recovery		Limits								
1-Chlorooctane		Quaimer	70 - 130								
o-Terphenyl	101		70 - 130								
Lab Sample ID: 890-1382-A	-1-K MS							Client	Sample ID	: Matrix	Spil
Matrix: Solid										ype: Tot	
Analysis Batch: 9261										p Batch:	
	Sample	Sample	Spike	MS	MS				%Rec.	p Daton.	
Analyte		Qualifier	Added		Qualifier	Unit	D	%Rec	Limits		
Gasoline Range Organics	<49.9		997	1314		mg/Kg		132	70 - 130		
(GRO)-C6-C10											
Diesel Range Organics (Over	124		997	1290		mg/Kg		117	70 - 130		
C10-C28)											
	MS	MS									
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane			70 - 130								
o-Terphenyl	115		70 - 130								
Lab Sample ID: 890-1382-A	-1-L MSD					CI	ient Sa	ample IL	): Matrix Sp		
Matrix: Solid										ype: Tot	
Analysis Batch: 9261										p Batch:	
	-	Sample	Spike		MSD				%Rec.		RF
Analyte		Qualifier	Added		Qualifier	Unit	D	%Rec	Limits	RPD	Lin
Gasoline Range Organics (GRO)-C6-C10	<49.9	U F1	1000	1419	F1	mg/Kg		142	70 - 130	8	2
. ,	124		1000	1297		mg/Kg		117	70 - 130	1	2
Diesel Range Organics (Over						- •					
<b>e e</b> (											
<b>e e</b> (	MSD	MSD									
Diesel Range Organics (Over C10-C28) Surrogate	MSD %Recovery		Limits								
C10-C28)			Limits								

Client: WSP USA Inc.

Project/Site: Tiger CS

#### **QC Sample Results**

Job ID: 890-1392-1
SDG: 31403236.022.0129

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-9210/1-A											Client S	Sample ID:		
Matrix: Solid												Prep	Type: S	oluble
Analysis Batch: 9307														
			MB											
Analyte			Qualifier		RL		Uni		<u>D</u>	Р	repared	Analy		Dil Fac
Chloride	<	<5.00	U		5.00		mg/	Kg				10/12/21	13:31	1
									CI	ient	Sample	D: Lab C	ontrol S	ample
Matrix: Solid												Prep	Type: S	oluble
Analysis Batch: 9307														
				Spike		LCS	LCS					%Rec.		
Analyte				Added	F	Result	Qualifier	Unit		D	%Rec	Limits		
Chloride				250		242.3		mg/Kg		_	97	90 _ 110		
- Lab Sample ID: LCSD 880-9210/3-	Α							CI	ient \$	Sam	ple ID:	Lab Contro	ol Sampl	le Dup
Matrix: Solid											· · · ·		Type: S	
Analysis Batch: 9307														
				Spike		LCSD	LCSD					%Rec.		RPD
Analyte				Added	F	Result	Qualifier	Unit		D	%Rec	Limits	RPD	Limit
Chloride				250		243.5		mg/Kg		_	97	90 - 110	0	20
- Lab Sample ID: 880-7011-A-11-E N	IS										Client	Sample ID	): Matrix	Spike
Matrix: Solid												Prep	Type: S	oluble
Analysis Batch: 9307														
	Sample	Samp	le	Spike		MS	MS					%Rec.		
Analyte	Result		fier	Added		Result		Unit		D	%Rec	Limits		
Chloride	58.4	F1		495		339.1	F1	mg/Kg			57	90 _ 110		
- Lab Sample ID: 880-7011-A-11-F N	ISD								Clien	it Sa	ample IC	): Matrix S	pike Dur	olicate
Matrix: Solid											•		Type: S	
Analysis Batch: 9307														
	Sample	Samp	le	Spike		MSD	MSD					%Rec.		RPD
Analyte	Result	Qualif	fier	Added	F	Result	Qualifier	Unit		D	%Rec	Limits	RPD	Limit

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

Method Blank

Matrix Spike

SS03

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

Method Blank

Matrix Spike

SS03

**Client Sample ID** 

SS03

#### **QC** Association Summary

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Prep Type

Total/NA

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

Matrix

Solid

Client: WSP USA Inc. Project/Site: Tiger CS

Prep Batch: 8975 Lab Sample ID

MB 880-8975/5-A

LCS 880-8975/1-A

LCSD 880-8975/2-A

890-1390-A-1-F MS

Lab Sample ID

MB 880-8975/5-A

LCS 880-8975/1-A

LCSD 880-8975/2-A

890-1390-A-1-B MSD

Analysis Batch: 9366

890-1390-A-1-F MS

890-1392-1

890-1390-A-1-B MSD

Analysis Batch: 9324

**GC VOA** 

890-1392-1

Prep Batch

Prep Batch

8975

8975

8975

8975

8975

8975

Prep Batch

#### Job ID: 890-1392-1 SDG: 31403236.022.0129

Method

5035

5035

5035

5035

5035

5035

Method

8021B

8021B

8021B

8021B

8021B

8021B

Method

Total BTEX

GC Semi VOA

Lab Sample ID

890-1392-1

#### Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1392-1	SS03	Total/NA	Solid	8015B NM	9312
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015B NM	9312
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9312

#### Prep Batch: 9312

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1392-1	SS03	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	
Analysis Batch: 9387					
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1392-1	SS03	Total/NA	Solid	8015 NM	

#### HPLC/IC

#### Leach Batch: 9210

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1392-1	SS03	Soluble	Solid	DI Leach	
MB 880-9210/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9210/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9210/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Job ID: 890-1392-1 SDG: 31403236.022.0129

#### HPLC/IC (Continued)

880-7011-A-11-E MS

880-7011-A-11-F MSD

Matrix Spike

Matrix Spike Duplicate

#### Leach Batch: 9210 (Continued)

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
880-7011-A-11-E MS	Matrix Spike	Soluble	Solid	DI Leach	
880-7011-A-11-F MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	
and the in Details 0207					
Analysis Batch: 9307					
Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
Lab Sample ID	Client Sample ID SS03	Prep Type Soluble	Matrix Solid	Method 300.0	Prep Batch 9210
Lab Sample ID					
890-1392-1	SS03	Soluble	Solid	300.0	9210

Soluble

Soluble

Solid

Solid

300.0

300.0

4 5 6

8

9210

9210

9

#### Lab Chronicle

Client: WSP USA Inc. Project/Site: Tiger CS

#### **Client Sample ID: SS03** Date Collected: 10/08/21 12:12

Job ID: 890-1392-1
SDG: 31403236.022.0129

#### Lab Sample ID: 890-1392-1 Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
NA	Prep	5035			8975	10/11/21 11:00	KL	XEN MID
A	Analysis	8021B		1	9324	10/12/21 20:56	KL	XEN MID
IA	Analysis	Total BTEX		1	9366	10/13/21 08:57	KL	XEN MID
A	Analysis	8015 NM		1	9387	10/13/21 15:09	AJ	XEN MID
	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
4	Analysis	8015B NM		1	9261	10/13/21 02:39	AJ	XEN MID
1	Leach	DI Leach			9210	10/11/21 12:29	СН	XEN MID
	Analysis	300.0		1	9307	10/12/21 16:30	СН	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

Page 244 of 331

		Accreditation/C	ertification Summary		
Client: WSP USA Inc. Project/Site: Tiger CS				Job ID: 890-1392-1 SDG: 31403236.022.0129	2
Laboratory: Eurofi Unless otherwise noted, all a		Ind / were covered under each acc	reditation/certification below.		
Authority		Program	Identification Number	Expiration Date	
Texas		NELAP	T104704400-21-22	06-30-22	5
The following analytes the agency does not of	· · · · · · · · · · · · · · · · · · ·	t, but the laboratory is not certif	ied by the governing authority. This list ma	ay include analytes for which	5
Analysis Method	Prep Method	Matrix	Analyte		
8015 NM		Solid	Total TPH		
Total BTEX		Solid	Total BTEX		
					8
					9
					10
					11
					13
					14

Eurofins Xenco, Carlsbad

.

#### **Method Summary**

Client: WSP USA Inc. Project/Site: Tiger CS

Job ID: 890-1392-1 SDG: 31403236.022.0129

Method	Method Description	Protocol	Laboratory
3021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Fotal BTEX	Total BTEX Calculation	TAL SOP	XEN MID
3015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
3015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
3015NM Prep	Microextraction	SW846	XEN MID
OI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### Protocol References:

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

5	
8	
9	
11	
13	

#### **Sample Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1392-1 SDG: 31403236.022.0129

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth	
890-1392-1	SS03	Solid	10/08/21 12:12	10/08/21 15:50	0.5	4
						5
						8
						9
						12
						13

)				Chain	Chain of Custody		Work Order No:	er No:	
×	XMZCO		Houston,TX (281) 240-4: Midland,TX (432-704-5	200 Dallas,TX (214) (440) EL Paso,TX (9	Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-333 Midland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)794-1296	110) 509-3334 06)794-1296			
			575-392-7550) Phoenix	,AZ (480-355-0900)	Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (813-620-2000)	Tampa,FL (813-620-2000)	www.xenco.com	.com "age	
Project Manager: K	Kalei Jennings		Bill to: (if different)	nt) Adrian Baker	ker		Work Or	Work Order Comments	
	WSP USA		Company Name:	me: XTO		Program:	Program: UST/PST	RP rownfields RC	Derfund
	3300 North A Street Bldg 1, Unit 222	t Bldg 1, Unit 222	Address:	3104 E Green Strret	een Strret	State	State of Project:		
te ZIP:	Midland, Texas 79705	05	City, State ZIP:	P: Carlsbad, NM 88220	NM 88220	Reporting:Level II	evel III		
	817-683-2503		Email: <u>kalei.jenninc</u>	ts@wsp.com, pa	Email: <u>kalei.jennings@wsp.com, payton.benner@wsp.com</u>	Deliverables: EDD		ADaPT D Other:	
Project Name: T	Tiger CS		Turn Around		ANALYSIS	YSIS REQUEST	-	Work O	Work Order Notes
er:		31403236.022.0129	Routine					CC:2027031001	01
P.O. Number:			Rush: 2 DAY				-		
Sampler's Name: P	Payton Benner		Due Date:					NAPP2123231376	1376
SAMPLE RECEIPT	PT Temp Blank:	(Yes No	Wet Ice: Yes No						
Temperature (°C):	2.4 /2.2	(	Thermometer ID	ners		A 2002 Chain of Clustody			
Received Intact:	es r		POD-WN	;)	300.0	090-1002 011011 01	-		
Cooler Custody Seals:	Yes No	Total Containers:		801				TAT starts the c lab, if received	TAT starts the day received by the lab, if received by 4:30pm
Sample Identification	ication	Dat	Time Depth	umber PH (EP	nloride			Sample	Sample Comments
6000	0	-	19-19 O J	× 1	-			Di	Discrete
					┝				
Total 200.7 / 6010	10 200.8 / 6020:	: 8RCRA	13PPM Tex	Al Sb As	Be B Cd Ca	Cu Fe Pb Mg	K Se Ag	SiO2 Na Sr TI Sn U V Zn	J V Zn
	Clicle Melliod(S) and Melai(S) to be analyzed								
Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliate of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed.	cument and relinquishm ble only for the cost of s ge of \$75.00 will be applic	ent of samples constitutes amples and shall not assur ed to each project and a ch	a valid purchase order from ne any responsibility for a arge of \$5 for each sample	m client company to ) ny losses or expense ) submitted to Xenco,	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractors. It essigns standard terms and conditions of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the control of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.	actors. It assigns standard te osses are due to circumstance: vill be enforced unless previou:	rms and conditions s beyond the control sly negotiated.		
Relinquished by: (Signature)	(Signature)	Received by: (Signature)	Signature)	Date/Time	he Relinquishe	Relinquished by: (Signature)	Received by: (Signature)	ynature)	Date/Time
" Jupern	2V	lue info		12-8-01	1550 2				
σ					6			Revise	Revised Date 051418 Rev 2018 1

#### Received by OCD: 11/5/2021 12:00:19 PM



Eurofins X	
enco,	
Carls	5
sbad	
	8
	9

## **Chain of Custody Record**

13

Company		Date/1 ime:				C	X A D	Keceived by		any	Compa			<	
Company		Date/Time:			/	A	K	Cecema		Mill	No.	11-3(	10122	Detromistion by Cloc Cuf 10.11.2	Delinguia
		1ipment:	Method of Shipment						Time	IT	,	Date	Ĺ	inquished by	Empty
				Requirements	_	Special Instructions/QC	structio	sial Ins	Spec			ile Rank. 2	Primary Deliverable Rank. 2	ii iii iv, Other (specity)	Deilvei
			Disposal By Lab	Disp		Return To Client	urn To	Retu							Uncon
1 month	ined longer than	may be assessed if samples are retained longer	ssed if sam	he asse	e may	Sample Disposal ( A fee	isposi	ble D	Sam					Possible Hazard Identification	Possit
ratory does not currently prought to Eurofins Xenco LLC	yf-custody If the labor ion status should be br	ded under chain-c nges to accreditat	pment is forwari vided Any char	sample shir will be prov	es. This t tructions	iboratori other ins	ntract la atory or	t subco C labora LC.	pon ou nco LL(	compliance u 9 Eurofins Xei to Eurofins X	e & accreditation , hipped back to the said complicance	method analyte ples must be sh ody attesting to s	aces the ownership of ing analyzed the sam signed Chain of Cust	Note Since laboratory accreditations are subject to change Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody if the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/lests/matrix being analyzed the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC.	Note Sir maintain attention
	Rinufand I														
						<b> </b>									
	<u>kanttan P</u>														
	177 - 8 2010-1-1-2 2														
								<u> </u>					 		
	<u></u>														
	<u> </u>														
					×	×	×	××		Solid		12 12 Mountain	10/8/21	SS03 (890-1392-1)	SS03 (
								100.00	Х	Code: X	Preservation Code:	Card Star	X		
Special Instructions/Note:		Total Numbe			Total_BTEX_C	8021B/5035FP	300_ORGFM_	8015MOD_NM 8015MOD_Ca	Perform MS	Matrix (W=water S=solid, O=waste/oll, BT=Tissue, A=Air)	Sample M Type (w (C=comp, o=w G=grab) вт=ть	Sample (C Time G	Sample Date	Sample Identification - Client ID (Lab ID)	Sampl
	r or co Other				SCV					I Samp	_		SSOW#:		0
W pH 4-5 Z other (specify)	L EDA					NOD) B	LEACH	A_S_Pr		le (Ye			Project # <sup>.</sup> 89000004		Tiger CS
	<u>د</u> ;					TEX	Chlori	ep (MO 		s or No			WO #		Email
	F - MeOH G Amchlor H Ascorbic Acid	y Juni.					de	D) Full		) )			PO #:	04-5440(Tel)	Phone: 432-70
Q Na2O4S Q Na2SO3								TPH	S.S.,	29.4				Zip 79701	State Zip TX, 79701
N None O AsNaO2	B - NaOH C Zn Acetate											s).	TAT Requested (days)		City <sup>-</sup> Midland
	Preservation Codes		sted	ysis Requested		Anal							Due Date Requested 10/13/2021	V Florida Ave	1211 V
	Job #: 890-1392-1			ŝ	<sup>e)</sup> P - Texas	Accreditations Required (See note) NELAP - Louisiana NELAP	siana	ions Re - Loui	ELAP	ZA				s Xenco	Eurofins
	Page Page 1 of 1		State of Origin New Mexico	Stat		et.com	Irofins	sr@et	krame	E-Mail jessica kramer@eurofinset.com			Phone:	y/Receiving	Shippi
	COC No <sup>-</sup> 890-456 1	)(S)	Carrier Tracking No(s)	Can				lica	Jess	Lab PM Kramer Jessica			Sampler	ormation (Sub Contract Lab)	Clien
Allerica										,				5-988-3199 Fax 575-988-3199	Phone
	se eurorins							ġ.	ŝ	dy Re	Chain of Custody Record	hain of	с С	1089 N Canal St Carlsbad NM 88220	1089 N Carlshad
-														UIUIIIS AEILU, CAIISDAU	

Relinquished by

Custody Seals Intact: ∆ Yes ∆ No

Custody Seal No

Date/Time

Company

Received by

Date/Time

Company

Ver 06/08/2021

Cooler Temperature(s) °C and Other Remarks

Job Number: 890-1392-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Carlsbad

#### Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1392 List Number: 1 Creator: Clifton, Cloe

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	

N/A

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

14

#### Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1392 List Number: 2 Creator: Lowe, Katie

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	True	

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

14

Job Number: 890-1392-1 SDG Number: 31403236.022.0129

List Creation: 10/12/21 11:44 AM

List Source: Eurofins Xenco, Midland

Received by OCD: 11/5/2021 12:00:19 PM

### 🔅 eurofins

#### Environment Testing America

#### **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

#### Laboratory Job ID: 890-1390-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS Revision: 1

#### For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/25/2021 2:35:01 PM

Jessica Kramer, Project Manager (432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access Have a Question? Ask-The Expert

Visit us at: <u>www.eurofinsus.com/Env</u> Released to Imaging: 3/14/2022 1:38:16 PM

Page 252 of 331

#### **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	6
QC Sample Results	7
QC Association Summary	
Lab Chronicle	13
Certification Summary	14
Method Summary	15
Sample Summary	16
Chain of Custody	17
Receipt Checklists	19

.
Page 253 of 331

3

Job ID: 890-1390-1 SDG: 31403236.022.0129

## Qualifiers

GC VOA		
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
U	Indicates the analyte was analyzed for but not detected.	5
GC Semi VC	Α	
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	
HPLC/IC		8
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	9
U	Indicates the analyte was analyzed for but not detected.	
Glossary		
Abbreviation	These commonly used abbreviations may or may not be present in this report.	
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis	
%R	Percent Recovery	
CFL	Contains Free Liquid	
CFU	Colony Forming Unit	4.6
CNF	Contains No Free Liquid	
DER	Duplicate Error Ratio (normalized absolute difference)	
Dil Fac	Dilution Factor	

### Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

### Job ID: 890-1390-1

### Laboratory: Eurofins Xenco, Carlsbad

Narrative

Job Narrative 890-1390-1

### **REVISION**

The report being provided is a revision of the original report sent on 10/13/2021. The report (revision 1) is being revised due to Per client email, changed sample ID from SS05 to SS04.

Report revision history

### Receipt

The sample was received on 10/8/2021 3:50 PM. Unless otherwise noted below, the sample arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

### GC VOA

Method 8021B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-8975 and analytical batch 880-9324 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

### HPLC/IC

Method 300\_ORGFM\_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-9210 and analytical batch 880-9307 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

RL

Unit

D

Prepared

Job ID: 890-1390-1 SDG: 31403236.022.0129

Analyzed

## Project/Site: Tiger CS **Client Sample ID: SS04**

### D D

S

Analyte

Client: WSP USA Inc.

