

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

QUESTIONS

Action 137076

QUESTIONS

Operator: ADVANCE ENERGY PARTNERS HAT MESA, LLC 11490 Westheimer Rd., Ste 950 Houston, TX 77077	OGRID: 372417
	Action Number: 137076
	Action Type: [NOTIFY] Notification Of Release (NOR)

QUESTIONS

Location of Release Source	
<i>Please answer all of the questions in this group.</i>	
Site Name	20220510-1209-dc Wool Head A Pad
Date Release Discovered	08/16/2022
Surface Owner	State

Incident Details	
<i>Please answer all of the questions in this group.</i>	
Incident Type	Produced Water Release
Did this release result in a fire or is the result of a fire	No
Has this release reached or does it have a reasonable probability of reaching a watercourse	No
Has this release endangered or does it have a reasonable probability of endangering public health	No
Has this release substantially damaged or will it substantially damage property or the environment	No
Is this release of a volume that is or may with reasonable probability be detrimental to fresh water	No

Nature and Volume of Release	
<i>Material(s) released, please answer all that apply below. Any calculations or specific justifications for the volumes provided should be attached to the follow-up C-141 submission.</i>	
Crude Oil Released (bbls) Details	Not answered.
Produced Water Released (bbls) Details	Cause: Other Other (Specify) Produced Water Released: 17 BBL Recovered: 0 BBL Lost: 17 BBL]
Is the concentration of dissolved chloride in the produced water >10,000 mg/l	Yes
Condensate Released (bbls) Details	Not answered.
Natural Gas Vented (Mcf) Details	Not answered.
Natural Gas Flared (Mcf) Details	Not answered.
Other Released Details	Not answered.
Are there additional details for the questions above (i.e. any answer containing Other, Specify, Unknown, and/or Fire, or any negative lost amounts)	Release of treated recycled produced water during drilling and completion operations

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QUESTIONS, Page 2

Action 137076

QUESTIONS (continued)

Operator: ADVANCE ENERGY PARTNERS HAT MESA, LLC 11490 Westheimer Rd., Ste 950 Houston, TX 77077	OGRID: 372417
	Action Number: 137076
	Action Type: [NOTIFY] Notification Of Release (NOR)

QUESTIONS

Nature and Volume of Release (continued)	
Is this a gas only submission (i.e. only significant Mcf values reported)	No, according to supplied volumes this does not appear to be a "gas only" report.
Was this a major release as defined by 19.15.29.7(A) NMAC	No, minor release.
Reasons why this would be considered a submission for a notification of a major release	
If YES, was immediate notice given to the OCD, by whom	Not answered.
If YES, was immediate notice given to the OCD, to whom	Not answered.
If YES, was immediate notice given to the OCD, when	Not answered.
If YES, was immediate notice given to the OCD, by what means (phone, email, etc.)	Not answered.
With the implementation of the 19.15.27 NMAC (05/25/2021), venting and/or flaring of natural gas (i.e. gas only) are to be submitted on the C-129 form.	

Initial Response

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

The source of the release has been stopped	True
The impacted area has been secured to protect human health and the environment	True
Released materials have been contained via the use of berms or dikes, absorbent pads, or other containment devices	Not answered.
All free liquids and recoverable materials have been removed and managed appropriately	Not answered.
If all the actions described above have not been undertaken, explain why	After demobilizing of drilling and completion equipment free standing fluid was no longer present.

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 prepare and attach a narrative of actions to date in the follow-up C-141 submission. 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 prepare and attach all information needed for closure evaluation in the follow-up C-141 submission.

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ACKNOWLEDGMENTS

Action 137076

ACKNOWLEDGMENTS

Operator: ADVANCE ENERGY PARTNERS HAT MESA, LLC 11490 Westheimer Rd., Ste 950 Houston, TX 77077	OGRID: 372417
	Action Number: 137076
	Action Type: [NOTIFY] Notification Of Release (NOR)

ACKNOWLEDGMENTS

<input checked="" type="checkbox"/>	I acknowledge that I am authorized to submit notification of a releases on behalf of my operator.
<input checked="" type="checkbox"/>	I acknowledge that upon submitting this application, I will be creating a new incident file (assigned to my operator) to track the notification(s) and corrective action(s) for a release, pursuant to NMAC 19.15.29.
<input checked="" type="checkbox"/>	I acknowledge that creating a new incident file will require my operator to file subsequent submission(s) of form "C-141, Application for administrative approval of a release notification and corrective action", pursuant to NMAC 19.15.29.
<input checked="" type="checkbox"/>	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.
<input checked="" type="checkbox"/>	I acknowledge the fact that 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.
<input checked="" type="checkbox"/>	I acknowledge the fact that, 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.