Lab	Sam	ple	ID:	890-1	390

Matrix: Solic

890-1 Solid	
	5
Dil Fac 1 1	
1	
1	8
Dil Fac	9
1 1	
Dil Fac	
1	
Dil Fac	13
1	

ate Collected:	10/08/21	12:31
Date Received:	10/08/21	15:50
Sample Depth:	0.5	

Method: 8021B - Volatile Organic Compounds (GC)

Result Qualifier

Chloride	54.7		4.98	mg/Kg			10/12/21 16:19	1
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Method: 300.0 - Anions, Ion	Chromatogra	nhy - Solu	ible					
o-Terphenyl	120		70 - 130			10/12/21 14:04	10/13/21 01:57	1
1-Chlorooctane	105		70 - 130			10/12/21 14:04	10/13/21 01:57	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/13/21 01:57	
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/13/21 01:57	
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/13/21 01:57	
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Method: 8015B NM - Diesel	• •		· · ·					
Total TPH	<50.0	U	50.0	mg/Kg		·	10/13/21 15:09	
Method: 8015 NM - Diesel Ra Analyte		s (DRO) (O Qualifier	BC) RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00398	U	0.00398	mg/Kg			10/13/21 08:57	1
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fa
Method: Total BTEX - Total I								
1,4-Difluorobenzene (Surr)	81		70 - 130			10/11/21 11:00	10/12/21 20:15	
4-Bromofluorobenzene (Surr)	101		70 - 130			10/11/21 11:00	10/12/21 20:15	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fa
Xylenes, Total	<0.00398	U F1	0.00398	mg/Kg		10/11/21 11:00	10/12/21 20:15	
o-Xylene	<0.00199	U F1	0.00199	mg/Kg		10/11/21 11:00	10/12/21 20:15	
m-Xylene & p-Xylene	<0.00398	U F1	0.00398	mg/Kg		10/11/21 11:00	10/12/21 20:15	1
Ethylbenzene	<0.00199	U F1	0.00199	mg/Kg		10/11/21 11:00	10/12/21 20:15	1
Toluene	<0.00199	U F1	0.00199	mg/Kg		10/11/21 11:00	10/12/21 20:15	1
Benzene								

10/25/2021 (Rev. 1)

## **Surrogate Summary**

Client: WSP USA Inc. Project/Site: Tiger CS

Job ID: 890-1390-1 SDG: 31403236.022.0129

### Method: 8021B - Volatile Organic Compounds (GC) Matrix: Solid

			Percent Surrogate Recovery (Acceptance Limits)						
		BFB1	DFBZ1						
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		5				
890-1390-1	SS04	101	81						
890-1390-1 MS	SS04	74	89		6				
890-1390-1 MSD	SS04	90	96						
LCS 880-8975/1-A	Lab Control Sample	96	101						
LCSD 880-8975/2-A	Lab Control Sample Dup	82	93						
MB 880-8975/5-A	Method Blank	113	109		8				
Surrogate Legend									

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

### Method: 8015B NM - Diesel Range Organics (DRO) (GC) Matrix: Solid

Matrix: Solid				Prep Type: Total/NA	
			Percent Sur	rogate Recovery (Acceptance Limits)	
		1CO1	OTPH1		
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		
890-1382-A-1-K MS	Matrix Spike	118	115		13
890-1382-A-1-L MSD	Matrix Spike Duplicate	118	113		
890-1390-1	SS04	105	120		
LCS 880-9312/2-A	Lab Control Sample	92	90		
LCSD 880-9312/3-A	Lab Control Sample Dup	101	101		
MB 880-9312/1-A	Method Blank	115	133 S1+		

### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Prep Type: Total/NA

Page 256 of 331

Prep Type: Total/NA

**Prep Type: Total/NA** 

Prep Type: Total/NA

Prep Batch: 8975

**Client Sample ID: Method Blank** 

**Client Sample ID: Lab Control Sample** 

**Client Sample ID: Lab Control Sample Dup** 

Project/Site: Tiger CS

Client: WSP USA Inc.

## Method: 8021B - Volatile Organic Compounds (GC)

### Lab Sample ID: MB 880-8975/5-A Matrix: Solid Analysis Batch: 9324

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00198	U	0.00198	mg/Kg		10/11/21 11:00	10/12/21 19:53	1
Toluene	<0.00198	U	0.00198	mg/Kg		10/11/21 11:00	10/12/21 19:53	1
Ethylbenzene	<0.00198	U	0.00198	mg/Kg		10/11/21 11:00	10/12/21 19:53	1
m-Xylene & p-Xylene	<0.00397	U	0.00397	mg/Kg		10/11/21 11:00	10/12/21 19:53	1
o-Xylene	<0.00198	U	0.00198	mg/Kg		10/11/21 11:00	10/12/21 19:53	1
Xylenes, Total	<0.00397	U	0.00397	mg/Kg		10/11/21 11:00	10/12/21 19:53	1
	MB	MB						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	113		70 - 130			10/11/21 11:00	10/12/21 19:53	1
1,4-Difluorobenzene (Surr)	109		70 - 130			10/11/21 11:00	10/12/21 19:53	1

### Lab Sample ID: LCS 880-8975/1-A Matrix: Solid Analysis Batch: 9324

Analysis Batch: 9324							Prep	Batch: 8975
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	0.100	0.08714		mg/Kg		87	70 - 130	
Toluene	0.100	0.1017		mg/Kg		102	70 - 130	
Ethylbenzene	0.100	0.1005		mg/Kg		100	70 - 130	
m-Xylene & p-Xylene	0.200	0.1713		mg/Kg		86	70 - 130	
o-Xylene	0.100	0.08029		mg/Kg		80	70 - 130	

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	96		70 - 130
1,4-Difluorobenzene (Surr)	101		70 - 130

### Lab Sample ID: LCSD 880-8975/2-A Matrix: Solid

### Analysis Batch: 9324

Analysis Batch: 9324						Prep Batch: 897			
	Spike	LCSD	LCSD				%Rec.		RPD
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	0.100	0.08186		mg/Kg		82	70 - 130	6	35
Toluene	0.100	0.09746		mg/Kg		97	70 - 130	4	35
Ethylbenzene	0.100	0.08894		mg/Kg		89	70 - 130	12	35
m-Xylene & p-Xylene	0.200	0.1547		mg/Kg		77	70 - 130	10	35
o-Xylene	0.100	0.07544		mg/Kg		75	70 - 130	6	35

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	82		70 - 130
1,4-Difluorobenzene (Surr)	93		70 - 130

### Lab Sample ID: 890-1390-1 MS Matrix: Solid

Analy	vsis	Batc	h:	9324
	,			

Analysis Batch: 9324									Prep Batch: 8975
	Sample	Sample	Spike	MS	MS				%Rec.
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits
Benzene	<0.00199	U F1	0.100	0.05117	F1	mg/Kg		51	70 - 130
Toluene	<0.00199	U F1	0.100	0.06554	F1	mg/Kg		65	70 - 130

Eurofins Xenco, Carlsbad

**Client Sample ID: SS04** 

**Prep Type: Total/NA** 

### Released to Imaging: 3/14/2022 1:38:16 PM

Client: WSP USA Inc.

Project/Site: Tiger CS

Job ID: 890-1390-1 SDG: 31403236.022.0129

## Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 890-1390 Matrix: Solid Analysis Batch: 9324	0-1 MS							C	lient Sam Prep Ty Prep	-	al/NA
-	Sample	Sample	Spike	MS	MS				%Rec.		
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Ethylbenzene	< 0.00199	U F1	0.100	0.06790	F1	mg/Kg		68	70 - 130		
m-Xylene & p-Xylene	<0.00398	U F1	0.201	0.1146	F1	mg/Kg		57	70 - 130		
o-Xylene	<0.00199	U F1	0.100	0.05541	F1	mg/Kg		55	70 - 130		
	MS	MS									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	74		70 - 130								
1,4-Difluorobenzene (Surr)	89		70 - 130								
Matrix: Solid Analysis Batch: 9324										Batch:	8975
	Sample	Sample	Spike	-	MSD				%Rec.		RPD
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	<0.00199	U F1	0.100	0.06752	F1	mg/Kg		68	70 - 130	28	35
Toluene	<0.00199	U F1	0.100	0.08128		mg/Kg		81	70 - 130	21	35
Ethylbenzene	<0.00199	U F1	0.100	0.07810		mg/Kg		78	70 - 130	14	35
m-Xylene & p-Xylene	<0.00398	U F1	0.200	0.1340	F1	mg/Kg		67	70 - 130	16	35
o-Xylene	<0.00199	U F1	0.100	0.06389	F1	mg/Kg		64	70 - 130	14	35
	MSD	MSD									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	90		70 - 130								
1,4-Difluorobenzene (Surr)	96		70 - 130								

## Method: 8015B NM - Diesel Range Organics (DRO) (GC)

### Lab Sample ID: MB 880-9312/1-A Matrix: Solid Analysis Batch: 9261

	МВ	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
	MB							
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac

Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	115		70 - 130
o-Terphenyl	133	S1+	70 - 130

### Lab Sample ID: LCS 880-9312/2-A Matrix: Solid Analysis Batch: 9261

Analysis Batch: 9261							Prep	Batch: 9312
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	1102		mg/Kg		110	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	973.2		mg/Kg		97	70 - 130	
C10-C28)								

Eurofins Xenco, Carlsbad

Prep Type: Total/NA

**Client Sample ID: Method Blank** 

10/12/21 14:04 10/12/21 20:01

10/12/21 14:04 10/12/21 20:01

**Client Sample ID: Lab Control Sample** 

Prep Type: Total/NA

Prep Batch: 9312

1

1

Job ID: 890-1390-1 SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger CS

## Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: LCS 880-	9312/2-4					Clier	it Sar	nnle ID	: Lab Con	trol Sa	mnlo
Matrix: Solid	·3312/2-A					Cilei	n Sai		Prep Ty		
Analysis Batch: 9261										Batch:	
									. Top	Batom	
	LCS										
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	92		70 - 130								
o-Terphenyl	90		70 - 130								
Lab Sample ID: LCSD 88	0-9312/3-A				с	lient Sa	mple	ID: Lab	Control	Sample	) Dup
Matrix: Solid							-		Prep Ty		
Analysis Batch: 9261										Batch:	
-			Spike	LCSD	LCSD				%Rec.		RPD
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics (GRO)-C6-C10			1000	1032		mg/Kg		103	70 - 130	7	20
Diesel Range Organics (Over C10-C28)			1000	984.4		mg/Kg		98	70 - 130	1	20
,	LCSD	1000									
C	%Recovery		Limito								
Surrogate 1-Chlorooctane		Quaimer	<u>Limits</u> 70 - 130								
	101		70 - 130 70 - 130								
Lab Sample ID: 890-1382 Matrix: Solid	2-A-1-K MS						CI	ient Sa			al/NA
o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261	2-A-1-K MS Sample	Sample	Spike		MS		CI		Prep Ty Prep %Rec.	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte	-A-1-K MS Sample Result	Qualifier	Spike Added	Result	Qualifier	Unit	CI	%Rec	Prep Ty Prep %Rec. Limits	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10	2-A-1-K MS Sample Result <49.9	Qualifier	Spike Added 997	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	-A-1-K MS Sample Result	Qualifier	Spike Added	Result	Qualifier			%Rec	Prep Ty Prep %Rec. Limits	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	<b>Sample</b> <b>Result</b> 	Qualifier	Spike Added 997	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate	-A-1-K MS Sample Result <49.9 124 MS %Recovery	Qualifier U F1 -	Spike Added 997 997 Limits	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate	-A-1-K MS Sample Result <49.9 124 MS %Recovery	Qualifier U F1 -	Spike Added 997 997 Limits	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314	Qualifier	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Typ           Prep           %Rec.           Limits           70 - 130           70 - 130	pe: Tota Batch:	al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314	Qualifier	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130	pe: Tota Batch:	al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314	Qualifier	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	pe: Tota Batch:	al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314 1290	Qualifier	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	pe: Tota Batch: 	al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample	Qualifier U F1 MS Qualifier	Spike           Added           997           997           997           2007           0007	Result           1314           1290           MSD	Qualifier F1	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	pe: Tota Batch: 	al/NA 9312  licate al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample	Qualifier U F1 MS Qualifier Sample Qualifier	Spike           Added           997           997           997	Result           1314           1290           MSD	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S	D_	<u>%Rec</u> 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	ke Dupl pe: Tota Batch:	al/NA 9312 licate al/NA 9312 RPD
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte	-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 C-A-1-L MSD Sample Result	Qualifier U F1 MS Qualifier Sample Qualifier	Spike           Added           997           997	Result 1314 1290 MSD Result	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit	D_	<u>%Rec</u> 132 117 Ie ID: N	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130	ce Dupl pe: Tota pe: Tota Batch: 	licate al/NA 9312 licate al/NA 9312 RPD Limit
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample Result <49.9 124 MSD	Qualifier U F1 MS Qualifier Qualifier U F1 MSD	Spike           Added           997           997	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	D_	<u>%Rec</u> 132 117 Ie ID: N <u>%Rec</u> 142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ce Dupl pe: Tota Batch: Batch: <u>RPD</u> 8	licate al/NA 9312 licate al/NA 9312 RPD Limit 20
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample Result <49.9 124	Qualifier U F1 MS Qualifier Qualifier U F1 MSD	Spike           Added           997           997	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	D_	<u>%Rec</u> 132 117 Ie ID: N <u>%Rec</u> 142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ce Dupl pe: Tota Batch: Batch: <u>RPD</u> 8	licate al/NA 9312 licate al/NA 9312 RPD Limit 20
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analysis Batch: 9261 Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample Result <49.9 124 MSD	Qualifier U F1 MS Qualifier Qualifier U F1 MSD	Spike           Added           997           997           997           1000           1000	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	D_	<u>%Rec</u> 132 117 Ie ID: N <u>%Rec</u> 142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ce Dupl pe: Tota Batch: Batch: <u>RPD</u> 8	licate al/NA 9312 licate al/NA 9312 RPD Limit 20

Eurofins Xenco, Carlsbad

## **QC Sample Results**

Job ID: 890-1390-1 SDG: 31403236.022.0129

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-9210/1	- <b>A</b>						С	lient Sam			
Matrix: Solid									Prep T	ype: So	oluble
Analysis Batch: 9307											
		MB MB									
Analyte		sult Qualifier		RL	Unit		<u>D</u>	Prepared	Analy		Dil Fac
Chloride	<5	5.00 U		5.00	mg/l	Kg			10/12/21	13:31	1
Lab Sample ID: LCS 880-9210/	2-A					Clie	ent S	ample ID	: Lab Cor	ntrol Sa	ample
Matrix: Solid									Prep T	ype: So	oluble
Analysis Batch: 9307											
			Spike	LC	S LCS				%Rec.		
Analyte			Added	Resu	t Qualifier	Unit	I	D %Rec	Limits		
Chloride			250	242.	3	mg/Kg		97	90 - 110		
Lab Sample ID: LCSD 880-921	0/3-A					Client Sa	amp	le ID: Lab	Control	Sample	e Dup
Matrix: Solid									Prep T		
Analysis Batch: 9307										,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
			Spike	LCS	LCSD				%Rec.		RPD
Analyte			Added	Resu	t Qualifier	Unit	I	D %Rec	Limits	RPD	Limit
Chloride			250	243.	5	mg/Kg		97	90 - 110	0	20
Lab Sample ID: 880-7011-A-11	-E MS						(	Client Sa	mple ID:	Matrix	Spike
Matrix: Solid									Prep T		
Analysis Batch: 9307											
	Sample	Sample	Spike	Μ	6 MS				%Rec.		
Analyte	Result	Qualifier	Added	Resu	t Qualifier	Unit	I	D %Rec	Limits		
Chloride	58.4	F1	495	339.	1 F1	mg/Kg		57	90 - 110		
Lab Sample ID: 880-7011-A-11	-F MSD					Client	Sam	nple ID: N	latrix Spi	ke Dup	licate
Matrix: Solid									Prep T		
Analysis Batch: 9307											
-	Sample	Sample	Spike	MS	MSD				%Rec.		RPD
Analyte	Result	Qualifier	Added	Resu	t Qualifier	Unit	I	D %Rec	Limits	RPD	Limit
Chloride	58.4		495	321.		mg/Kg		53	90 - 110	6	20

**QC** Association Summary

Client: WSP USA Inc. Project/Site: Tiger CS

### **GC VOA**

### Prep Batch: 8975

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	
890-1390-1	SS04	Total/NA	Solid	5035	
MB 880-8975/5-A	Method Blank	Total/NA	Solid	5035	
LCS 880-8975/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-8975/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
890-1390-1 MS	SS04	Total/NA	Solid	5035	
890-1390-1 MSD	SS04	Total/NA	Solid	5035	

### Analysis Batch: 9324

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	
890-1390-1	SS04	Total/NA	Solid	8021B	8975	
MB 880-8975/5-A	Method Blank	Total/NA	Solid	8021B	8975	
LCS 880-8975/1-A	Lab Control Sample	Total/NA	Solid	8021B	8975	
LCSD 880-8975/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	8975	
890-1390-1 MS	SS04	Total/NA	Solid	8021B	8975	
890-1390-1 MSD	SS04	Total/NA	Solid	8021B	8975	
Analysis Batch: 936	6					
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	4

Total/NA

Solid

## GC Semi VOA

SS04

890-1390-1

### Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1390-1	SS04	Total/NA	Solid	8015B NM	9312
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015B NM	9312
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9312

### Prep Batch: 9312

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1390-1	SS04	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1390-1	SS04	Total/NA	Solid	8015 NM	

### HPLC/IC

### Leach Batch: 9210

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1390-1	SS04	Soluble	Solid	DI Leach	
MB 880-9210/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9210/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9210/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Eurofins Xenco, Carlsbad

Page 261 of 331

Prep Batch

### Job ID: 890-1390-1 SDG: 31403236.022.0129

Total BTEX

## HPLC/IC (Continued)

### Leach Batch: 9210 (Continued)

880-7011-A-11-E MS Matrix Spike	Prep Type Soluble	Matrix Solid	Method DI Leach	Prep Batch
880-7011-A-11-F MSD Matrix Spike Duplicate	Soluble	Solid	DI Leach	

### Analysis Batch: 9307

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1390-1	SS04	Soluble	Solid	300.0	9210
MB 880-9210/1-A	Method Blank	Soluble	Solid	300.0	9210
LCS 880-9210/2-A	Lab Control Sample	Soluble	Solid	300.0	9210
LCSD 880-9210/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9210
880-7011-A-11-E MS	Matrix Spike	Soluble	Solid	300.0	9210
880-7011-A-11-F MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9210

Page 262 of 331

5

Job ID: 890-1390-1 SDG: 31403236.022.0129

Eurofins Xenco, Carlsbad

### Client Sample ID: SS04 Date Collected: 10/08/21 12:31 Date Received: 10/08/21 15:50

Job ID: 890-1390-1 SDG: 31403236.022.0129

### Lab Sample ID: 890-1390-1 Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
otal/NA	Prep	5035			8975	10/11/21 11:00	KL	XEN MID
īotal/NA	Analysis	8021B		1	9324	10/12/21 20:15	KL	XEN MID
fotal/NA	Analysis	Total BTEX		1	9366	10/13/21 08:57	KL	XEN MID
fotal/NA	Analysis	8015 NM		1	9387	10/13/21 15:09	AJ	XEN MID
otal/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
otal/NA	Analysis	8015B NM		1	9261	10/13/21 01:57	AJ	XEN MID
Soluble	Leach	DI Leach			9210	10/11/21 12:29	СН	XEN MID
oluble	Analysis	300.0		1	9307	10/12/21 16:19	СН	XEN MID

### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

**Released to Imaging: 3/14/2022 1:38:16 PM** 

**Accreditation/Certification Summary** 

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1390-1 SDG: 31403236.022.0129

Page 264 of 331

### Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

thority Program Identification Numb		ogram	Identification Number	Expiration Date
exas	NE	ELAP	T104704400-21-22	06-30-22
The following analytes	are included in this reno	rt but the laboratory is r	not certified by the governing authority.	This list may include analytes for which
the agency does not o	•		for continee by the governing dutionty.	
0,	•	Matrix	Analyte	
the agency does not o	offer certification.	•		

Eurofins Xenco, Carlsbad

Job ID: 890-1390-1 SDG: 31403236.022.0129

Page 265 of 331

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

### **Protocol References:**

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Sample Summary

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1390-1 SDG: 31403236.022.0129

Page 266 of 331

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
890-1390-1	SS04	Solid	10/08/21 12:31	10/08/21 15:50	0.5

Revised Date 051418 Rev. 2018			σ				J
			4			(	3 /
			2211550 2	10-8	lup (1)41		minnoull
Received by: (Signature) Date/Time	Received t	Relinquished by: (Signature)	Date/Time	e)	Received by: (Signature)	(Signature)	Relinquished by: (Signature)
<u>o</u> ø	s. It assigns standard terms and conditions are due to circumstances beyond the control enforced unless previously negotiated.	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the contro of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.	t company to Xenco, its aff es or expenses incurred b tted to Xenco, but not anal-	chase order from clien ponsibility for any loss or each sample subm	amples constitutes a valid pui and shall not assume any res ich project and a charge of S5	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractor: of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be	Notice: Signature of this do of service. Xenco will be li of Xenco. A minimum char
Ag SiO2 Na Sr TI Sn U V Zn 1631/245.1/7470 /7471 : Hg	Ag TI U	B Cd Ca Cr Co Cu Fe Pb Mg Cd Cr Co Cu Pb Mn Mo Ni Se	Al Sb As Ba Be B A Sb As Ba Be Cc	ACRA 13PPM Texas 11 A	8RCRA 13PPM lyzed TCLP / SPLP 6	otal 200.7 / 6010 200.8 / 6020: Circle Method(s) and Metal(s) to be analyzed	Total 200.7 / 6010 Circle Method(s) a
Discrete			x x x	0.5' 1	10/8/2021 12:31	S	SS05
Sample Comments			TPH (E BTEX ( Chlorid	Depth	Date Time Sampled Sampled	Matrix	Sample Identification
lab, if received by 4:30pm			EPA	er of	Total Containers:		Sample Custody Seals:
TAT starts the day recevied by the	_		0=80	Ň	Correction Factor:	<u> </u> []	Cooler Custody Seals:
	ustody	890-1390 Chain of Custody	_	4	TWW-00-	Yes No	Received Intact:
				NO NO	The weilde.	1 2 4 / 3 7	
				-11		1	
NAPP2123231376				ate:	Due Date:	Payton Benner	ne:
	_			2DAY	Rush: 2		P.O. Number:
CC:2027031001				e	Ro	31403236.022.0129	Project Number:
Work Order Notes		ANALYSIS REQUEST		Turn Around	Tu	Tiger CS	Project Name:
ADaPT Other:	Deliverables: EDD		Email: kalei.jennings@wsp.com, payton.benner@wsp.com	kalei.jennings@v	Email:	817-683-2503	
	Reporting:Level II evel III		Carlsbad, NM 88220	City, State ZIP:		Midland, Texas 79705	e ZIP:
	State of Project:		3104 E Green Strret	Address:		3300 North A Street Bldg 1, Unit 222	
TRP Trownfields TRC Tperfund		Proj	XTO	Company Name:		WSP USA	
Work Order Comments			Adrian Baker	Bill to: (if different)		Kalei Jennings	Project Manager:
<u>www.xenco.com</u> <sup>2</sup> age1_ of1_		Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tampa,FL (813-620-2000)	30-355-0900) Atlanta,GA	550) Phoenix, AZ (4	Hobbs,NM (575-392-		
		Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-3334 Midland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)794-1296	allas,TX (214) 902-0300 EL Paso,TX (915)585-34	'X (281) 240-4200 С ТХ (432-704-5440)	Houston, Midland		×
Work Order No:	Work	istody	Chain of Custody	0			

## Received by OCD: 11/5/2021 12:00:19 PM

### 10/25/2021 (Rev. 1)

Page 267 of 331

## Received by OCD: 11/5/2021 12:00:19 PM

Phone 575-988-3199 Fax 575-988-3199	Sampler															
Shipping/Receiving				jessica.kramer@eurofinset.com	(ramer@	eurofir	iset co	ä			New Mexico	lexic				Page 1 of 1
Lumpany Eurofins Xenco				Acc	Accreditations Required (See note) NELAP - Louisiana, NELAP	Require	d (See n a, NEL	AP -	<sub>e)</sub> . P - Texas							Job #: 890-1390-1
Address 1211 W Florida Ave, ,	Due Date Requested 10/13/2021	ă					⊾	Analysis Requested	sis	εq.	leste	ă١				Preservation Codes
City Midland	TAT Requested (days)	iys)		2.55	63							<sup>1</sup>			<b>I</b> R	m632
State Zp: TX, 79701	1				трн				-							D Nitric Acid E NaHSO4
Phone 432-704-5440(Tel)	PO#				) Full											ı ۳
Email	WO #:			or No	5210000000000										7 18	044703065
Project Name	Project # <sup>.</sup>			Yes		<u></u>										12.25-21
Tiger CS	89000004			le ()	1000100	EA										
Site	SSOW#			Samp				ev.							of	of col Other
			Sample Type	Matrix (w-water	m MS/N OD_NM/8	OD_Calc	RGFM_28	BTEX_GO							Vices barr	Vumber
Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	<u> </u>	A _				Total_i							Tatal	1013
	N		- <b>30</b> -1	metters	1.5.60				2000 2000		100					A
SS05 (890-1390-1)	10/8/21	12 31 Mountain		Solid	×	X	××	×							Cat Maria	4
																duante
															pro-man	L.S.S
															, , ,	-destand
																<u>ليها</u>
											-+					43
																١
																<u> Erres</u> t d
Note: Since laboratory accreditations are subject to change Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed, the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC.	places the ownership or being analyzed, the sa he signed Chain of Cus	of method anali Imples must be stody attesting to	yte & accreditatic shipped back to to o said complicant	n compliance up he Eurofins Xen be to Eurofins Xe	on out sut co LLC lat	oratory o	laborat pr other	ories. instruc	This sa tions w	mple s ill be p	hipme rovide	ntisfo d Any	change	1 under s to ac	chain-c creditat	of-custe ion sta
Possible Hazard Identification					Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)	Dispo	sal ( /	fee	may	)e as	sess	ed if	samp	es ar	e reta	ined
Deliverable Requested I II III IV Other (specify)	Primary Deliverable Rank. 2	able Rank. 2			Special Instructions/QC	al Instructions/QC	tions/C		Requirements	ment	ints.	ву	Lap		A	Archive For
Empty Kit Relinquished by		Date		Time:	ne:				1		2	ethod	Method of Shipment:	nent		
	Date/Times	11/2	Com	NV RIPO	_	Received by:	拼	/			Ļ		Date	Date/Time		
Relinquished by	Date/Time	L L	   Cor	Company	Received	Neg Ber	$\uparrow$						Date	Date/Time:		
Relinquished by	Date/Time:		Co	Company	Rece	Received by							Date	Date/Time:		
ody Seals					Cool	Cooler Temperature(s) °C and Other Remarks:	erature(	s) °C a	nd Oth	er Rem	arks:		┢			
Δ Tes Δ NO					╞											

Job Number: 890-1390-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Carlsbad

## Login Sample Receipt Checklist

Client: WSP USA Inc.

### Login Number: 1390 List Number: 1 Creator: Clifton, Cloe

<6mm (1/4").

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	N/A	

14

## Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1390 List Number: 2 Creator: Lowe, Katie Job Number: 890-1390-1 SDG Number: 31403236.022.0129

Oursetters	•	0
Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	

Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

## Environment Testing America

## **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

## Laboratory Job ID: 890-1389-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS Revision: 1

## For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/25/2021 2:32:05 PM

Jessica Kramer, Project Manager (432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access **Have a Question?** Ask-The Expert

www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Visit us at:

Page 272 of 331

## **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	6
QC Sample Results	7
QC Association Summary	
Lab Chronicle	13
Certification Summary	14
Method Summary	15
Sample Summary	16
Chain of Custody	17
Receipt Checklists	19

.

Page 273 of 331

3

5

12 13

Job ID: 890-1389-1 SDG: 31403236.022.0129

## Qualifiers

Qualifier Description	
Surrogate recovery exceeds control limits, high biased.	
Indicates the analyte was analyzed for but not detected.	
A	
Qualifier Description	
MS and/or MSD recovery exceeds control limits.	
Surrogate recovery exceeds control limits, high biased.	
Indicates the analyte was analyzed for but not detected.	
Qualifier Description	
MS and/or MSD recovery exceeds control limits.	
Indicates the analyte was analyzed for but not detected.	
)	Indicates the analyte was analyzed for but not detected.

#### Abbreviation These commonly used abbreviations may or may not be present in this report. Listed under the "D" column to designate that the result is reported on a dry weight basis ¤ %R Percent Recovery CFL **Contains Free Liquid** Colony Forming Unit CFU CNF Contains No Free Liquid DER Duplicate Error Ratio (normalized absolute difference) Dil Fac **Dilution Factor** DL Detection Limit (DoD/DOE) DL, RA, RE, IN Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample DLC Decision Level Concentration (Radiochemistry) EDL Estimated Detection Limit (Dioxin) LOD Limit of Detection (DoD/DOE) Limit of Quantitation (DoD/DOE) LOQ EPA recommended "Maximum Contaminant Level" MCL MDA Minimum Detectable Activity (Radiochemistry) MDC Minimum Detectable Concentration (Radiochemistry) MDL Method Detection Limit ML Minimum Level (Dioxin) MPN Most Probable Number MQL Method Quantitation Limit NC Not Calculated ND Not Detected at the reporting limit (or MDL or EDL if shown) NEG Negative / Absent POS Positive / Present Practical Quantitation Limit PQL PRES Presumptive QC **Quality Control** RER Relative Error Ratio (Radiochemistry) RL Reporting Limit or Requested Limit (Radiochemistry) RPD Relative Percent Difference, a measure of the relative difference between two points TEF Toxicity Equivalent Factor (Dioxin) TEQ Toxicity Equivalent Quotient (Dioxin) TNTC Too Numerous To Count

Eurofins Xenco, Carlsbad

Job ID: 890-1389-1 SDG: 31403236.022.0129

Page 274 of 331

### Job ID: 890-1389-1

### Laboratory: Eurofins Xenco, Carlsbad

Narrative

Job Narrative 890-1389-1

### REVISION

The report being provided is a revision of the original report sent on 10/13/2021. The report (revision 1) is being revised due to Per client email, changed sample ID from SS06 to SS05.

Report revision history

### Receipt

The sample was received on 10/8/2021 3:50 PM. Unless otherwise noted below, the sample arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

### GC VOA

Method 8021B: Surrogate recovery for the following sample was outside control limits: (890-1382-A-1-I). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

### HPLC/IC

Method 300\_ORGFM\_28D: The matrix spike / matrix spike duplicate (MS/MSD) recoveries and precision for preparation batch 880-9210 and analytical batch 880-9307 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample / laboratory sample control duplicate (LCS/LCSD) precision was within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Job ID: 890-1389-1 SDG: 31403236.022.0129

## **Client Sample ID: SS05** Date Collected: 10/08/21 12:25

Method: 8021B - Volatile Organic Compounds (GC)

Date Received: 10/08/21 15:50 Sample Depth: 0.5

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab Sample ID: 890-1389-1

Matrix: Solid

Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00201	U	0.00201	mg/Kg		10/11/21 16:18	10/12/21 20:46	1
Toluene	<0.00201	U	0.00201	mg/Kg		10/11/21 16:18	10/12/21 20:46	1
Ethylbenzene	<0.00201	U	0.00201	mg/Kg		10/11/21 16:18	10/12/21 20:46	1
m-Xylene & p-Xylene	<0.00402	U	0.00402	mg/Kg		10/11/21 16:18	10/12/21 20:46	1
o-Xylene	<0.00201	U	0.00201	mg/Kg		10/11/21 16:18	10/12/21 20:46	1
Xylenes, Total	<0.00402	U	0.00402	mg/Kg		10/11/21 16:18	10/12/21 20:46	1
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	142	S1+	70 - 130			10/11/21 16:18	10/12/21 20:46	1
1,4-Difluorobenzene (Surr)	78		70 - 130			10/11/21 16:18	10/12/21 20:46	1
Method: Total BTEX - Total B	<b>FEX</b> Calcula	tion						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Total BTEX	<0.00402	U	0.00402	mg/Kg			10/12/21 10:57	1
Method: 8015 NM - Diesel Rar Analyte		<mark>s (DRO) (0</mark> Qualifier	GC) RL	Unit	D	Prepared	Analyzed	Dil Fac
	58.6		49.9	mg/Kg			10/13/21 15:17	1
Total TPH	00.0		10.0	ing/itg				
-				mg/rtg			10/10/21 10111	
: Method: 8015B NM - Diesel Ra	ange Organ		(GC)		р	Prepared		Dil Fac
Method: 8015B NM - Diesel R Analyte Gasoline Range Organics	ange Organ	Qualifier		Unit mg/Kg	D	Prepared 10/12/21 14:04	Analyzed	Dil Fac
Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	ange Organ Result	Qualifier	(GC) RL	Unit	<u>D</u>	10/12/21 14:04	Analyzed	
Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10	ange Organ Result <49.9	Qualifier U	(GC) 	Unit mg/Kg	<u>D</u>	10/12/21 14:04 10/12/21 14:04	Analyzed 10/13/21 01:36	1
Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	ange Organ Result <49.9 58.6	Qualifier U	(GC) <u>RL</u> 49.9 49.9	Unit mg/Kg mg/Kg	<u>D</u>	10/12/21 14:04 10/12/21 14:04	Analyzed 10/13/21 01:36 10/13/21 01:36	1
Method: 8015B NM - Diesel R Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Oll Range Organics (Over C28-C36)	ange Organ Result <49.9 58.6 <49.9	Qualifier U	(GC) <u>RL</u> 49.9 49.9 49.9	Unit mg/Kg mg/Kg	D	10/12/21 14:04 10/12/21 14:04 10/12/21 14:04	Analyzed 10/13/21 01:36 10/13/21 01:36 10/13/21 01:36 Analyzed	1 1 1

Method: 300.0 - Anions, Ion Chromatography - Soluble											
Analyte	Result Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac				
Chloride	29.4	4.99	mg/Kg			10/12/21 16:13	1				

Released to Imaging: 3/14/2022 1:38:16 PM

## **Surrogate Summary**

Client: WSP USA Inc. Project/Site: Tiger CS

Job ID: 890-1389-1 SDG: 31403236.022.0129

## Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

			Per	cent Surrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1		
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		5
890-1382-A-1-G MS	Matrix Spike	119	77		
890-1382-A-1-H MSD	Matrix Spike Duplicate	118	88		6
890-1389-1	SS05	142 S1+	78		
LCS 880-8942/1-A	Lab Control Sample	112	88		
LCSD 880-8942/2-A	Lab Control Sample Dup	116	76		
MB 880-8942/5-B	Method Blank	112	79		8
<b>•</b> • • •					0
Surrogate Legend					

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

### Method: 8015B NM - Diesel Range Organics (DRO) (GC) Matrix: Solid

Matrix: Solid		•			Prep Type: Total/NA	
			Percent Sur	rogate Recovery (Acceptance	Limits)	
		1CO1	OTPH1			
Lab Sample ID	Client Sample ID	(70-130)	(70-130)			
890-1382-A-1-K MS	Matrix Spike	118	115			13
890-1382-A-1-L MSD	Matrix Spike Duplicate	118	113			
890-1389-1	SS05	106	120			
LCS 880-9312/2-A	Lab Control Sample	92	90			
LCSD 880-9312/3-A	Lab Control Sample Dup	101	101			
MB 880-9312/1-A	Method Blank	115	133 S1+			

### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Prep Type: Total/NA

Page 276 of 331

Client: WSP USA Inc.

## **QC Sample Results**

Prep Type: Total/NA

Prep Type: Total/NA Prep Batch: 8942

Prep Type: Total/NA

Prep Batch: 8942

**Client Sample ID: Method Blank** 

**Client Sample ID: Lab Control Sample** 

**Client Sample ID: Lab Control Sample Dup** 

Project/Site: Tiger CS

## Method: 8021B - Volatile Organic Compounds (GC)

### Lab Sample ID: MB 880-8942/5-B **Matrix: Solid Analysis Batch: 9282**

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	< 0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
m-Xylene & p-Xylene	<0.00400	U	0.00400	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Xylenes, Total	<0.00400	U	0.00400	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
	MB	MB						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	112		70 - 130			10/11/21 16:18	10/12/21 13:02	1
1,4-Difluorobenzene (Surr)	79		70 - 130			10/11/21 16:18	10/12/21 13:02	1

### Lab Sample ID: LCS 880-8942/1-A Matrix: Solid **Analysis Batch: 9282**

	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	0.100	0.09008		mg/Kg		90	70 - 130	
Toluene	0.100	0.09025		mg/Kg		90	70 - 130	
Ethylbenzene	0.100	0.09403		mg/Kg		94	70 - 130	
m-Xylene & p-Xylene	0.200	0.1959		mg/Kg		98	70 - 130	
o-Xylene	0.100	0.09732		mg/Kg		97	70 - 130	

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	112		70 - 130
1,4-Difluorobenzene (Surr)	88		70 - 130

### Lab Sample ID: LCSD 880-8942/2-A Matrix: Solid

### Analysis Batch: 9282

Analysis Batch: 9282							Prep	Batch:	
	Spike	LCSD	LCSD				%Rec.		RPD
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	0.100	0.08283		mg/Kg		83	70 - 130	8	35
Toluene	0.100	0.08609		mg/Kg		86	70 - 130	5	35
Ethylbenzene	0.100	0.09041		mg/Kg		90	70 - 130	4	35
m-Xylene & p-Xylene	0.200	0.1906		mg/Kg		95	70 - 130	3	35
o-Xylene	0.100	0.09563		mg/Kg		96	70 - 130	2	35

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	116		70 - 130
1,4-Difluorobenzene (Surr)	76		70 - 130

### Lab Sample ID: 890-1382-A-1-G MS Matrix: Solid

Matrix: Solid Analysis Batch: 9282									Prep Type: Total/NA Prep Batch: 8942
	Sample	Sample	Spike	MS	MS				%Rec.
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits
Benzene	<0.00199	U	0.0990	0.08900		mg/Kg		89	70 - 130
Toluene	<0.00199	U	0.0990	0.09358		mg/Kg		94	70 - 130

Eurofins Xenco, Carlsbad

**Client Sample ID: Matrix Spike** 

Client: WSP USA Inc.