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CONDITIONS

Action 137076

CONDITIONS

Operator: ADVANCE ENERGY PARTNERS HAT MESA, LLC 11490 Westheimer Rd., Ste 950 Houston, TX 77077	OGRID: 372417
	Action Number: 137076
	Action Type: [NOTIFY] Notification Of Release (NOR)

CONDITIONS

Created By	Condition	Condition Date
aparker	When submitting future reports regarding this release, please submit the calculations used or specific justification for the volumes reported on the initial C-141.	8/23/2022

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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	nAPP2223550380
District RP	
Facility ID	
Application ID	

Release Notification

Responsible Party

Responsible Party: Advance Energy Partners Hat Mesa LLC	OGRID: 372417
Contact Name: Andrew Parker	Contact Telephone: 832-672-4700 (office)
Contact email: aparker@ameredev.com	Incident # (assigned by OCD)
Contact mailing address: 11490 Westheimer Rd. Suite 950. Houston, TX 77077	

Location of Release Source

Latitude 32.4574863 _____ Longitude -103.588739 _____
(NAD 83 in decimal degrees to 5 decimal places)

Site Name 20220510-1209-dc Wool Head A Pad	Site Type Production Site
Date Release Discovered 08/16/2022	API# (if applicable)

Unit Letter	Section	Township	Range	County
P	20	21S	33E	Lea

Surface Owner: ☒ State ☐ Federal ☐ Tribal ☐ Private (Name: _____)

Nature and Volume of Release

Material(s) Released (Select all that apply and attach calculations or specific justification for the volumes provided below)

<input type="checkbox"/> Crude Oil	Volume Released (bbls)	Volume Recovered (bbls)
<input checked="" type="checkbox"/> Produced Water	Volume Released (bbls) 17.5	Volume Recovered (bbls) 0
	Is the concentration of dissolved chloride in the produced water >10,000 mg/l?	<input type="checkbox"/> Yes <input type="checkbox"/> No
<input type="checkbox"/> Condensate	Volume Released (bbls)	Volume Recovered (bbls)
<input type="checkbox"/> Natural Gas	Volume Released (Mcf)	Volume Recovered (Mcf)
<input type="checkbox"/> Other (describe)	Volume/Weight Released (provide units)	Volume/Weight Recovered (provide units)

Cause of Release Release of treated recycled produced water during drilling and completion operations

Initial Response

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

Released to Imaging: 1/10/2023 9:43:45 AM

Spill Dimensions to Volume of Release			
Input	volume of affected soil	[feet^3]	2806.50
Input	Porosity: typically is .35 to .40 for most soils	[-]	0.35
Input	Proportion of porosity filled with release fluid [0,1]	[-]	0.10
Output	volume of fluid	[feet^3]	98.2
		[gal]	734.8
		Barrels	17.5

From GIS

Sq. Ft 33678

Depth (ft) 0.08

Cu. Ft 2806.5

Incident ID	nAPP2223550380
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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? <u>Plate 2</u>	<u>>100</u> (ft bgs)
Did this release impact groundwater or surface water?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of a continuously flowing watercourse or any other significant watercourse? <u>Plate 4</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> 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)? <u>Plate 4</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of an occupied permanent residence, school, hospital, institution, or church? <u>Plate 5</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> 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? <u>Plate 3</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 1000 feet of any other fresh water well or spring? <u>Plate 3</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within incorporated municipal boundaries or within a defined municipal fresh water well field? <u>Plate 3</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within 300 feet of a wetland? <u>Plate 6</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release overlying a subsurface mine? <u>Plate 7</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release overlying an unstable area such as karst geology? <u>Plate 8</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Are the lateral extents of the release within a 100-year floodplain? <u>Plate 9</u>	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Did the release impact areas not on an exploration, development, production, or storage site?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> 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.*

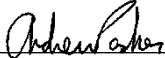
- ☒ Scaled site map showing impacted area, surface features, subsurface features, delineation points, and monitoring wells.
- ☒ Field data
- ☒ Data table of soil contaminant concentration data
- ☒ Depth to water determination
- ☒ Determination of water sources and significant watercourses within ½-mile of the lateral extents of the release
- ☒ Boring or excavation logs
- ☒ Photographs including date and GIS information
- ☒ 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.

State of New Mexico
Oil Conservation Division

Incident ID	nAPP2223550380
District RP	
Facility ID	
Application ID	

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.