Project/Site: Tiger CS

## **QC Sample Results**

Job ID: 890-1389-1 SDG: 31403236.022.0129

## Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 890-1382	-A-1-G MS						CI	ient Sa	mple ID:		
Matrix: Solid									Prep Ty	pe: Tot	al/N
Analysis Batch: 9282									Prep	Batch:	<b>894</b>
	Sample	Sample	Spike	MS	MS				%Rec.		
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits		
Ethylbenzene	0.0114		0.0990	0.1000		mg/Kg		90	70 - 130		
m-Xylene & p-Xylene	0.00511		0.198	0.2115		mg/Kg		104	70 - 130		
o-Xylene	0.0275		0.0990	0.1061		mg/Kg		79	70 - 130		
	MS	MS									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	119		70 - 130								
1,4-Difluorobenzene (Surr)	77		70 - 130								
Lab Sample ID: 890-1382						Client S	Samn	le ID: N	latrix Spil	ke Dun	licat
Matrix: Solid						unon c	Jamp		Prep Ty		
Analysis Batch: 9282										Batch:	
	Sample	Sample	Spike	MSD	MSD				%Rec.	Batom	RP
Analyte	-	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Lim
Benzene	<0.00199	U	0.0992	0.09504		mg/Kg		95	70 - 130	7	3
Toluene	<0.00199		0.0992	0.09440		mg/Kg		94	70 - 130	1	3
Ethylbenzene	0.0114		0.0992	0.09963		mg/Kg		89	70 - 130	0	3
m-Xylene & p-Xylene	0.00511		0.198	0.2082		mg/Kg		102	70 - 130	2	3
p-Xylene	0.0275		0.0992	0.1047		mg/Kg		78	70 - 130	1	3
	MSD	MSD									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	118		70 - 130								
1,4-Difluorobenzene (Surr)	88		70 - 130								
lethod: 8015B NM - [	Diesel Rang	ge Orgar	ics (DRO	) (GC)							
Lab Sample ID: MB 880-9	312/1-4						Cliv	ont San	nple ID: M	othod 5	Rlan
Matrix: Solid	JJ12/17A						Cile	ant Odli	Prep Ty		
Analysis Batch: 9261										Batch:	
		MR MR							rieh	Dattil.	331

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
	MB	МВ						

Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	115		70 - 130
o-Terphenyl	133	S1+	70 - 130

### Lab Sample ID: LCS 880-9312/2-A Matrix: Solid Analysis Batch: 9261

Analysis Batch: 9261							Prep	Batch: 9312
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	1102		mg/Kg		110	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	973.2		mg/Kg		97	70 - 130	
C10-C28)								

Eurofins Xenco, Carlsbad

Analyzed

Prep Type: Total/NA

10/12/21 14:04 10/12/21 20:01

10/12/21 14:04 10/12/21 20:01

**Client Sample ID: Lab Control Sample** 

Dil Fac

1

1

Prepared

5

Job ID: 890-1389-1 SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger CS

## Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Matrix: Solid Analysis Batch: 9261	12/2-A					Clier	nt Sai	nple ID	: Lab Cor Prep Ty		
										Batch:	
	105	LCS									
Surroacto	%Recovery		Limits								
Surrogate 1-Chlorooctane	92	Quanner	70 - 130								
	92 90		70 - 130 70 - 130								
o-Terphenyl	90		70 - 130								
Lab Sample ID: LCSD 880-9	)312/3-A				C	Client Sa	mple	ID: Lat	o Control	Sample	e Du
Matrix: Solid							÷.,		Prep Ty		
Analysis Batch: 9261										Batch:	
· ·····, · · · · · · · · · · · · · · ·			Spike	LCSD	LCSD				%Rec.		RP
Analyte			Added		Qualifier	Unit	D	%Rec	Limits	RPD	Lim
Gasoline Range Organics			1000	1032		mg/Kg		103	70 - 130	7	2
(GRO)-C6-C10						5. 5					
Diesel Range Organics (Over			1000	984.4		mg/Kg		98	70 - 130	1	2
C10-C28)											
	LCSD	LCSD									
Surrogate	%Recovery		Limits								
1-Chlorooctane	101	quanto	70 - 130								
o-Terphenyl	101		70 - 130								
	Sample	Sample	Spike	MS	MS				%Rec.		
Analyte		Qualifier	Added		Qualifier	Unit	D	%Rec	Limits		
Gasoline Range Organics	<49.9	U F1	997	1314	F1	mg/Kg		132	70 - 130		
(GRO)-C6-C10 Diesel Range Organics (Over	124		997	1290		mg/Kg		447			
	124		557	1250					70 130		
C10-C28)						iiig/itg		117	70 - 130		
C10-C28)	MS	MS				ingrig		117	70 - 130		
,		MS Qualifier	Limits			ing/itg		117	70 - 130		
Surrogate	%Recovery		Limits			mg/Ng		117	70 - 130		
Surrogate	%Recovery 118		70 - 130			ngng		117	70 - 130		
Surrogate	%Recovery					ing/tg		117	70 - 130		
Surrogate 1-Chlorooctane o-Terphenyl	%Recovery 118 115		70 - 130				Samp		70 - 130 Matrix Spil	ke Dup	licat
Surrogate 1-Chlorooctane	%Recovery 118 115		70 - 130				Samp				
1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A-	%Recovery 118 115		70 - 130				Samp		latrix Spil Prep Ty		al/N/
Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid	%Recovery 118 115 -1-L MSD		70 - 130	MSD	MSD		Samp		latrix Spil Prep Ty	pe: Tot	al/N/ 931
Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261	%Recovery 118 115 -1-L MSD Sample	Qualifier	70 - 130 70 - 130		MSD Qualifier		Samp		latrix Spil Prep Ty Prep	pe: Tot	al/N/ 931: RP
Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte	%Recovery 118 115 -1-L MSD Sample	Qualifier Sample Qualifier	70 - 130 70 - 130 Spike		Qualifier	Client S		le ID: N	Matrix Spil Prep Ty Prep %Rec.	pe: Tot Batch:	al/N/ 931 RPI Lim
Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10	%Recovery 118 115 -1-L MSD Sample Result <49.9	Qualifier Sample Qualifier	70 - 130 70 - 130 <b>Spike</b> Added 1000	<b>Result</b> 1419	Qualifier	Client S		le ID: N	Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot Batch: RPD 8	al/N/ 931: RPI Lim 2
Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	%Recovery 118 115 -1-L MSD Sample Result	Qualifier Sample Qualifier	70 - 130 70 - 130 Spike Added	Result	Qualifier	Client S		le ID: N %Rec	Matrix Spil Prep Ty Prep %Rec. Limits	pe: Tot Batch: 	al/N/ 931: RPI Lim 2
Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid	%Recovery 118 115 -1-L MSD Sample Result <49.9 124	Qualifier Sample Qualifier U F1	70 - 130 70 - 130 <b>Spike</b> Added 1000	<b>Result</b> 1419	Qualifier	Client S		le ID: N	Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot Batch: RPD 8	al/N/ 931 RPI Limi 2
Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	%Recovery 118 115 -1-L MSD Sample Result <49.9 124 MSD	Qualifier Sample Qualifier U F1	70 - 130 70 - 130 Spike Added 1000	<b>Result</b> 1419	Qualifier	Client S		le ID: N	Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot Batch: RPD 8	al/N/ 9312 RPI Limi
Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	%Recovery 118 115 -1-L MSD Sample Result <49.9 124	Qualifier Sample Qualifier U F1	70 - 130 70 - 130 <b>Spike</b> Added 1000	<b>Result</b> 1419	Qualifier	Client S		le ID: N	Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot Batch: RPD 8	al/N/

## **QC Sample Results**

Job ID: 890-1389-1 SDG: 31403236.022.0129

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-9210 Matrix: Solid	/1 <b>-A</b>							C	Clie	nt Sam	ple ID: M Prep T		
Analysis Batch: 9307												<b>,</b> ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
Analysis Baton. ooor		МВ МВ											
Analyte	Re	sult Qualifier		RL		Unit		D	Pr	epared	Analy	zed	Dil Fac
Chloride	<	5.00 U		5.00		mg/K	g				10/12/21	13:31	1
Lab Sample ID: LCS 880-921	0/2-A						Cli	ent S	San	nple ID	: Lab Cor	ntrol Sa	ample
Matrix: Solid											Prep T	ype: So	bluble
Analysis Batch: 9307													
			Spike		LCS	LCS					%Rec.		
Analyte			Added		Result	Qualifier	Unit		D	%Rec	Limits		
Chloride			250		242.3		mg/Kg		_	97	90 - 110		
Lab Sample ID: LCSD 880-92	10/3-A					(	Client S	amr	ole	ID: Lab	Control	Sample	e Dup
Matrix: Solid											Prep T		
Analysis Batch: 9307												,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	
			Spike		LCSD	LCSD					%Rec.		RPD
Analyte			Added		Result	Qualifier	Unit		D	%Rec	Limits	RPD	Limit
Chloride			250		243.5		mg/Kg		_	97	90 - 110	0	20
Lab Sample ID: 880-7011-A-1	1-E MS								Cli	ient Sa	mple ID:	Matrix	Spike
Matrix: Solid											Prep T		
Analysis Batch: 9307													
	Sample	Sample	Spike		MS	MS					%Rec.		
Analyte	Result	Qualifier	Added		Result	Qualifier	Unit		D	%Rec	Limits		
Chloride	58.4	F1	495		339.1	F1	mg/Kg		_	57	90 - 110		
Lab Sample ID: 880-7011-A-1	1-F MSD						Client	t Sar	np	le ID: M	atrix Spil	ke Dup	licate
Matrix: Solid											Prep T		
Analysis Batch: 9307													
-	Sample	Sample	Spike		MSD	MSD					%Rec.		RPD
Analyte	Result	Qualifier	Added		Result	Qualifier	Unit		D	%Rec	Limits	RPD	Limit
Chloride	58.4		495		321.0	= 4	mg/Kg		—	53	90 - 110	6	20

Released to Imaging: 3/14/2022 1:38:16 PM

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

**Client Sample ID** 

Method Blank

Matrix Spike

Method Blank

Matrix Spike

**SS05** 

**SS05** 

SS05

**QC** Association Summary

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Prep Type

Total/NA

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

Matrix

Solid

Solid

Solid

Client: WSP USA Inc. Project/Site: Tiger CS

### **GC VOA**

### Prep Batch: 8942

Lab Sample ID

MB 880-8942/5-B

LCS 880-8942/1-A

LCSD 880-8942/2-A

890-1382-A-1-G MS

890-1382-A-1-H MSD

Lab Sample ID

MB 880-8942/5-B

LCS 880-8942/1-A

LCSD 880-8942/2-A

890-1382-A-1-G MS

Lab Sample ID

GC Semi VOA

890-1389-1

890-1382-A-1-H MSD Analysis Batch: 9297

890-1389-1

Analysis Batch: 9282

890-1389-1

Job ID: 890
SDG: 31403236.0

Method

5035

5035

5035

5035

5035

5035

Method

8021B

8021B

8021B

Prep Batch

Prep Batch

8942

8942

8942

8942 8942

8942

0-1389-1 022.0129

5
8
9
13

Solid 8021B Solid 8021B Solid 8021B Matrix Method Prep Batch Solid Total BTEX

### Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1389-1	SS05	Total/NA	Solid	8015B NM	9312
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015B NM	9312
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9312

### Prep Batch: 9312

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1389-1	SS05	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1389-1	SS05	Total/NA	Solid	8015 NM	

### HPLC/IC

### Leach Batch: 9210

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1389-1	SS05	Soluble	Solid	DI Leach	
MB 880-9210/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9210/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9210/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Eurofins Xenco, Carlsbad

## HPLC/IC (Continued)

### Leach Batch: 9210 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	<b>Method</b>	Prep Batch
880-7011-A-11-E MS	Matrix Spike	Soluble	Solid	DI Leach	
880-7011-A-11-F MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	

### Analysis Batch: 9307

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1389-1	SS05	Soluble	Solid	300.0	9210
MB 880-9210/1-A	Method Blank	Soluble	Solid	300.0	9210
LCS 880-9210/2-A	Lab Control Sample	Soluble	Solid	300.0	9210
LCSD 880-9210/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9210
880-7011-A-11-E MS	Matrix Spike	Soluble	Solid	300.0	9210
880-7011-A-11-F MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9210

Page 282 of 331

5

Job ID: 890-1389-1 SDG: 31403236.022.0129

### Client Sample ID: SS05 Date Collected: 10/08/21 12:25 Date Received: 10/08/21 15:50

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab Sample	ID:	890-1389-1
		Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
Prep Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 20:46	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9387	10/13/21 15:17	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/13/21 01:36	AJ	XEN MID
Soluble	Leach	DI Leach			9210	10/11/21 12:29	СН	XEN MID
Soluble	Analysis	300.0		1	9307	10/12/21 16:13	СН	XEN MID

### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

**Accreditation/Certification Summary** 

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1389-1 SDG: 31403236.022.0129

### Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

uthority	Pro	ogram	Identification Number	Expiration Date
exas	NE	ELAP	T104704400-21-22	06-30-22
The following analytes	are included in this reno	rt but the laboratory is r	not certified by the governing authority.	This list may include analytes for which
the agency does not o	•	it, but the laboratory is i	for continee by the governing dutionty.	
0,	•	Matrix	Analyte	
the agency does not o	offer certification.	•		

 Page 284 of 331

 890-1389-1

 36.022.0129

 3

 4

 5

 s for which

 6

 7

 8

 9

 10

Eurofins Xenco, Carlsbad

Job ID: 890-1389-1 SDG: 31403236.022.0129

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

### **Protocol References:**

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Sample Summary

Client: WSP USA Inc. Project/Site: Tiger CS Page 286 of 331

Job ID: 890-1389-1 SDG: 31403236.022.0129

Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
890-1389-1	SS05	Solid	10/08/21 12:25	10/08/21 15:50	0.5

Page 287 of 331

## Received by OCD: 11/5/2021 12:00:19 PM

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad NM 88220 Phone 575-988-3199 Fax 575-988-3199	Ch	Chain of Custody Record	stody Re	cord					🔅 eurofins	Environment Testing America
Shipping/Receiving	Phone.		E-Mail jessica	E-Mail jessica.kramer@eurofinset.com	inset.com	State c	State of Origin New Mexico		Page Page 1 of 1	
Lurofins Xenco			7 >	Accreditations Required (See note): NELAP - Louisiana NELAP -	red (See note): na NELAP - Texas	exas			Job #: 890-1389-1	
Adress 1211 W Florida Ave	Due Date Requested 10/13/2021				Analysis	is Requested	ed		Preservation Codes	
City Midland	TAT Requested (days):		3 200	20.03-05-00				sheet 3	A - HCL B NaOH	M Hexane N None
State, Zip TX, 79701				1110				je je starije se	C Zn Acetate D - Nitric Acid E NaHSO4	O - AsNaO2 P Na2O4S O - Na2SO3
Phone 432-704-5440(Tel)	PO #·				•			to de add	F MeOH G Amchlor	R Na2S2C S H2SO4
Email	WO #·		Drivo	o)					H - Ascorbic Acid	T TSP Dodecahydrate
Project Name: Tioper C.S	Project #:			or N				iners	K EDTA	W pH 4-5
Site	SSOW#:			D (Ye				cont	Other:	
		Sample	Matrix	NM/80	FP_C			ber o		
	<u>ر</u>	Type Sample (C=comp.		form <b>N</b> 5MOD_ 5MOD_	_ORGF 1B/5038 al_BTE)			al Num		
oanipre Identification - cheft iD (Lab iD)	Sample Date	lime G=grab)	BT=Tissue, A=Air)	Pi 80	80			ر ۲۰	Special II	Special Instructions/Note:
SS06 (890-1389-1)	10/8/21 M	12 25 Mountain	Solid	××	× × ×		15-13 	-		
								(and )		
								# j. 1		
Note Since laboratory accreditations are subject to change Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed, the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC	places the ownership of m being analyzed, the sampl he signed Chain of Custod	nethod analyte & accre les must be shipped ba y attesting to said com	ditation compliance ack to the Eurofins X plicance to Eurofins	upon out subcontra enco LLC laboraton Xenco LLC	ct laboratories. Th / or other instructic	iis sample shipm ns will be provide	ent is forwarded under the second s	under chain-of-c to accreditatior	ustody If the labora status should be br	atory does not o ought to Eurofi
Possible Hazard Identification Unconfirmed				Sample Disp	le Disposal ( A fee m Beturn To Client	ay be assess	ed if sample	s are retain	Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)	1 month)
Deliverable Requested 1 II III IV, Other (specify)	Primary Deliverable Rank 2	Rank 2		Special Instructions/QC		Requirements	ints			WORLS
Empty Kit Relinquished by	Date	te	L	Time	1	_	Method of Shipment:	ent:		
Relinquished by Close Cont 10.11.21	Date/Time 10112121	11:30	Company	D Received	Ţ		Date/Time	Time		Company
	Date/Time: *		Compăny	Received by			Date/Time	Time <sup>.</sup>		Company
1	Date/Time:		Company	Received by			Date/Time:	Time:		Company
Custody Seals Intact ∆ Yes ∆ No				Cooler Temperature(s) °	Ő	and Other Remarks.				
										Ver 06/08/2021
Job Number: 890-1389-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Carlsbad

## Login Sample Receipt Checklist

Client: WSP USA Inc.

### Login Number: 1389 List Number: 1 **Creator: Clifton, Cloe**

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	N/A	

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

14

# Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1389 List Number: 2 Creator: Lowe, Katie Job Number: 890-1389-1 SDG Number: 31403236.022.0129

## List Source: Eurofins Xenco, Midland List Creation: 10/12/21 11:45 AM

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
s the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
omm (1/4").		

Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

# Environment Testing America

# **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

# Laboratory Job ID: 890-1388-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS Revision: 1

## For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/25/2021 2:28:19 PM

Jessica Kramer, Project Manager (432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access Have a Question? Ask-The Expert

www.eurofinsus.com/Env Released to Imaging: 3/14/2022 1:38:16 PM

Visit us at:

Page 292 of 331

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	6
QC Sample Results	7
QC Association Summary	11
Lab Chronicle	13
Certification Summary	14
Method Summary	15
Sample Summary	16
Chain of Custody	17
Receipt Checklists	19

.

Client: WSP USA Inc. Project/Site: Tiger CS Page 293 of 331

Job ID: 890-1388-1 SDG: 31403236.022.0129

#### -.....

Qualifiers		3
GC VOA		
Qualifier	Qualifier Description	4
U	Indicates the analyte was analyzed for but not detected.	
GC Semi VO		5
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	
HPLC/IC		
Qualifier	Qualifier Description	8
U	Indicates the analyte was analyzed for but not detected.	
Glossary		
Abbreviation	These commonly used abbreviations may or may not be present in this report.	1
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis	
%R	Percent Recovery	
CFL	Contains Free Liquid	
CFU	Colony Forming Unit	
CNF	Contains No Free Liquid	
DER	Duplicate Error Ratio (normalized absolute difference)	1
Dil Fac	Dilution Factor	
DL	Detection Limit (DoD/DOE)	
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample	
DLC	Decision Level Concentration (Radiochemistry)	
EDL	Estimated Detection Limit (Dioxin)	
LOD	Limit of Detection (DoD/DOE)	
LOQ	Limit of Quantitation (DoD/DOE)	
MCL	EPA recommended "Maximum Contaminant Level"	
MDA	Minimum Detectable Activity (Radiochemistry)	
MDC	Minimum Detectable Concentration (Radiochemistry)	
MDL	Method Detection Limit	
ML	Minimum Level (Dioxin)	
MPN	Most Probable Number	
MQL	Method Quantitation Limit	
NC	Not Calculated	
ND	Not Detected at the reporting limit (or MDL or EDL if shown)	
NEG	Negative / Absent	
POS	Positive / Present	
PQL	Practical Quantitation Limit	
PRES	Presumptive	
QC	Quality Control	
RER	Relative Error Ratio (Radiochemistry)	
RL	Reporting Limit or Requested Limit (Radiochemistry)	

- Reporting Limit or Requested Limit (Radiochemistry) RL Relative Percent Difference, a measure of the relative difference between two points RPD
- TEF Toxicity Equivalent Factor (Dioxin)
- TEQ Toxicity Equivalent Quotient (Dioxin)
- TNTC Too Numerous To Count

## Job ID: 890-1388-1

### Laboratory: Eurofins Xenco, Carlsbad

Narrative

Job Narrative 890-1388-1

#### REVISION

The report being provided is a revision of the original report sent on 10/13/2021. The report (revision 1) is being revised due to Per client email, changed sample ID from SS07 to SS06.

Report revision history

#### Receipt

The sample was received on 10/8/2021 3:50 PM. Unless otherwise noted below, the sample arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

#### GC VOA

Method 8021B: Surrogate recovery for the following sample was outside control limits: (890-1382-A-1-I). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD\_NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD\_NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

RL

0.00198

0.00198

0.00198

0.00396

0.00198

0.00396

Limits

70 - 130

70 - 130

RL

RL

49.8

RL

49.8

49.8

49.8

RL

5.00

Limits

70 - 130

70 - 130

0.00396

Unit

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

mg/Kg

Unit

Unit

Unit

mg/Kg

mg/Kg

mg/Kg

Unit

mg/Kg

mg/Kg

mg/Kg

Job ID: 890-1388-1 SDG: 31403236.022.0129

## Project/Site: Tiger CS Client Sample ID: SS06

# Date Collected: 10/08/21 12:53 Dat

Sar

Analyte

Benzene

Toluene

o-Xylene

Surrogate

Analyte

Analyte

Analyte

C10-C28)

Surrogate

o-Terphenyl

Analyte

Chloride

1-Chlorooctane

(GRO)-C6-C10

Total TPH

Total BTEX

Ethylbenzene

Xylenes, Total

m-Xylene & p-Xylene

4-Bromofluorobenzene (Surr)

1,4-Difluorobenzene (Surr)

Gasoline Range Organics

**Diesel Range Organics (Over** 

Oll Range Organics (Over C28-C36)

Client: WSP USA Inc.

Lab	Sample	ID:	890-1388

Prepared

10/11/21 16:18

10/11/21 16:18

Prepared

10/11/21 16:18

10/11/21 16:18

Prepared

Prepared

Prepared

10/12/21 14:04

Prepared

Prepared

10/12/21 14:04 10/13/21 00:55

10/12/21 14:04 10/13/21 00:55

10/12/21 14:04 10/13/21 00:55

10/12/21 14:04 10/13/21 00:55

10/11/21 16:18 10/12/21 20:25

10/11/21 16:18 10/12/21 20:25

10/11/21 16:18 10/12/21 20:25

10/12/21 20:25

10/12/21 20:25

Analyzed

10/12/21 20:25

10/12/21 20:25

Analyzed

10/12/21 10:57

Analyzed

10/13/21 15:17

Analyzed

10/13/21 00:55

Analyzed

Analyzed

10/12/21 15:49

D

D

D

D

D

5

1

1

1

1

1

1

Dil Fac

8	
9	

1	
Dil Fac	
1	
Dil Fac	
1	

Dil Fac

1

1

1

Dil Fac

Dil Fac

le conecleu. 10/00/21 12.33	
te Received: 10/08/21 15:50	
mple Depth: 0.5	

Method: Total BTEX - Total BTEX Calculation

Method: 8015 NM - Diesel Range Organics (DRO) (GC)

Method: 8015B NM - Diesel Range Organics (DRO) (GC)

Method: 300.0 - Anions, Ion Chromatography - Soluble

Method: 8021B - Volatile Organic Compounds (GC)

**Result Qualifier** 

Qualifier

<0.00198 U

<0.00198 U

<0.00198 U

<0.00396 U

<0.00198 U

<0.00396 U

129

83

<0.00396 U

**Result Qualifier** 

**Result Qualifier** 

**Result Qualifier** 

<49.8 U

<49.8 U

<49.8 U

<49.8 U

%Recovery Qualifier

**Result Qualifier** 

110 126

83.1

%Recovery

Eurofins Xenco, Carlsbad

3-1 Matrix: Solid Dil Fac Analyzed 10/11/21 16:18 10/12/21 20:25

## **Surrogate Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1388-1 SDG: 31403236.022.0129

Page 296 of 331

# Method: 8021B - Volatile Organic Compounds (GC)

Matrix: Solid

			Percent Su	rrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1		
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		5
890-1382-A-1-G MS	Matrix Spike	119	77		
890-1382-A-1-H MSD	Matrix Spike Duplicate	118	88		6
890-1388-1	SS06	129	83		
LCS 880-8942/1-A	Lab Control Sample	112	88		
LCSD 880-8942/2-A	Lab Control Sample Dup	116	76		
MB 880-8942/5-B	Method Blank	112	79		9
					C
Surrogate Legend					0

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

## Method: 8015B NM - Diesel Range Organics (DRO) (GC) Matrix: Solid

-						
				Pe	ercent Surrogate Recovery (Acceptance Limits)	
			1CO1	OTPH1		
	Lab Sample ID	Client Sample ID	(70-130)	(70-130)		
	890-1382-A-1-K MS	Matrix Spike	118	115		13
	890-1382-A-1-L MSD	Matrix Spike Duplicate	118	113		
	890-1388-1	SS06	110	126		
	LCS 880-9312/2-A	Lab Control Sample	92	90		
	LCSD 880-9312/3-A	Lab Control Sample Dup	101	101		
	MB 880-9312/1-A	Method Blank	115	133 S1+		

#### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Prep Type: Total/NA

Prep Type: Total/NA

# **QC Sample Results**

Prep Type: Total/NA

**Prep Type: Total/NA** 

Prep Type: Total/NA

Prep Batch: 8942

**Client Sample ID: Method Blank** 

**Client Sample ID: Lab Control Sample** 

**Client Sample ID: Lab Control Sample Dup** 

Client: WSP USA Inc. Project/Site: Tiger CS

## Method: 8021B - Volatile Organic Compounds (GC)

### Lab Sample ID: MB 880-8942/5-B Matrix: Solid **Analysis Batch: 9282**

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
m-Xylene & p-Xylene	<0.00400	U	0.00400	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Xylenes, Total	<0.00400	U	0.00400	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
	MB	MB						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	112		70 - 130			10/11/21 16:18	10/12/21 13:02	1
1,4-Difluorobenzene (Surr)	79		70 - 130			10/11/21 16:18	10/12/21 13:02	1

#### Lab Sample ID: LCS 880-8942/1-A Matrix: Solid **Analysis Batch: 9282**

Analysis Batch: 9282							Prep	Batch: 8942
-	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	0.100	0.09008		mg/Kg		90	70 - 130	
Toluene	0.100	0.09025		mg/Kg		90	70 - 130	
Ethylbenzene	0.100	0.09403		mg/Kg		94	70 - 130	
m-Xylene & p-Xylene	0.200	0.1959		mg/Kg		98	70 - 130	
o-Xylene	0.100	0.09732		mg/Kg		97	70 - 130	

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	112		70 - 130
1,4-Difluorobenzene (Surr)	88		70 - 130

#### Lab Sample ID: LCSD 880-8942/2-A Matrix: Solid

### Analysis Batch: 9282

Analysis Batch: 9282							Prep	Batch:	
	Spike	LCSD	LCSD				%Rec.		RPD
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	0.100	0.08283		mg/Kg		83	70 - 130	8	35
Toluene	0.100	0.08609		mg/Kg		86	70 - 130	5	35
Ethylbenzene	0.100	0.09041		mg/Kg		90	70 - 130	4	35
m-Xylene & p-Xylene	0.200	0.1906		mg/Kg		95	70 - 130	3	35
o-Xylene	0.100	0.09563		mg/Kg		96	70 - 130	2	35

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	116		70 - 130
1,4-Difluorobenzene (Surr)	76		70 - 130

#### Lab Sample ID: 890-1382-A-1-G MS Matrix: Solid

Matrix: Solid Analysis Batch: 9282										pe: Total/NA Batch: 8942
	Sample	Sample	Spike	MS	MS				%Rec.	
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	<0.00199	U	0.0990	0.08900		mg/Kg		89	70 - 130	
Toluene	<0.00199	U	0.0990	0.09358		mg/Kg		94	70 - 130	

Eurofins Xenco, Carlsbad

**Client Sample ID: Matrix Spike** 

## Released to Imaging: 3/14/2022 1:38:16 PM

Client: WSP USA Inc.

Project/Site: Tiger CS

# **QC Sample Results**

Page 298 of 331

5 7

Job ID: 890-1388-1 SDG: 31403236.022.0129

# Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Lab Sample ID: 890-1382 Matrix: Solid	-A-1-G MS						C	lient Sa	mple ID: I Prep Ty	pe: Tot	al/N/
Analysis Batch: 9282										Batch:	8942
	-	Sample	Spike	_	MS				%Rec.		
Analyte		Qualifier	Added		Qualifier	Unit	D	%Rec	Limits		
Ethylbenzene	0.0114		0.0990	0.1000		mg/Kg		90	70 - 130		
m-Xylene & p-Xylene	0.00511		0.198	0.2115		mg/Kg		104	70 - 130		
o-Xylene	0.0275		0.0990	0.1061		mg/Kg		79	70 - 130		
	MS	MS									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	119		70 - 130								
1,4-Difluorobenzene (Surr)	77		70 - 130								
Lab Sample ID: 890-1382	-A-1-H MSD					Client	Samp	le ID: N	latrix Spil	ke Dup	licat
Matrix: Solid									Prep Ty		
Analysis Batch: 9282										Batch:	
	Sample	Sample	Spike	MSD	MSD				%Rec.		RP
Analyte	•	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Lim
Benzene	< 0.00199	U	0.0992	0.09504		mg/Kg		95	70 - 130	7	3
Toluene	<0.00199		0.0992	0.09440		mg/Kg		94	70 - 130	1	3
Ethylbenzene	0.0114		0.0992	0.09963		mg/Kg		89	70 - 130	0	3
n-Xylene & p-Xylene	0.00511		0.198	0.2082		mg/Kg		102	70 - 130	2	3
p-Xylene	0.0275		0.0992	0.1047		mg/Kg		78	70 - 130	1	3
	MSD	MSD									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	118		70 - 130								
1,4-Difluorobenzene (Surr)	88		70 - 130								
lethod: 8015B NM - D	Diesel Rang	ge Organ	ics (DRO	) (GC)							
Lab Sample ID: MB 880-9 Matrix: Solid Analysis Batch: 9261							Clie	ent Sam	ple ID: M Prep Ty Prep		al/N/

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
	MB	МВ						

Surrogate	%Recovery	Qualifier	Limits
1-Chlorooctane	115		70 - 130
o-Terphenyl	133	S1+	70 - 130

#### Lab Sample ID: LCS 880-9312/2-A Matrix: Solid Analysis Batch: 9261

Analysis Batch: 9261							Prep	Batch: 9312
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	1102		mg/Kg		110	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	973.2		mg/Kg		97	70 - 130	
C10-C28)								

Eurofins Xenco, Carlsbad

Analyzed

Prep Type: Total/NA

10/12/21 14:04 10/12/21 20:01

10/12/21 14:04 10/12/21 20:01

**Client Sample ID: Lab Control Sample** 

Dil Fac

1

1

Prepared

# **QC Sample Results**

Job ID: 890-1388-1 SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger CS

# Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: LCS 880-	9312/2-4					Clier	it Sar	nnle ID	: Lab Con	trol Sa	mnlo
Matrix: Solid	·5512/2-A					Cilei	it Sai		Prep Ty		
Analysis Batch: 9261										Batch:	
									. Top	Batom	
	LCS										
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	92		70 - 130								
o-Terphenyl	90		70 - 130								
Lab Sample ID: LCSD 88	0-9312/3-A				с	lient Sa	mple	ID: Lab	Control	Sample	) Dup
Matrix: Solid							-		Prep Ty		
Analysis Batch: 9261										Batch:	
-			Spike	LCSD	LCSD				%Rec.		RPD
Analyte			Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Gasoline Range Organics (GRO)-C6-C10			1000	1032		mg/Kg		103	70 - 130	7	20
Diesel Range Organics (Over C10-C28)			1000	984.4		mg/Kg		98	70 - 130	1	20
,	LCSD	1000									
C	%Recovery		Limito								
Surrogate 1-Chlorooctane		Quaimer	<u>Limits</u> 70 - 130								
	101		70 - 130 70 - 130								
Lab Sample ID: 890-1382 Matrix: Solid	2-A-1-K MS						CI	ient Sa			al/NA
o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261	2-A-1-K MS Sample	Sample	Spike		MS		CI		Prep Ty Prep %Rec.	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte	-A-1-K MS Sample Result	Qualifier	Spike Added	Result	Qualifier	Unit	CI	%Rec	Prep Ty Prep %Rec. Limits	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10	2-A-1-K MS Sample Result <49.9	Qualifier	Spike Added 997	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	-A-1-K MS Sample Result	Qualifier	Spike Added	Result	Qualifier			%Rec	Prep Ty Prep %Rec. Limits	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	<b>Sample</b> <b>Result</b> 	Qualifier	Spike Added 997	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate	-A-1-K MS Sample Result <49.9 124 MS %Recovery	Qualifier U F1 -	Spike Added 997 997 Limits	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate	-A-1-K MS Sample Result <49.9 124 MS %Recovery	Qualifier U F1 -	Spike Added 997 997 Limits	Result 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tota	al/NA
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314	Qualifier	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Typ           Prep           %Rec.           Limits           70 - 130           70 - 130	pe: Tota Batch:	al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314	Qualifier	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130	pe: Tota Batch:	al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314	Qualifier	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	pe: Tota Batch:	al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD	Qualifier U F1 -	<b>Spike</b> Added 997 997 <u>Limits</u> 70 - 130	Result 1314 1290	Qualifier	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	pe: Tota Batch: 	al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample	Qualifier U F1 MS Qualifier	Spike           Added           997           997           997           2007           0007	Result           1314           1290           MSD	Qualifier F1	mg/Kg mg/Kg	D_	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	pe: Tota Batch: 	al/NA 9312  licate al/NA 9312
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample	Qualifier U F1 MS Qualifier Sample Qualifier	Spike           Added           997           997           997	Result           1314           1290           MSD	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S	D_	<u>%Rec</u> 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	ke Dupl pe: Tota Batch:	al/NA 9312 licate al/NA 9312 RPD
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte	-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 C-A-1-L MSD Sample Result	Qualifier U F1 MS Qualifier Sample Qualifier	Spike           Added           997           997	Result 1314 1290 MSD Result	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit	D_	<u>%Rec</u> 132 117 Ie ID: N	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130	ce Dupl pe: Tota pe: Tota Batch: 	licate al/NA 9312 licate al/NA 9312 RPD Limit
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample Result <49.9 124 MSD	Qualifier U F1 MS Qualifier Qualifier U F1 MSD	Spike           Added           997           997	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	D_	<u>%Rec</u> 132 117 Ie ID: N <u>%Rec</u> 142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ce Dupl pe: Tota Batch: Batch: <u>RPD</u> 8	licate al/NA 9312 licate al/NA 9312 RPD Limit 20
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample Result <49.9 124	Qualifier U F1 MS Qualifier Qualifier U F1 MSD	Spike           Added           997           997	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	D_	<u>%Rec</u> 132 117 Ie ID: N <u>%Rec</u> 142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ce Dupl pe: Tota Batch: Batch: <u>RPD</u> 8	licate al/NA 9312 licate al/NA 9312 RPD Limit 20
Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analysis Batch: 9261 Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	2-A-1-K MS Sample Result <49.9 124 MS %Recovery 118 115 2-A-1-L MSD Sample Result <49.9 124 MSD	Qualifier U F1 MS Qualifier Qualifier U F1 MSD	Spike           Added           997           997           997           1000           1000	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	D_	<u>%Rec</u> 132 117 Ie ID: N <u>%Rec</u> 142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ce Dupl pe: Tota Batch: Batch: <u>RPD</u> 8	licate al/NA 9312 licate al/NA 9312 RPD Limit 20

Client: WSP USA Inc. Project/Site: Tiger CS

# **QC Sample Results**

Job ID: 890-1388-1 SDG: 31403236.022.0129

Method: 300.0 - Anions, Ion Chromatography

 Lab Sample ID: MB 880-9281/1-	A								CI	ient	Sam	ple ID: M	ethod I	Blank
Matrix: Solid												Prep Ty	ype: So	luble
Analysis Batch: 9303														
		MB	MB											
Analyte	Re	sult	Qualifier		RL		Unit		D	Prep	ared	Analyz	zed	Dil Fac
Chloride	<	5.00	U		5.00		mg/K	g				10/12/21	12:50	1
	<b>A</b>							Clie	ent Sa	amp	le ID	: Lab Cor	ntrol Sa	mple
Matrix: Solid												Prep Ty	ype: So	luble
Analysis Batch: 9303														
				Spike		LCS	LCS					%Rec.		
Analyte				Added	F	Result	Qualifier	Unit	0	) %	Rec	Limits		
Chloride				250		246.8		mg/Kg		_	99	90 - 110		
Lab Sample ID: LCSD 880-9281	/3-A						c	lient S	ampl	e ID	: Lab	Control	Sample	a Dup
Matrix: Solid												Prep Ty		
Analysis Batch: 9303														
-				Spike	I	LCSD	LCSD					%Rec.		RPD
Analyte				Added	F	Result	Qualifier	Unit		) %	Rec	Limits	RPD	Limit
Chloride				250		254.3		mg/Kg			102	90 - 110	3	20
	E MS								C	Clier	nt Sa	mple ID: I	Matrix \$	Spike
Matrix: Solid												Prep Ty	ype: So	luble
Analysis Batch: 9303														
-	Sample	Sam	nlo	Spike		MS	MS					%Rec.		
	Jumpic	Sam	pie	Spike		1010								
Analyte	Result		•	Added	F	-	Qualifier	Unit		) %	Rec	Limits		
Analyte	•		•	•		-	-	Unit mg/Kg		<u>    %</u>	<b>Rec</b> 106	Limits 90 - 110		
Chloride	Result 20.5	Qua	•	Added		Result	-	mg/Kg			106	90 - 110		licate
Chloride Lab Sample ID: 880-7069-A-10-I	Result 20.5	Qua	•	Added		Result	-	mg/Kg			106	90 - 110		
Chloride Lab Sample ID: 880-7069-A-10-I Matrix: Solid	Result 20.5	Qua	•	Added		Result	-	mg/Kg			106	90 - 110		
Chloride Lab Sample ID: 880-7069-A-10-I Matrix: Solid Analysis Batch: 9303	Result 20.5	Qua	lifier	Added		<b>Result</b> 547.9	-	mg/Kg			106	90 - 110		
Chloride Lab Sample ID: 880-7069-A-10-I Matrix: Solid Analysis Batch: 9303	Result 20.5	Qua	lifier	Added 497		Result 547.9 MSD	Qualifier	mg/Kg	: Sam	ple	106	90 - 110 latrix Spil Prep Ty		luble

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

**Client Sample ID** 

Lab Control Sample

Lab Control Sample Dup

Matrix Spike Duplicate

Method Blank

Matrix Spike

Method Blank

Matrix Spike

**SS06** 

**SS06** 

**QC** Association Summary

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Total/NA

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

Matrix

Solid

Solid

Solid

Solid

Solid

Solid

Project/Site: Tiger CS

## **GC VOA**

### Prep Batch: 8942

Lab Sample ID

MB 880-8942/5-B

LCS 880-8942/1-A

LCSD 880-8942/2-A

890-1382-A-1-G MS

890-1382-A-1-H MSD

Lab Sample ID

MB 880-8942/5-B

LCS 880-8942/1-A

LCSD 880-8942/2-A

890-1382-A-1-G MS

890-1382-A-1-H MSD

890-1388-1

Analysis Batch: 9282

890-1388-1

Method

5035

5035

5035

5035

5035

5035

Method

8021B

8021B

8021B

8021B

8021B

8021B

Prep Batch

Prep Batch

8942

8942

8942

8942 8942

8942

Job ID: 890-1388-1 SDG: 31403236.022.0129

## Analysis Batch: 9297

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch	
890-1388-1	SS06	Total/NA	Solid	Total BTEX		

### GC Semi VOA

## Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1388-1	SS06	Total/NA	Solid	8015B NM	9312
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015B NM	9312
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9312

## Prep Batch: 9312

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1388-1	SS06	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

890-1388-1 SS06 Total/NA Solid 8015 NM	Lab Sample ID	Client Sample ID	Prep Туре	Matrix	Method	Prep Batch
	890-1388-1	SS06	Total/NA	Solid	8015 NM	

## HPLC/IC

#### Leach Batch: 9281

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1388-1	SS06	Soluble	Solid	DI Leach	
MB 880-9281/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9281/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9281/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Eurofins Xenco, Carlsbad

Client: WSP USA Inc.