Printed Name: Andrew ParkerTitle: Env. ScientistSignature: Date: December 12, 2022email: aparker@ameredev.comTelephone: 970-570-9535**OCD Only**Received by: Jocelyn HarimonDate: 12/12/2022

Incident ID	nAPP2223550380
District RP	
Facility ID	
Application ID	

Remediation Plan

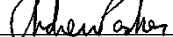
Remediation Plan Checklist: *Each of the following items must be included in the plan.*

- ☐ Detailed description of proposed remediation technique
- ☒ Scaled sitemap with GPS coordinates showing delineation points
- ☐ Estimated volume of material to be remediated
- ☒ Closure criteria is to Table 1 specifications subject to 19.15.29.12(C)(4) NMAC
- ☒ Proposed schedule for remediation (note if remediation plan timeline is more than 90 days OCD approval is required)

Deferral Requests Only: *Each of the following items must be confirmed as part of any request for deferral of remediation.*

- ☒ Contamination must be in areas immediately under or around production equipment where remediation could cause a major facility deconstruction.
- ☒ Extents of contamination must be fully delineated.
- ☒ Contamination does not cause an imminent risk to human health, the environment, or groundwater.

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.

Printed Name: Andrew ParkerTitle: Env. ScientistSignature: Date: December 12, 2022email: aparker@ameredev.comTelephone: 970-570-9535**OCD Only**Received by: Jocelyn Harimon Date: 12/12/2022

☐ Approved ☐ Approved with Attached Conditions of Approval ☐ Denied ☐ Deferral Approved

Signature: _____

Date: _____

Incident ID	nAPP2223550380
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.

Closure Report Attachment Checklist: *Each of the following items must be included in the closure report.*

- ☒ A scaled site and sampling diagram as described in 19.15.29.11 NMAC
- ☐ Photographs of the remediated site prior to backfill or photos of the liner integrity if applicable (Note: appropriate OCD District office must be notified 2 days prior to liner inspection)
- ☒ Laboratory analyses of final sampling (Note: appropriate ODC District office must be notified 2 days prior to final sampling)
- ☐ Description of remediation activities

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. The responsible party acknowledges they must substantially restore, reclaim, and re-vegetate the impacted surface area to the conditions that existed prior to the release or their final land use in accordance with 19.15.29.13 NMAC including notification to the OCD when reclamation and re-vegetation are complete.

Printed Name: Andrew Parker

Title: Env. Scientist

Signature: 

Date: December 12, 2022 rev

email: aparker@ameredev.com

Telephone: 970-570-9535

OCD Only

Received by: Jocelyn Harimon

Date: _____

Closure approval by the OCD does not relieve the responsible party of liability should their operations have failed to adequately investigate and remediate contamination that poses a threat to groundwater, surface water, human health, or the environment nor does not relieve the responsible party of compliance with any other federal, state, or local laws and/or regulations.

Closure Approved by:  Date: 01/10/2023

Printed Name: Jennifer Nobui

Title: Environmental Specialist A



11490 Westheimer Road, Suite 950, Houston, Texas 77077 • Phone 832-672-4700 • Fax 832-672-4609

December 12, 2022

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

RE: Revised Closure/Deferral Report
Incident ID: nAPP2223550380
Wool Head 20 State Com 608H "A" Pad
AEP #: 20220510-1209-dc

NMOCD:

Advance Energy Partners Hat Mesa LLC respectfully submits this revised characterization report and deferral request for incident number nAPP2223550380.

Prior submission was denied on November 23, 2022 due to inadequate lateral delineation for deferral request of the release extent on an active production site. Communication is attached in Appendix A. This report includes requested lateral delineation sample information with updated tables and plates.

- Deferral Request Denied. Please complete lateral delineation at locations CS-04 and CS-08. Please make sure all lateral delineation samples are delineated to 600 mg/kg for chlorides to define the edge of the release on pad, regardless of depth to groundwater. Please resubmit a revised Deferral Request to the OCD portal by December 23, 2022.

The release was discovered on August 16, 2022, on the eastern half of Wool Head 20 State Com 608H ("A" Pad) production site (Figure 1). Surface is State owned. Field investigations suggest that the release of treated *recycled* produced water occurred during drilling and completion operations. During field evaluation of the location, the impacted area was determined to be 56,370 sq. ft. The release did not impact surface or groundwater.

Incident ID: nAPP2223550380

Woolhead A Pad

AEP #: 20220510-1209-dc



*Figure 1: Release extent view from southern extent facing northeast.
Photo Source: Merchant Livestock*

Characterization

The following sections address items as described in 19.15.29.11.A, paragraphs 1- 4. Please refer to the C-141 characterization checklist for additional setback criteria and verification (Plates 2-9).

1.1. Site Map

Horizontal extent of the discharge was determined by visual observations and field screening for electrical conductivity. The discharge extent mapping utilized GPS technology with sub-meter accuracy.