Client: WSP USA Inc. Project/Site: Tiger CS

## HPLC/IC (Continued)

## Leach Batch: 9281 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	<b>Method</b>	Prep Batch
880-7069-A-10-E MS	Matrix Spike	Soluble	Solid	DI Leach	
880-7069-A-10-F MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	

## Analysis Batch: 9303

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1388-1	SS06	Soluble	Solid	300.0	9281
MB 880-9281/1-A	Method Blank	Soluble	Solid	300.0	9281
LCS 880-9281/2-A	Lab Control Sample	Soluble	Solid	300.0	9281
LCSD 880-9281/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9281
880-7069-A-10-E MS	Matrix Spike	Soluble	Solid	300.0	9281
880-7069-A-10-F MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9281

Page 302 of 331

Job ID: 890-1388-1 SDG: 31403236.022.0129

Job ID: 890-1388-1 SDG: 31403236.022.0129

## Client Sample ID: SS06 Date Collected: 10/08/21 12:53 Date Received: 10/08/21 15:50

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab	Sample	ID:	890-1388-1
	-		Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 20:25	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9387	10/13/21 15:17	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/13/21 00:55	AJ	XEN MID
Soluble	Leach	DI Leach			9281	10/12/21 08:19	СН	XEN MID
Soluble	Analysis	300.0		1	9303	10/12/21 15:49	СН	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

**Accreditation/Certification Summary** 

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1388-1 SDG: 31403236.022.0129

Page 304 of 331

## Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Pr	ogram	Identification Number	Expiration Date
exas	NE	ELAP	T104704400-21-22	06-30-22
The following enclyter	are included in this read	wt. hut the leberatory is r	at contified by the governing outbority	This list may include analytes for which
the agency does not c	•	in, but the laboratory is r	for certified by the governing authority.	This list may include analytes for whic
• •	•	Matrix	Analyte	This list may include analytes for whic
the agency does not o	offer certification.	•	, , , , , ,	

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1388-1 SDG: 31403236.022.0129

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### **Protocol References:**

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Sample Summary

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1388-1 SDG: 31403236.022.0129

Page 306 of 331

				<b>B</b>	
Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
890-1388-1	SS06	Solid	10/08/21 12:53	10/08/21 15:50	0.5

Revised Date 051418 Rev 2018 1			6				σ
			1.000	Ň	and my	~ /	3 John Color
Date/Time	Received by: (Signature)	Relinquished by: (Signature)	Date/Time	(Signature)	Received by: (Signature)	y: (Signature)	Relinquished by: (Signature)
	riously negotiated.	of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be enforced unless previously negotiated.	Ibmitted to Xenco, but not anal	harge of \$5 for each sample s	of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sam	harge of \$75.00 will be ap	of Xenco. A minimum c
	d terms and conditions nces beyond the control	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its affiliates and subcontractors. It assigns standard terms and conditions of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses are due to circumstances beyond the contro	lient company to Xenco, its aff losses or expenses incurred b	s a valid purchase order from ume any responsibility for any	ment of samples constitute d samples and shall not ass	document and relinquist a liable only for the cost c	Notice: Signature of this of service. Xenco will b
2 Na Sr TI Sn U V Zn 1631 / 245.1 / 7470 / 7471 : Hg	Mo Ni K Se Ag SiO2 TI U	B Cd Ca Cr Co Cu Fe Pb Mg Mn Cd Cr Co Cu Pb Mn Mo Ni Se Ag	Al Sb As Ba Be RA Sb As Ba Be	TCLP / SPLP 6010: 8RCRA	e B	otal 200.7 / 6010 200.8 / 6020: Circle Method(s) and Metal(s) to be analyzed	Total 200.7 / 6010 Circle Method(s) a
							1
Discrete			×	12:53 0.5'	-+	07 S	SS07
Sample Comments			Numbe TPH (E BTEX ( Chlorid	Time Depth Sampled	Matrix Date Sampled S		Sample Identification
lab, if received by 4:30pm			PA 8	Total Containers:	N/A Total C		Sample Custody Seals:
TAT starts the day recevied by the	_	890-1388 Chain of C	015) 0=80	Correction Factor: -0.2	A Corre	Yes No	Cooler Custody Seals:
	tody		121)	FCO-MINT	1	Ø.	Received Intact:
				▫		2	Temperature (°C):
				Wet Ice: Yes No	Temp Blank: es No		SAMPLE RECEIPT
NAPP2123231376	NAPE			Due Date:		Payton Benner	Sampler's Name:
				Ø			P.O. Number:
CC:2027031001	CC:2			Routine	31403236.022.0129	i 1	Project Number:
Work Order Notes		ANALYSIS REQUEST		Turn Around	1	Tiger CS	Project Name:
Other:	Deliverables: EDD ADaPT		kalei.jennings@wsp.com, payton.benner@wsp.com	Email: <u>kalei.jennings</u>		817-683-2503	Phone:
	Reporting:Level IIT/UST		Carlsbad, NM 88220	City, State ZIP:	9705	Midland, Texas 79705	City, State ZIP:
		Sta	3104 E Green Strret	Address:	3300 North A Street Bldg 1, Unit 222	3300 North A Stre	Address:
CC Cperfund	Program: UST/PST CRP Crownfields	Progr	XTO	Company Name		WSP USA	Company Name:
ents	Work Order Comments		Adrian Baker	Bill to: (If different)		Kalei Jennings	Project Manager:
ge1 of1_	)) <u>www.xenco.com</u> <sup>2</sup> age	43 Lubbock,TX (806)794-1296 A (770-449-8800) Tampa,FL (813-620-2000)	Midland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)7 Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8800) Tam	Midland,TX (432-704-544 1 (575-392-7550) Phoenix,A		BORATORIES	
		San Antonio, TX (210) 509-3334	Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210)	Houston,TX (281) 240-420			
	Work Order No:	istodv	Chain of Custody				

# Received by OCD: 11/5/2021 12:00:19 PM

## Page 307 of 331

13

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad NM 88220 Phone: 575-988-3199 Fax 575-988-3199 Client Information (Sub Contract Lab) Client Contact: Shipping/Receiving Company: Eurofins Xenco Address 1211 W Florida Ave	Ch Sampler Phone: Due Date Requested 10/13/2021 TAT Requested (days):	Chain of Custody Record	r Custo	Lab PM Lab PM E-Snail jessica NN	Record         Lab PM         Kramer, Jessica         E-Mail         Jessica kramer@eurofinset.com         Accreditations Required (See note):         NELAP - Louisiana NELAP - Texas         Analysis R         Analysis R	a S Requirofi		Analy LAP	Carrier Tra Carrier Tra State of O State of O State of O State of O State of O State of O		Carrier Tracking No(s): State of Origin New Mexico					53 I I I I I I I I I I I I I I I I I I I	Раде В 90- Раде В 90- Раде	eurofins color op-456 1 ge: ge: ge: op-456 1 ge: op-456 1
Mrdiand State, Zip: TX, 79701 Phone: 432-704-5440(Tel) Email	WO #			or No)	Numeral Address of the Address of the Address of Table		·····	<b>-,</b>	·	<u></u>		·	<u> </u>		<u> </u>	1. A. M.		G ZnAcetate O Astao2 D Nitric Acid P Na2O4S E NaHSO4 Q - Na2O3 F MeOH R Na2S2O3 F MeOH R Na2S2O3 G - Amchlor S - H2SO4 H Ascorbic Acid T TSP Dode I Ice U - Acetone I Ice U Mater V MCAA
Project Name Tiger CS	Project #: 89000004				ies or N									<u></u>		ntainers	гх	EDTA W pH 4-5 EDA Z - other (specify)
Site:	SSOW#			Comm	ISD (Y											ofcor	₽	Other:
Sample Identification - Client ID (Lab ID)	Sample Date	Sample (0 Time 0	Sample Type (C=comp, c G=grab) <sub>BT=</sub>	Matrix (W=water S=solid, C=waste/oll, BT=Tissue, A=Air)	Perform MS/M	8015MOD_Calc	300_ORGFM_28	Total_BTEX_GC		ļ						Total Number of		Special Instructions/Note:
	X	$\underline{U}$	100.44	Sec. Sta	X	and the second	in was	<i>142</i> 99		a a a a a a a a a a a a a a a a a a a		<u>Kan</u> j				$\mathbf{X}$		
SS07 (890-1388-1)	10/8/21	12 53 Mountain		Solid	×	×	××	×									Collect. and States. All	
					<u> </u>						_ <b>_</b>	+		+	1	l.a.	Million Come	
								-+-								-	<u>many settern</u>	
					+					<b>_</b>	┿┙	┼──┤	+		$\square$		<u>Varian dati da</u>	
										_							and the second times and	
Note: Since laboratory accreditations are subject to change Eurofins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed, the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC aboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC aboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Xenco LLC.	C places the ownership o ix being analyzed, the san the signed Chain of Cust	f method analyte nples must be sh ody attesting to a	e & accreditatio hipped back to t said complicant	n compliance the Eurofins X ce to Eurofins	upon out su enco LLC la Xenco LLC	ibcontrac iboratory	t labora or othe	tories.	This sa	mple s	hipme	I Any	warde	d und	accrec	lin-of-	-custc	ody If the laborator atus should be broug
Possible Hazard Identification Unconfirmed					Sample Disposal ( A	le Disposal ( A Return To Clien	To Cli	A fee	may		Disposal By Lab	i Bv	amp	les á		Arc	hive	tee may be assessed if samples are retained longer than 1 month)
Deliverable Requested 1 II, III, IV Other (specify)	Primary Deliverable Rank 2	ole Rank 2			Special Instructions/Q	Instru	tions/	QC R	C Requirements	ment	Ű[	ŀ						
Empty Kit Relinquished by		Date			Time.	ľ					3	Method of Shipment:	of Ship	ment:				
Relinquished by Lose Curly 10.11.20	Date/Time Date/Fime:	113(		Company Company		Received by	A	] ]						Date/Time Date/Time:	<u>w</u> w			Company Company
Relinquished by	Date/Time		Co	Company	Rec	Received by							Da			1		
														Date/Time	æ			

## Login Sample Receipt Checklist

Client: WSP USA Inc.

### Login Number: 1388 List Number: 1 **Creator: Clifton, Cloe**

Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is	N/A	

Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").

Job Number: 890-1388-1 SDG Number: 31403236.022.0129 4 5 7 8 9 10 11 12 13 List Source: Eurofins Xenco, Carlsbad

Job Number: 890-1388-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Midland

# Login Sample Receipt Checklist

Client: WSP USA Inc.

Login Number: 1388 List Num **Creator:** 

List Number: 2			List Creation: 10/12/21 11:45 AM
Creator: Lowe, Katie			
Question	Answer	Comment	
The cooler's custody seal, if present, is intact.	True		
Sample custody seals, if present, are intact.	True		
The cooler or samples do not appear to have been compromised or tampered with.	True		
Samples were received on ice.	True		
Cooler Temperature is acceptable.	True		
Cooler Temperature is recorded.	True		
COC is present.	True		
COC is filled out in ink and legible.	True		
COC is filled out with all pertinent information.	True		
Is the Field Sampler's name present on COC?	True		
There are no discrepancies between the containers received and the COC.	True		
Samples are received within Holding Time (excluding tests with immediate HTs)	True		
Sample containers have legible labels.	True		
Containers are not broken or leaking.	True		
Sample collection date/times are provided.	True		
Appropriate sample containers are used.	True		

True

True

True

Sample bottles are completely filled. Sample Preservation Verified. There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs

Containers requiring zero headspace have no headspace or bubble is True <6mm (1/4").

Received by OCD: 11/5/2021 12:00:19 PM

# 🔅 eurofins

# Environment Testing America

# **ANALYTICAL REPORT**

Eurofins Xenco, Carlsbad 1089 N Canal St. Carlsbad, NM 88220 Tel: (575)988-3199

# Laboratory Job ID: 890-1387-1

Laboratory Sample Delivery Group: 31403236.022.0129 Client Project/Site: Tiger CS Revision: 1

## For:

WSP USA Inc. 2777 N. Stemmons Freeway Suite 1600 Dallas, Texas 75207

Attn: Dan Moir

RAMER

Authorized for release by: 10/25/2021 2:25:35 PM

Jessica Kramer, Project Manager (432)704-5440 jessica.kramer@eurofinset.com

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

LINKS **Review your project** results through Total Access Have a Question? Ask-The Expert

Visit us at: <u>www.eurofinsus.com/Env</u> Released to Imaging: 3/14/2022 1:38:16 PM

Page 312 of 331

# **Table of Contents**

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Client Sample Results	5
Surrogate Summary	6
QC Sample Results	7
QC Association Summary	11
Lab Chronicle	13
Certification Summary	14
Method Summary	15
Sample Summary	16
Chain of Custody	17
Receipt Checklists	19

.

Client: WSP USA Inc. Project/Site: Tiger CS Page 313 of 331

Job ID: 890-1387-1 SDG: 31403236.022.0129

#### 1:6:

Qualifiers		3
GC VOA Qualifier	Qualifier Description	
U	Indicates the analyte was analyzed for but not detected.	
GC Semi VO	Δ	5
Qualifier	Qualifier Description	
F1	MS and/or MSD recovery exceeds control limits.	
S1+	Surrogate recovery exceeds control limits, high biased.	
U	Indicates the analyte was analyzed for but not detected.	
HPLC/IC		
Qualifier	Qualifier Description	8
U	Indicates the analyte was analyzed for but not detected.	
Glossary		9
Abbreviation	These commonly used abbreviations may or may not be present in this report.	1
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis	U
%R	Percent Recovery	
CFL	Contains Free Liquid	
CFU	Colony Forming Unit	
CNF	Contains No Free Liquid	
DER	Duplicate Error Ratio (normalized absolute difference)	
Dil Fac	Dilution Factor	1
DL	Detection Limit (DoD/DOE)	
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample	
DLC	Decision Level Concentration (Radiochemistry)	
EDL	Estimated Detection Limit (Dioxin)	
LOD	Limit of Detection (DoD/DOE)	
LOQ	Limit of Quantitation (DoD/DOE)	
MCL	EPA recommended "Maximum Contaminant Level"	
MDA	Minimum Detectable Activity (Radiochemistry)	
MDC	Minimum Detectable Concentration (Radiochemistry)	
MDL	Method Detection Limit	
ML	Minimum Level (Dioxin)	
MPN	Most Probable Number	
MQL	Method Quantitation Limit	
NC	Not Calculated	
ND	Not Detected at the reporting limit (or MDL or EDL if shown)	
NEG	Negative / Absent	
POS	Positive / Present	
PQL	Practical Quantitation Limit	
PRES	Presumptive	
QC	Quality Control	
RER	Relative Error Ratio (Radiochemistry)	
RL	Reporting Limit or Requested Limit (Radiochemistry)	
RPD	Relative Percent Difference, a measure of the relative difference between two points	
TEF	Toxicity Equivalent Factor (Dioxin)	
TEO		

Toxicity Equivalent Quotient (Dioxin)

Too Numerous To Count

TEQ

TNTC

## Case Narrative

Client: WSP USA Inc. Project/Site: Tiger CS

## Job ID: 890-1387-1

## Laboratory: Eurofins Xenco, Carlsbad

Narrative

Job Narrative 890-1387-1

#### REVISION

The report being provided is a revision of the original report sent on 10/13/2021. The report (revision 1) is being revised due to Per client email, changed sample ID from SS08 to SS07.

Report revision history

#### Receipt

The sample was received on 10/8/2021 3:56 PM. Unless otherwise noted below, the sample arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 2.2°C

#### GC VOA

Method 8021B: Surrogate recovery for the following sample was outside control limits: (890-1382-A-1-I). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### GC Semi VOA

Method 8015MOD NM: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for preparation batch 880-9312 and analytical batch 880-9261 were outside control limits. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery was within acceptance limits.

Method 8015MOD NM: Surrogate recovery for the following sample was outside control limits: (MB 880-9312/1-A). Evidence of matrix interferences is not obvious.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

#### HPLC/IC

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

## Job ID: 890-1387-1 SDG: 31403236.022.0129

RL

0.00199

Unit

mg/Kg

Job ID: 890-1387-1 SDG: 31403236.022.0129

Analyzed

## **Client Sample ID: SS07** 2:56 5:56

Method: 8021B - Volatile Organic Compounds (GC)

Result Qualifier

<0.00199 U

Sample Depth:

Analyte

Benzene

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab Sample ID: 890-1387-1

Prepared

10/11/21 16:18 10/12/21 20:05

D

Matrix: Solid

387-1 Solid	3
	4
	5
Dil Fac 1 1	6
י 1 1	7
1 1	8
Dil Fac	9
1 1	10
Dil Fac	11
1	12
Dil Fac	13
1	

Date Collected: 10/08/21	12
Date Received: 10/08/21	15
Sample Depth: 0.5	

Toluene	<0.00199	U	0.00199	mg/Kg		10/11/21 16:18	10/12/21 20:05	1	
Ethylbenzene	<0.00199	U	0.00199	mg/Kg		10/11/21 16:18	10/12/21 20:05	1	
m-Xylene & p-Xylene	<0.00398	U	0.00398	mg/Kg		10/11/21 16:18	10/12/21 20:05	1	
o-Xylene	<0.00199	U	0.00199	mg/Kg		10/11/21 16:18	10/12/21 20:05	1	
Xylenes, Total	<0.00398	U	0.00398	mg/Kg		10/11/21 16:18	10/12/21 20:05	1	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac	
4-Bromofluorobenzene (Surr)	122		70 - 130			10/11/21 16:18	10/12/21 20:05	1	
1,4-Difluorobenzene (Surr)	80		70 - 130			10/11/21 16:18	10/12/21 20:05	1	
	EX Calcula	tion							
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Total BTEX	<0.00398	U	0.00398	mg/Kg			10/12/21 10:57	1	
_ Method: 8015 NM - Diesel Rar	nge Organic	s (DRO) (0	C)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Total TPH	<49.9	U	49.9	mg/Kg			10/13/21 15:17	1	
_ Method: 8015B NM - Diesel Ra	ange Organ	ics (DRO)	(GC)						
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Gasoline Range Organics (GRO)-C6-C10	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/13/21 00:34	1	
Diesel Range Organics (Over	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/13/21 00:34	1	
C10-C28) Oll Range Organics (Over C28-C36)	<49.9	U	49.9	mg/Kg		10/12/21 14:04	10/13/21 00:34	1	
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac	
1-Chlorooctane	107		70 - 130			10/12/21 14:04	10/13/21 00:34	1	
o-Terphenyl	120		70 - 130			10/12/21 14:04	10/13/21 00:34	1	
– Method: 300.0 - Anions, Ion Chromatography - Soluble									
Analyte		Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac	
Chloride	86.1		4.95	mg/Kg			10/12/21 15:42	1	

Eurofins Xenco, Carlsbad

Released to Imaging: 3/14/2022 1:38:16 PM

10/25/2021 (Rev. 1)

## **Surrogate Summary**

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1387-1 SDG: 31403236.022.0129

Page 316 of 331

## Method: 8021B - Volatile Organic Compounds (GC) Matrix: Solid

			Percent S	Surrogate Recovery (Acceptance Limits)	
		BFB1	DFBZ1		1
Lab Sample ID	Client Sample ID	(70-130)	(70-130)		
890-1382-A-1-G MS	Matrix Spike	119	77		
890-1382-A-1-H MSD	Matrix Spike Duplicate	118	88		
890-1387-1	SS07	122	80		1
LCS 880-8942/1-A	Lab Control Sample	112	88		
LCSD 880-8942/2-A	Lab Control Sample Dup	116	76		
MB 880-8942/5-B	Method Blank	112	79		
Surrogate Legend					
Surrogate Legend					

BFB = 4-Bromofluorobenzene (Surr)

DFBZ = 1,4-Difluorobenzene (Surr)

## Method: 8015B NM - Diesel Range Organics (DRO) (GC) Matrix: Solid

Matrix: Solid		•			Prep Type: Total/NA	
			Percent Su	urrogate Recovery (Accep	tance Limits)	
		1CO1	OTPH1			
Lab Sample ID	Client Sample ID	(70-130)	(70-130)			
890-1382-A-1-K MS	Matrix Spike	118	115			13
890-1382-A-1-L MSD	Matrix Spike Duplicate	118	113			
890-1387-1	SS07	107	120			
LCS 880-9312/2-A	Lab Control Sample	92	90			
LCSD 880-9312/3-A	Lab Control Sample Dup	101	101			
MB 880-9312/1-A	Method Blank	115	133 S1+			

#### Surrogate Legend

1CO = 1-Chlorooctane

OTPH = o-Terphenyl

Prep Type: Total/NA

# **QC Sample Results**

Job ID: 890-1387-1 SDG: 31403236.022.0129

Prep Type: Total/NA

**Prep Type: Total/NA** 

Prep Type: Total/NA

Prep Batch: 8942

**Client Sample ID: Method Blank** 

**Client Sample ID: Lab Control Sample** 

**Client Sample ID: Lab Control Sample Dup** 

Client: WSP USA Inc. Project/Site: Tiger CS

## Method: 8021B - Volatile Organic Compounds (GC)

### Lab Sample ID: MB 880-8942/5-B Matrix: Solid **Analysis Batch: 9282**

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Benzene	< 0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Toluene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Ethylbenzene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
m-Xylene & p-Xylene	<0.00400	U	0.00400	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
o-Xylene	<0.00200	U	0.00200	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
Xylenes, Total	<0.00400	U	0.00400	mg/Kg		10/11/21 16:18	10/12/21 13:02	1
	MB	MB						
Surrogate	%Recovery	Qualifier	Limits			Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	112		70 - 130			10/11/21 16:18	10/12/21 13:02	1
1,4-Difluorobenzene (Surr)	79		70 - 130			10/11/21 16:18	10/12/21 13:02	1

#### Lab Sample ID: LCS 880-8942/1-A Matrix: Solid **Analysis Batch: 9282**

Analysis Batch: 9282							Prep	Batch: 8942
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Benzene	0.100	0.09008		mg/Kg		90	70 - 130	
Toluene	0.100	0.09025		mg/Kg		90	70 - 130	
Ethylbenzene	0.100	0.09403		mg/Kg		94	70 - 130	
m-Xylene & p-Xylene	0.200	0.1959		mg/Kg		98	70 - 130	
o-Xylene	0.100	0.09732		mg/Kg		97	70 - 130	

	LCS	LCS	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	112		70 - 130
1,4-Difluorobenzene (Surr)	88		70 - 130

#### Lab Sample ID: LCSD 880-8942/2-A Matrix: Solid

### Analysis Batch: 9282

Analysis Batch: 9282							Prep	Batch:	
-	Spike	LCSD	LCSD				%Rec.		RPD
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	RPD	Limit
Benzene	0.100	0.08283		mg/Kg		83	70 - 130	8	35
Toluene	0.100	0.08609		mg/Kg		86	70 - 130	5	35
Ethylbenzene	0.100	0.09041		mg/Kg		90	70 - 130	4	35
m-Xylene & p-Xylene	0.200	0.1906		mg/Kg		95	70 - 130	3	35
o-Xylene	0.100	0.09563		mg/Kg		96	70 - 130	2	35

	LCSD	LCSD	
Surrogate	%Recovery	Qualifier	Limits
4-Bromofluorobenzene (Surr)	116		70 - 130
1,4-Difluorobenzene (Surr)	76		70 - 130

#### Lab Sample ID: 890-1382-A-1-G MS Matrix: Solid

Matrix: Solid Analysis Batch: 9282									Prep Type: Total/NA Prep Batch: 8942
	Sample	Sample	Spike	MS	MS				%Rec.
Analyte	Result	Qualifier	Added	Result	Qualifier	Unit	D	%Rec	Limits
Benzene	<0.00199	U	0.0990	0.08900		mg/Kg		89	70 - 130
Toluene	<0.00199	U	0.0990	0.09358		mg/Kg		94	70 - 130

Eurofins Xenco, Carlsbad

**Client Sample ID: Matrix Spike** 

## Released to Imaging: 3/14/2022 1:38:16 PM

Client: WSP USA Inc.

Project/Site: Tiger CS

# **QC Sample Results**

Job ID: 890-1387-1 SDG: 31403236.022.0129

# Method: 8021B - Volatile Organic Compounds (GC) (Continued)

Matrix: Solid Analysis Batch: 9282 Analyte Ethylbenzene m-Xylene & p-Xylene b-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene m-Xylene & p-Xylene b-Xylene	Result           0.0114           0.00511           0.0275           MS           %Recovery           119           77           •1-H MSD           Sample	Sample Qualifier MS Qualifier Sample	Spike           Added           0.0990           0.198           0.0990           Limits           70 - 130           70 - 130           Spike	Result 0.1000 0.2115 0.1061	MS Qualifier	Unit mg/Kg mg/Kg mg/Kg	_ D	%Rec 90 104 79	%Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	Batch:	licate
Analyte Ethylbenzene m-Xylene & p-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene m-Xylene & p-Xylene	Result           0.0114           0.00511           0.0275           MS           %Recovery           119           77           •1-H MSD           Sample	Qualifier MS Qualifier	Added           0.0990           0.198           0.0990           Limits           70 - 130           70 - 130	Result 0.1000 0.2115 0.1061	Qualifier	mg/Kg mg/Kg mg/Kg		90 104 79	%Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130	ke Dupl	licate
Ethylbenzene n-Xylene & p-Xylene b-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	Result           0.0114           0.00511           0.0275           MS           %Recovery           119           77           •1-H MSD           Sample	Qualifier MS Qualifier	Added           0.0990           0.198           0.0990           Limits           70 - 130           70 - 130	Result 0.1000 0.2115 0.1061	Qualifier	mg/Kg mg/Kg mg/Kg		90 104 79	Limits 70 - 130 70 - 130 70 - 130 70 - 130	pe: Tot	tal/N/
Ethylbenzene n-Xylene & p-Xylene b-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	0.0114 0.00511 0.0275 <i>MS</i> % <i>Recovery</i> 119 77 •1-H MSD Sample	MS Qualifier	0.0990 0.198 0.0990 Limits 70 - 130 70 - 130	0.1000 0.2115 0.1061		mg/Kg mg/Kg mg/Kg		90 104 79	70 - 130 70 - 130 70 - 130 70 - 130	pe: Tot	tal/N/
n-Xylene & p-Xylene b-Xylene Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	0.00511 0.0275 <i>MS</i> <u>%Recovery</u> 119 77 <b>-1-H MSD</b> Sample	Qualifier	0.198 0.0990 <u>Limits</u> 70 - 130 70 - 130	0.2115 0.1061		mg/Kg mg/Kg	amp	104 79	70 - 130 70 - 130 Matrix Spil Prep Ty	pe: Tot	tal/N/
Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	0.0275 MS <u>%Recovery</u> 119 77 • <b>1-H MSD</b> Sample	Qualifier	0.0990 Limits 70 - 130 70 - 130	0.1061		mg/Kg	amp	79	70 - 130 Iatrix Spil Prep Ty	pe: Tot	tal/N/
Surrogate 4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	MS %Recovery 119 77 •1-H MSD Sample	Qualifier	Limits 70 - 130 70 - 130				amp		latrix Spil Prep Ty	pe: Tot	tal/N/
4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	%Recovery 119 77 •1-H MSD Sample	Qualifier	70 - 130 70 - 130	MOD		Client Sa	amp	le ID: N	Prep Ty	pe: Tot	tal/N/
4-Bromofluorobenzene (Surr) 1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	119 77 -1-H MSD Sample		70 - 130 70 - 130	MOD		Client Sa	amp	le ID: N	Prep Ty	pe: Tot	tal/N/
1,4-Difluorobenzene (Surr) Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	77 •1-H MSD Sample	Sample	70 - 130	MOD		Client Sa	amp	le ID: N	Prep Ty	pe: Tot	tal/N/
Lab Sample ID: 890-1382-A- Matrix: Solid Analysis Batch: 9282 Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	-1-H MSD Sample	Sample		MOD		Client Sa	amp	le ID: N	Prep Ty	pe: Tot	tal/N/
Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene n-Xylene & p-Xylene	Sample	Sample	Spike	MOD		Client Sa	amp	le ID: N	Prep Ty	pe: Tot	tal/N/
Matrix: Solid Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene n-Xylene & p-Xylene	Sample	Sample	Spike	MOD			amp		Prep Ty	pe: Tot	tal/N/
Analysis Batch: 9282 Analyte Benzene Toluene Ethylbenzene n-Xylene & p-Xylene	-	Sample	Spike	MOD							
Analyte Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	-	Sample	Spike	MOD					i i cp		XYA
Benzene Foluene Ethylbenzene n-Xylene & p-Xylene	-			INISD	MSD				%Rec.		RP
Benzene Foluene Ethylbenzene n-Xylene & p-Xylene		Qualifier	Added	-	Qualifier	Unit	D	%Rec	Limits	RPD	Lim
Ethylbenzene n-Xylene & p-Xylene	< 0.00199	U	0.0992	0.09504		mg/Kg		95	70 - 130	7	3
n-Xylene & p-Xylene	< 0.00199		0.0992	0.09440		mg/Kg		94	70 - 130	1	3
• • •	0.0114		0.0992	0.09963		mg/Kg		89	70 - 130	0	3
• • •	0.00511		0.198	0.2082		mg/Kg		102	70 - 130	2	3
	0.0275		0.0992	0.1047		mg/Kg		78	70 - 130	1	3
	MSD	MSD									
Surrogate	%Recovery	Qualifier	Limits								
4-Bromofluorobenzene (Surr)	118		70 - 130								
1,4-Difluorobenzene (Surr)	88		70 - 130								
athed: 004ED NM Dis	aal Dam										
lethod: 8015B NM - Dies	sei Rang	ge Orgar	IICS (DRU	) (GC)							
Lab Sample ID: MB 880-9312	2/1-A						Clie	ent Sam	nple ID: M	ethod E	Blan
Matrix: Solid									· Prep Ty		
Analysis Batch: 9261										Batch:	

	MB	MB						
Analyte	Result	Qualifier	RL	Unit	D	Prepared	Analyzed	Dil Fac
Gasoline Range Organics (GRO)-C6-C10	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
Diesel Range Organics (Over C10-C28)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
Oll Range Organics (Over C28-C36)	<50.0	U	50.0	mg/Kg		10/12/21 14:04	10/12/21 20:01	1
	MB	MB						

Surrogate	%Recovery Qualifier	Limits
1-Chlorooctane	115	70 - 130
o-Terphenyl	133 S1+	70 - 130

#### Lab Sample ID: LCS 880-9312/2-A Matrix: Solid Analysis Batch: 9261

Analysis Batch: 9261							Prep	Batch: 9312
	Spike	LCS	LCS				%Rec.	
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits	
Gasoline Range Organics	1000	1102		mg/Kg		110	70 - 130	
(GRO)-C6-C10								
Diesel Range Organics (Over	1000	973.2		mg/Kg		97	70 - 130	
C10-C28)								

Eurofins Xenco, Carlsbad

Analyzed

Prep Type: Total/NA

10/12/21 14:04 10/12/21 20:01

10/12/21 14:04 10/12/21 20:01

**Client Sample ID: Lab Control Sample** 

Dil Fac

1

1

Prepared

# **QC Sample Results**

Job ID: 890-1387-1 SDG: 31403236.022.0129

Client: WSP USA Inc. Project/Site: Tiger CS

# Method: 8015B NM - Diesel Range Organics (DRO) (GC) (Continued)

Lab Sample ID: LCS 880- Matrix: Solid	9312/2-A					Clier	it Sar	nple ID	Lab Cor Prep Ty		
Analysis Batch: 9261										Batch:	
	1.00	LCS									
Surrenate	%Recovery		Limits								
Surrogate 1-Chlorooctane		Quaimer	70 - 130								
o-Terphenyl	90		70 - 130								
Lab Sample ID: LCSD 880	D-9312/3-∆				6	lient Sa	mnle	ID· I at		Sample	יווס ב
Matrix: Solid							inpio	10. Lui	Prep Ty		
Analysis Batch: 9261										Batch:	
			Spike	LCSD					%Rec.	Baton.	RP
Analyte			Added		Qualifier	Unit	D	%Rec	Limits	RPD	Lim
Gasoline Range Organics			1000	1032	Quanner	mg/Kg		103	70 - 130	7	2
(GRO)-C6-C10			1000	1002		mg/itg		100	70-100	1	2
Diesel Range Organics (Over			1000	984.4		mg/Kg		98	70 - 130	1	2
C10-C28)						5. 5					
	1000	LCSD									
0			1								
Surrogate	%Recovery	Qualifier	Limits								
1-Chlorooctane	101		70 - 130								
o-Terphenyl	101		70 - 130								
Lab Sample ID: 890-1382 Matrix: Solid	-A-1-K MS						CI	ient Sa	mple ID: I Prep Ty	pe: Tot	al/N
		Sample	Spike	MS	MS		CI	ient Sa	Prep Ty		al/N
Matrix: Solid	Sample	Sample Qualifier	Spike Added	-	MS Qualifier	Unit	CI	ient Sa %Rec	Prep Ty Prep	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	Sample	Qualifier	•	-	Qualifier	Unit mg/Kg			Prep Ty Prep %Rec.	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10	Sample Result <49.9	Qualifier	<b>Added</b> 997	<b>Result</b> 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Sample Result	Qualifier	Added	Result	Qualifier			%Rec	Prep Ty Prep %Rec. Limits	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10	Sample Result <49.9	Qualifier	<b>Added</b> 997	<b>Result</b> 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Sample Result <49.9 124	Qualifier	<b>Added</b> 997	<b>Result</b> 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Sample Result <49.9 124	Qualifier U F1	<b>Added</b> 997	<b>Result</b> 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	Sample Result <49.9 124 MS	Qualifier U F1	Added 997 997	<b>Result</b> 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate	Sample Result <49.9 124 MS %Recovery	Qualifier U F1	Added 997 997 Limits	<b>Result</b> 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane	Sample Result <49.9 124 MS %Recovery 118	Qualifier U F1	Added 997 997 <u>Limits</u> 70 - 130	<b>Result</b> 1314	Qualifier	mg/Kg		<b>%Rec</b> 132	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot	al/N
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane	Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1	Added 997 997 <u>Limits</u> 70 - 130	<b>Result</b> 1314	Qualifier	mg/Kg mg/Kg	<u>D</u>	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130	pe: Tot Batch: 	al/N/ 931
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl	Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1	Added 997 997 <u>Limits</u> 70 - 130	<b>Result</b> 1314	Qualifier	mg/Kg mg/Kg	<u>D</u>	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130	pe: Tot Batch: 	al/N/ 931
Matrix: Solid Analysis Batch: 9261 Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382	Sample Result <49.9 124 MS %Recovery 118 115	Qualifier U F1	Added 997 997 <u>Limits</u> 70 - 130	<b>Result</b> 1314	Qualifier	mg/Kg mg/Kg	<u>D</u>	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	pe: Tot Batch: 	al/N/ 931
Matrix: Solid Analysis Batch: 9261 Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid	Sample Result <49.9 124 MS %Recovery 118 115 -A-1-L MSD	Qualifier U F1	Added 997 997 <u>Limits</u> 70 - 130	<b>Result</b> 1314	Qualifier F1	mg/Kg mg/Kg	<u>D</u>	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130	pe: Tot Batch:  ke Dup pe: Tot	licat 931
Matrix: Solid Analysis Batch: 9261 Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid	Sample Result <49.9 124 MS %Recovery 118 115 -A-1-L MSD Sample	Qualifier U F1 MS Qualifier	Added 997 997 <u>Limits</u> 70 - 130 70 - 130	<b>Result</b> 1314 1290 <b>MSD</b>	Qualifier F1	mg/Kg mg/Kg	<u>D</u>	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep	pe: Tot Batch:  ke Dup pe: Tot	licati al/N/ 931
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382- Matrix: Solid Analysis Batch: 9261	Sample Result <49.9 124 MS %Recovery 118 115 -A-1-L MSD Sample	Qualifier U F1 MS Qualifier Sample Qualifier	Added 997 997 <u>Limits</u> 70 - 130 70 - 130 Spike	<b>Result</b> 1314 1290 <b>MSD</b>	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S	_ D	%Rec 132 117	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec.	ke Dup pe: Tot Batch:	licat licat al/N/ 931: licat al/N/ 931: Pli Lim
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte	Sample Result <49.9 124 <i>MS</i> <i>%Recovery</i> 118 115 -A-1-L MSD Sample Result	Qualifier U F1 MS Qualifier Sample Qualifier	Added 997 997 <u>Limits</u> 70 - 130 70 - 130 Spike Added	Result 1314 1290 MSD Result	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit	_ D	<u>%Rec</u> 132 117 Ie ID: N	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 190 %Rec. Limits	ke Dup pe: Tot Batch:  Batch: 	licato al/N/ 9312
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics	Sample Result <49.9 124 <i>MS</i> <i>%Recovery</i> 118 115 -A-1-L MSD Sample Result	Qualifier U F1 MS Qualifier Sample Qualifier	Added 997 997 <u>Limits</u> 70 - 130 70 - 130 Spike Added	Result 1314 1290 MSD Result	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit	_ D	<u>%Rec</u> 132 117 Ie ID: N	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 70 - 190 %Rec. Limits	ke Dup pe: Tot Batch:  Batch: 	licat al/NJ 931 licat al/NJ 931 RPI Lim 2
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382- Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10	Sample Result <49.9 124 MS %Recovery 118 115 -A-1-L MSD Sample Result <49.9	Qualifier U F1 MS Qualifier Sample Qualifier	Added 997 997 <u>Limits</u> 70 - 130 70 - 130 70 - 130 Spike Added 1000	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	_ D	%Rec         132         117         le ID: N         %Rec         142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ke Dup pe: Tot Batch: Batch: <u>RPD</u> 8	licat al/NJ 931 licat al/NJ 931 RPI Lim 2
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Sample Result <49.9 124 <i>MS</i> %Recovery 118 115 -A-1-L MSD Sample Result <49.9 124	Qualifier U F1 MS Qualifier Qualifier U F1	Added 997 997 <u>Limits</u> 70 - 130 70 - 130 70 - 130 Spike Added 1000	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	_ D	%Rec         132         117         le ID: N         %Rec         142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ke Dup pe: Tot Batch: Batch: <u>RPD</u> 8	licat 931: 931: 931: 931: 931: 81: 81: 81: 81: 81: 81: 81: 81: 81: 8
Matrix: Solid Analysis Batch: 9261 Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28)	Sample Result <49.9 124 MS %Recovery 118 115 -A-1-L MSD Sample Result <49.9 124 MSD	Qualifier U F1 MS Qualifier Qualifier U F1 MSD	Added 997 997 <u>Limits</u> 70 - 130 70 - 130 70 - 130 Notes the second secon	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	_ D	%Rec         132         117         le ID: N         %Rec         142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ke Dup pe: Tot Batch: Batch: <u>RPD</u> 8	licat 931: 931: 931: 931: 931: 81: 81: 81: 81: 81: 81: 81: 81: 81: 8
Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over C10-C28) Surrogate 1-Chlorooctane o-Terphenyl Lab Sample ID: 890-1382 Matrix: Solid Analysis Batch: 9261 Analyte Gasoline Range Organics (GRO)-C6-C10 Diesel Range Organics (Over	Sample Result <49.9 124 <i>MS</i> %Recovery 118 115 -A-1-L MSD Sample Result <49.9 124	Qualifier U F1 MS Qualifier Qualifier U F1 MSD	Added 997 997 <u>Limits</u> 70 - 130 70 - 130 70 - 130 Spike Added 1000	Result           1314           1290           MSD           Result           1419	Qualifier F1 MSD Qualifier	mg/Kg mg/Kg Client S Unit mg/Kg	_ D	%Rec         132         117         le ID: N         %Rec         142	Prep Ty Prep %Rec. Limits 70 - 130 70 - 130 70 - 130 70 - 130 Matrix Spil Prep Ty Prep %Rec. Limits 70 - 130	ke Dup pe: Tot Batch: Batch: <u>RPD</u> 8	al/N/ 9312

7

Client: WSP USA Inc. Project/Site: Tiger CS

# **QC Sample Results**

Job ID: 890-1387-1 SDG: 31403236.022.0129

Method: 300.0 - Anions, Ion Chromatography

Lab Sample ID: MB 880-928	21/1_A									nt Sam	ple ID: M	lathod	Blank
Matrix: Solid	, , , , , , , , , , , , , , , , , , ,								one	int San	-	ype: So	
Analysis Batch: 9303											Fieb i	ype. St	Juble
Analysis Datch. 5505		MB MB											
Analyte	-	ult Qualifier		RL		Unit		D	P	repared	Analy	zed	Dil Fac
Chloride		.00 U		5.00		mg/K	g				10/12/21		1
						Ū	•						
Lab Sample ID: LCS 880-92	281/2-A						Cli	ent	Sar	nple ID	: Lab Co	ntrol Sa	mple
Matrix: Solid											Prep T	ype: So	oluble
Analysis Batch: 9303													
			Spike		-	LCS					%Rec.		
Analyte			Added			Qualifier	Unit		D	%Rec	Limits		
Chloride			250	24	5.8		mg/Kg			99	90 - 110		
Lab Sample ID: LCSD 880-9	2281/2-1					· · ·	liont S	am	olo			Sample	
Matrix: Solid	5201/3-A						ment S	ann	hie	ID. Lat		ype: So	
Analysis Batch: 9303											гіері	ype. St	Juble
Analysis Daten. 5000			Spike	LC	SD	LCSD					%Rec.		RPD
Analyte			Added			Qualifier	Unit		D	%Rec	Limits	RPD	Limit
Chloride			250	254	1.3		mg/Kg		—	102	90 - 110	3	20
Lab Sample ID: 880-7069-A	-10-E MS								CI	ient Sa	mple ID:		
Matrix: Solid											Prep T	ype: So	oluble
Analysis Batch: 9303													
	Sample 3	-	Spike	-		MS					%Rec.		
Analyte	Result	Qualifier	Added			Qualifier	Unit		D	%Rec	Limits		
Chloride	20.5		497	54	7.9		mg/Kg			106	90 - 110		
Lab Sample ID: 880-7069-A	-10-E MSD						Client	t Sa	mn	א י <b>תו</b> או	latrix Spi	ko Dun	licato
Matrix: Solid							onen	. ou	ΠP			vpe: So	
Analysis Batch: 9303												, , , , , , , , , , , , , , , , , , , ,	
	Sample 3	Sample	Spike	M	SD	MSD					%Rec.		RPD
Analyte	Result	•	Added	Res	ult	Qualifier	Unit		D	%Rec	Limits	RPD	Limit
Chloride	20.5		497	54	3.0		mg/Kg		_	106	90 - 110	0	20
<u> </u>													

Released to Imaging: 3/14/2022 1:38:16 PM

**QC Association Summary** 

Client: WSP USA Inc. Project/Site: Tiger CS

## GC VOA

JUD ID. 08
SDG: 31403236.

4 5 6

Job ID: 890-1387-1 .022.0129

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1387-1	SS07	Total/NA	Solid	5035	
MB 880-8942/5-B	Method Blank	Total/NA	Solid	5035	
LCS 880-8942/1-A	Lab Control Sample	Total/NA	Solid	5035	
LCSD 880-8942/2-A	Lab Control Sample Dup	Total/NA	Solid	5035	
890-1382-A-1-G MS	Matrix Spike	Total/NA	Solid	5035	
890-1382-A-1-H MSD	Matrix Spike Duplicate	Total/NA	Solid	5035	
nalysis Batch: 9282	2				
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1387-1	SS07	Total/NA	Solid	8021B	8942
MB 880-8942/5-B	Method Blank	Total/NA	Solid	8021B	8942
LCS 880-8942/1-A	Lab Control Sample	Total/NA	Solid	8021B	8942
LCSD 880-8942/2-A	Lab Control Sample Dup	Total/NA	Solid	8021B	8942
890-1382-A-1-G MS	Matrix Spike	Total/NA	Solid	8021B	894
890-1382-A-1-H MSD	Matrix Spike Duplicate	Total/NA	Solid	8021B	8942
nalysis Batch: 9297	,				
Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1387-1	SS07	Total/NA	Solid	Total BTEX	
GC Semi VOA					

### Analysis Batch: 9261

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1387-1	SS07	Total/NA	Solid	8015B NM	9312
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015B NM	9312
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015B NM	9312
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015B NM	9312
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015B NM	9312
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015B NM	9312

## Prep Batch: 9312

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1387-1	SS07	Total/NA	Solid	8015NM Prep	
MB 880-9312/1-A	Method Blank	Total/NA	Solid	8015NM Prep	
LCS 880-9312/2-A	Lab Control Sample	Total/NA	Solid	8015NM Prep	
LCSD 880-9312/3-A	Lab Control Sample Dup	Total/NA	Solid	8015NM Prep	
890-1382-A-1-K MS	Matrix Spike	Total/NA	Solid	8015NM Prep	
890-1382-A-1-L MSD	Matrix Spike Duplicate	Total/NA	Solid	8015NM Prep	

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1387-1	SS07	Total/NA	Solid	8015 NM	

## HPLC/IC

#### Leach Batch: 9281

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
890-1387-1	SS07	Soluble	Solid	DI Leach	
MB 880-9281/1-A	Method Blank	Soluble	Solid	DI Leach	
LCS 880-9281/2-A	Lab Control Sample	Soluble	Solid	DI Leach	
LCSD 880-9281/3-A	Lab Control Sample Dup	Soluble	Solid	DI Leach	

Client: WSP USA Inc. Project/Site: Tiger CS

## HPLC/IC (Continued)

## Leach Batch: 9281 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	<b>Method</b>	Prep Batch
880-7069-A-10-E MS	Matrix Spike	Soluble	Solid	DI Leach	
880-7069-A-10-F MSD	Matrix Spike Duplicate	Soluble	Solid	DI Leach	

## Analysis Batch: 9303

Lab Sample ID	Client Sample ID	Ргер Туре	Matrix	Method	Prep Batch
890-1387-1	SS07	Soluble	Solid	300.0	9281
MB 880-9281/1-A	Method Blank	Soluble	Solid	300.0	9281
LCS 880-9281/2-A	Lab Control Sample	Soluble	Solid	300.0	9281
LCSD 880-9281/3-A	Lab Control Sample Dup	Soluble	Solid	300.0	9281
880-7069-A-10-E MS	Matrix Spike	Soluble	Solid	300.0	9281
880-7069-A-10-F MSD	Matrix Spike Duplicate	Soluble	Solid	300.0	9281

Page 322 of 331

Job ID: 890-1387-1 SDG: 31403236.022.0129

5 6

7 8 9

Job ID: 890-1387-1 SDG: 31403236.022.0129

## Client Sample ID: SS07 Date Collected: 10/08/21 12:56 Date Received: 10/08/21 15:56

Client: WSP USA Inc.

Project/Site: Tiger CS

Lab	Sample	ID:	890-1387-1
	-		Matrix: Solid

	Batch	Batch		Dilution	Batch	Prepared		
Prep Туре	Туре	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Prep	5035			8942	10/11/21 16:18	KL	XEN MID
Total/NA	Analysis	8021B		1	9282	10/12/21 20:05	KL	XEN MID
Total/NA	Analysis	Total BTEX		1	9297	10/12/21 10:57	KL	XEN MID
Total/NA	Analysis	8015 NM		1	9387	10/13/21 15:17	AJ	XEN MID
Total/NA	Prep	8015NM Prep			9312	10/12/21 14:04	DM	XEN MID
Total/NA	Analysis	8015B NM		1	9261	10/13/21 00:34	AJ	XEN MID
Soluble	Leach	DI Leach			9281	10/12/21 08:19	СН	XEN MID
Soluble	Analysis	300.0		1	9303	10/12/21 15:42	СН	XEN MID

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

**Accreditation/Certification Summary** 

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1387-1 SDG: 31403236.022.0129

Page 324 of 331

## Laboratory: Eurofins Xenco, Midland

Unless otherwise noted, all analytes for this laboratory were covered under each accreditation/certification below.

Authority	Pr	ogram	Identification Number	Expiration Date
Texas	NE	ELAP	T104704400-21-22	06-30-22
The full sector shall				
the following analytes the agency does not c		ort, but the laboratory is r	not certified by the governing authority.	This list may include analytes for whic
0,		ort, but the laboratory is r Matrix	Not certified by the governing authority. Analyte	This list may include analytes for whic
the agency does not o	offer certification.	, , , , , , , , , , , , , , , , , , ,	, , , , , ,	This list may include analytes for whic

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1387-1 SDG: 31403236.022.0129

Method	Method Description	Protocol	Laboratory
8021B	Volatile Organic Compounds (GC)	SW846	XEN MID
Total BTEX	Total BTEX Calculation	TAL SOP	XEN MID
8015 NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
8015B NM	Diesel Range Organics (DRO) (GC)	SW846	XEN MID
300.0	Anions, Ion Chromatography	MCAWW	XEN MID
5035	Closed System Purge and Trap	SW846	XEN MID
8015NM Prep	Microextraction	SW846	XEN MID
DI Leach	Deionized Water Leaching Procedure	ASTM	XEN MID

#### **Protocol References:**

ASTM = ASTM International

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates. TAL SOP = TestAmerica Laboratories, Standard Operating Procedure

#### Laboratory References:

XEN MID = Eurofins Xenco, Midland, 1211 W. Florida Ave, Midland, TX 79701, TEL (432)704-5440

Sample Summary

Client: WSP USA Inc. Project/Site: Tiger CS Job ID: 890-1387-1 SDG: 31403236.022.0129

Page 326 of 331

		<b></b>			
Lab Sample ID	Client Sample ID	Matrix	Collected	Received	Depth
890-1387-1	SS07	Solid	10/08/21 12:56	10/08/21 15:56	0.5

Revised Date 051418 Rev. 2018.			0			5
				active	terve and	3 10 10
			1/2-2-2 15512		Into I MAAA IN C	1 JUL
) Date/Time	Received by: (Signature)	Belinguished by: (Signature)	Date/Time	Bacaivad hv: (Signatura)	mished by: (Signatura)	Dolino
	<ol> <li>It assigns standard terms and conditions are due to circumstances beyond the control enforced unless previously negotiated.</li> </ol>		n client company to Xenco, its att iy losses or expenses incurred b submitted to Xenco, but not anal	Notice: Signature of this document and relinquishment of samples constitutes a valid purchase order from client company to Xenco, its attiliates and subcontractors of service. Xenco will be liable only for the cost of samples and shall not assume any responsibility for any losses or expenses incurred by the client if such losses of Xenco. A minimum charge of \$75.00 will be applied to each project and a charge of \$5 for each sample submitted to Xenco, but not analyzed. These terms will be	tature of this document and relinquishment o Xenco will be liable only for the cost of sampl minimum charge of \$75.00 will be applied to	Notice: Sign of service. ) of Xenco. A
2 NA SE LESE U V ZE 1631/245.1/7470/7471 : Hg	Ag SIO2	Cd Ca Cr Co Cu Fe Pb Mg Mn Mo Ni d Cr Co Cu Pb Mn Mo Ni Se Ag TI U	(as 11 Al Sb As Ba Be B 8RCRA Sb As Ba Be Cd	8RCRA 13PPM Texas 11 alyzed TCLP / SPLP 6010: 8RCF	Total 200.7 / 6010 200.8 / 6020: Circle Method(s) and Metal(s) to be analyzed	Total Circl
						Ī
						Π
					-	
Discrete			×	10/8/2021 12:56 0.5'	80SS	
Sample Comments			Numbe TPH (El BTEX (l Chlorid	Date Time Depth Sampled Sampled	Sample Identification Matrix	S
lab, if received by 4:30pm			PA 8	Total Containers:		Sample C
TAT starts the day recevied by the		890-1387 Chain of Custody	015) 0=80	Correction Factor: - 0.2	Seals: Yes No	Cooler Cu
			21)	NM-001	No Key	Received Intact:
			ers	Thermometer ID	2.4	Temperat
				(Yes No Wet Ice: Ces No	SAMPLE RECEIPT Temp Blank: (Ives No	SAMP
NAPP2123231376	-			Due Date:	s Name: Payton Benner	Sampler's Name:
				Rush: 2 DAY		P.O. Number:
CC:2027031001	0			Ro		Project Number:
Work Order Notes		ANALYSIS REQUEST		Turn Around	ame: Tiger CS	Project Name:
Other:	Deliverables: EDD ADaPT		Email: kalei.jennings@wsp.com, payton.benner@wsp.com	Email: kalei.jenning	817-683-2503	Phone:
	Devel III		Carlsbad, NM 88220	City, State ZIP:		City, State ZIP:
	State of Project:	State	3104 E Green Strret	g 1, Unit 222 Address:	3300 North A Street Bldg 1, Unit 222	Address:
Ids TRC Derfund	Program: UST/PST CRP Crownfields	Progran	ne: XTO	Company Name:		Company Name:
mments	Work Order Comments		n) Adrian Baker	Bill to: (if different)	anager: Kalei Jennings	Project Manager:
<sup>9</sup> age1 of1	www.xenco.com	Mildland,TX (432-704-5440) EL Paso,TX (915)585-3443 Lubbock,TX (806)794-1296 Hobbs,NM (575-392-7550) Phoenix,AZ (480-355-0900) Atlanta,GA (770-449-8600) Tampa,FL (813-620-2000)	440) EL Paso,TX (915)585-34 AZ (480-355-0900) Atlanta,G <i>P</i>	Midland,TX (432-704-5- Hobbs,NM (575-392-7550) Phoenix,	LABORATORIES	
		Houston,TX (281) 240-4200 Dallas,TX (214) 902-0300 San Antonio,TX (210) 509-3334	00 Dallas,TX (214) 902-0300	Houston,TX (281) 240-42		)
	Work Order No:	Istodv	Chain of Custody			

Page 327 of 331

A Yes A No	Relinquished by Date/Time	Relinquished by Date/Time	Joe Cuf 10.11.21			equested          IV Other (specify)	Possible Hazard Identification Unconfirmed	Involve super laboratory accreditations are subject to change, currolins Xenco LLC places the ownership of method analyte & accreditation compliance upon out subcontract laboratories maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed the samples must be shipped back to the Eurofins Xenco LLC laboratory or other instru attention immediately If all requested accreditations are current to date return the signed Chain of Custody attesting to said complicance to Eurofins Xenco LLC.									SS08 (890-1387-1) 10		Sample Identification - Client ID (Lab ID) Samp	Site SSOW#	ect Name er CS	Email WO#	Phone po #: 432-704-5440(Tel)	State Zip TX, 79701	City TAT Re Midland	1 W Florida Ave	y 18 Xenco	Client Contact: Shipping/Receiving	ormation (Sub Contract Lab)	1089 N Canal St Carlsbad NM 88220 Phone 575-988-3199 Fax 575-988-3199	Eurofins Xenco, Carlsbad
	me	me:	me 1221		ily Deliver	n Delivers		e ownership alyzed the sa Chain of Cu									10/8/21	Å	Sample Date	<b>.</b>	# 1004				TAT Requested (days):	Due Date Requested 10/13/2021					
				Date		Primany Deliverable Rank 2		of method an amples must by stody attesting									12 56 Mountain	X	Sample Time						ays):	ed				Chain (	
			K					alyte & accredit e shipped back to said complic										Preserval	Sample Type (C=comp, G=grab)											Chain of Custody Record	
	Company	Company	) UQX S					to the Eurofins ance to Eurofi									Solid	Preservation Code:	Matrix (W=water S=solid, O=waste/oll, BT=Tissue, A=Air)									E-Mail jessic	Lab PM Kramer	tody R	
			[O]	Time		3	Sa	ce upon Xenco L 1s Xenco		-			<b>—</b>		-			X	Field Filtered S Perform MS/MS	000000000000000000000000000000000000000	contractory/mob	Stone - Mart	») 				Accreditations Required (See note) NELAP - Louisiana NELAP	E-Mail lessica kramer@eurofinset.com		eco	
Coole	Recei	Receiv	Recei	1	special instructions/QC		Sample Disposal ( A fe	LC lab			1						X		8016MOD_NM/80	015NM	I_S_Pri	ep (MO	D) Ful	TPH			Accreditations Required (See note	ner@c	Jessica	rd	
Cooler Temperature(s) °C	Received by	ved by	Received by		nstruc	Instructions/OC	Disp	contrac oratory					<b> </b>				×		8015MOD_Calc								Requirt uisian	eurofi			
erature			1	Þ	Ctions		bsal (	☆ labor or othe					<u> </u>	ļ			×		300_ORGFM_280 8021B/5035FP_C				de				ad (Set	nset.c			
e(s) °C			1				Afe	atories er instr	-				<u> </u>				××		Total_BTEX_GC		ю <b>р)</b> в					Ana	e note) ELAP	om			
					Requ		e maj	uctions	-	+										• • · ·					'	lysis	- Texas				_
and Other Remarks.					Kequirements			sampli will be		1																Analysis Requested	as				
∍marks						uspo	Isses	e shipn 9 provic																		lues		State New	Carrie		
				Methc		Disposal by Lab	sedi	nentis Jed A																		ted		State of Origin. New Mexico	Carrier Tracking No(s)		
Ļ				nd of Si		y Lao	' san	forwar ny cha	ļ																			8 🗐	king No		
	Date/Time	Date/Time:	Date/Time	Method of Shipment:			nples	rded un nges to			 																		)(s)		
	me.	me:	me				arer	) der ch.																							
						AIG	etain	ain-of-	-						Citter .			X	Total Number c	of cor	Iteiner	s 🥢		19. V.						•	
						AICHIVE FOR	ed lo	າ status	<u>oceline</u>	en e		opatriali		and the second second	and the second second	oracitaite 220				Other-		J-D8	IG⊺ ≳≥≸	C - Zn Acetate D Nitric Acid E NaHSO4	B NaO	Prese	7068 -/	Page Page	COC No 890-456 1	ې eurofins	3
						9	nger	/ If the											Spe	·	EDTA EDA	I Ice J - DI Water	MeUH Amchlor Ascorbic Acid	n Aceta Itric Aci aHSO4	a C H	ervatio	Job #: 890-1387-1	<sub>Page</sub> Page 1 of 1	No <sup>-</sup> 456 1	urot	
							than	∍ labor: d be br										$\ $	cial Ir				Acid	die	5	Preservation Codes	-			fins	ł
┢	S	S	Col				e may be assessed if samples are retained longer than 1 month)	atory di ought t										1	nstru		NŚ	< c ·	H on zz	0,000	zz	des					
	Company	Company	Company			Months	nth)	S This sample shipment is forwarded under chain-of-custody If the laboratory does not currently tructions will be provided Any changes to accreditation status should be brought to Eurofins Xenco LLC										$\left  \right $	Special Instructions/Note		pH 4-5 other (specify)	V - MCAA	Na2S2O3 H2SO4 TSP Dodecato	AsNaO2 Na2O4S Na2SO3	M - Hexane					Environment Testing America	
								100 LLC											Ÿ			yulato	ideate							esting	

Job Number: 890-1387-1

SDG Number: 31403236.022.0129

List Source: Eurofins Xenco, Carlsbad

## Login Sample Receipt Checklist

Client: WSP USA Inc.

### Login Number: 1387 List Number: 1 Creator: Clifton, Cloe

<6mm (1/4").

Question	Answer	Comment	
The cooler's custody seal, if present, is intact.	True		
Sample custody seals, if present, are intact.	True		
The cooler or samples do not appear to have been compromised or tampered with.	True		Ī
Samples were received on ice.	True		ï
Cooler Temperature is acceptable.	True		
Cooler Temperature is recorded.	True		ī
COC is present.	True		
COC is filled out in ink and legible.	True		
COC is filled out with all pertinent information.	True		
Is the Field Sampler's name present on COC?	True		
There are no discrepancies between the containers received and the COC.	True		2
Samples are received within Holding Time (excluding tests with immediate HTs)	True		
Sample containers have legible labels.	True		
Containers are not broken or leaking.	True		
Sample collection date/times are provided.	True		
Appropriate sample containers are used.	True		
Sample bottles are completely filled.	True		
Sample Preservation Verified.	N/A		
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True		
Containers requiring zero headspace have no headspace or bubble is	N/A		

# Login Sample Receipt Checklist

Client: WSP USA Inc.

#### Login Number: 1387 List Number: 2 Creator: Lowe, Katie

Creator: Lowe, Katie		
Question	Answer	Comment
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	

Containers requiring zero headspace have no headspace or bubble is True <6mm (1/4").

14

## Job Number: 890-1387-1 SDG Number: 31403236.022.0129

List Creation: 10/12/21 11:46 AM

List Source: Eurofins Xenco, Midland

District I 1625 N. French Dr., Hobbs, NM 88240 Phone: (575) 393-6161 Fax: (575) 393-0720 District II

811 S. First St., Artesia, NM 88210 Phone:(575) 748-1283 Fax:(575) 748-9720

District III

1000 Rio Brazos Rd., Aztec, NM 87410 Phone:(505) 334-6178 Fax:(505) 334-6170

District IV 1220 S. St Francis Dr., Santa Fe, NM 87505 Phone:(505) 476-3470 Fax:(505) 476-3462

# **State of New Mexico Energy, Minerals and Natural Resources Oil Conservation Division** 1220 S. St Francis Dr. Santa Fe, NM 87505

CONDITIONS

Operator:	OGRID:
XTO ENERGY, INC	5380
6401 Holiday Hill Road	Action Number:
Midland, TX 79707	60501
	Action Type:
	[C-141] Release Corrective Action (C-141)

#### CONDITIONS

Created By Condition

We have received your closure report and final C-141 for Incident #NAPP2123231376 TIGER COMPRESSOR STATION, thank you. This closure is approved. 3/14/2022 rhamlet

CONDITIONS

Action 60501

Condition Date