Plate 1 shows the release extent relative to the Woolhead A Pad production site. The coordinates of the release area are 32.4574863, -103.588739 (Lat, Long; NAD83). The discharge extent covered approximately 56,370 sq feet.

1.2. Depth to Ground Water

The nearest depth-to-water boring relative to the release extent is mapped on Plate 2. The Office of the State Engineer well log is attached in Appendix B:

- MISC-402 (CP-1880) located 0.07-miles northwest of the release extent with a depth to water of >105 ft. dated 10/08/2021. The borehole is plugged.

Incident ID: nAPP2223550380

Woolhead A Pad

AEP #: 20220510-1209-dc

1.3. Wellhead Protection Area

Plate 3 shows that the release extent is:

- Not within incorporated municipal boundaries or within a defined municipal fresh water well field.
- Not within ½-mile private and domestic water sources (wells and springs).
- Not 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
- Not within 1000 feet of any other fresh water well or spring.

1.4. Distance to Nearest Significant Water Course

Plate 4 shows that the release extent is:

- Not within ½ mile of any significant water course.
- Not within 300 feet of a continuously flowing watercourse or any other significant watercourse.
- Not within 200 feet of any lakebed, sinkhole, or playa lake (measured from the ordinary high-water mark).

1.5. Soil/Waste Characteristics

The release occurred in an area where depth to water is greater than 100 ft below ground surface (bgs) and on an active production site used for oil and gas operations. The release occurred in:

- Kermit soils and Dune Land, 0 to 12 percent slopes, and
- Pyote soils and Dune land.

The USDA Natural Resources Conservation Service (NRCS)¹ soil survey describes the upper 60 inches (5 ft) of lithology as:

Kermit soils and Dune land:

- A - 0 to 8 inches: fine sand
- C - 8 to 60 inches: fine sand

Pyote soils and Dune land:

- A - 0 to 30 inches: fine sand
- Bt - 30 to 60 inches: fine sandy loam

The lithology as described by the NRCS is consistent with observed remediation and construction activities through the area of interest.

On October 19, 2022, Advance Energy Partners proceeded with comprehensive sampling for horizontal and vertical delineation of the release on the active production site to determine release extent and to evaluate constituents of concern. Soil samples were collected at the surface for horizontal delineation and core samples at specified depths below the surface to evaluate the vertical extent of impacted soil. On December 2, 2022, Advance Energy Partners additionally

¹ <https://websoilsurvey.sc.egov.usda.gov/App/WebSoilSurvey.aspx>

Incident ID: nAPP2223550380

Woolhead A Pad

AEP #: 20220510-1209-dc

sampled for requested lateral delineation.

Analysis of constituents of concern showed that all soil samples met Closure Criteria, defined below, according to Table 1 of 19.15.29 NMAC for the release area on an active production site that is in use for oil and gas operations and where depth to water is > 100 ft. Lateral/horizontal delineation of release extent to 600 mg/kg for chlorides is also demonstrated.

- Chloride < 20,000 mg/kg
- TPH (GRO + DRO + MRO) < 2,500 mg/kg
- TPH (GRO + DRO) < 1,000 mg/kg
- BTEX < 50 mg/kg
- Benzene < 10 mg/kg

Plate 10 rev shows sample locations. Table A rev identifies sample point coordinates. Table B rev is a Summary of Analytical. Certificates of Analysis are included in Appendix C.

2. Deferral Request

Advance Energy Partners respectfully asks NMOCD for deferral of impacted areas on the active production site. This area meets the criteria for deferral request as defined in 19.15.29.12.C.(2):

- On an active production site for oil and gas operations.
- Contamination must be in areas immediately under or around production equipment where remediation could cause a major facility deconstruction.
- Extents of contamination must be fully delineated.
- Contamination does not cause an imminent risk to human health, the environment, or groundwater.

Analysis of samples obtained for horizontal and vertical delineation of the release extent on the active production site demonstrated that constituents of concern met the standards of Table I of 19.15.29.12 NMAC, where groundwater > 100 ft below ground surface as defined above. Lateral/horizontal delineation at GS-04 E and GS-08 NW also demonstrates that chlorides are < 600 mg/kg. No other constituents of concern were elevated beyond most stringent closure criteria.

If NMOCD determines that analytical results meet Closure Criteria concentrations as listed in Table 1 of 19.15.29 NMAC for an active production site, a C-141 Closure Form is attached for approval.

12/12/2022

Incident ID: nAPP2223550380

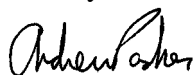
Woolhead A Pad

AEP #: 20220510-1209-dc

Remediation, restoration, and reclamation shall take place in accordance with 19.15.29.13 A-D NMAC when the production site is no longer in-use for oil and gas operations.

Please contact me with any questions.

Sincerely,



Andrew Parker

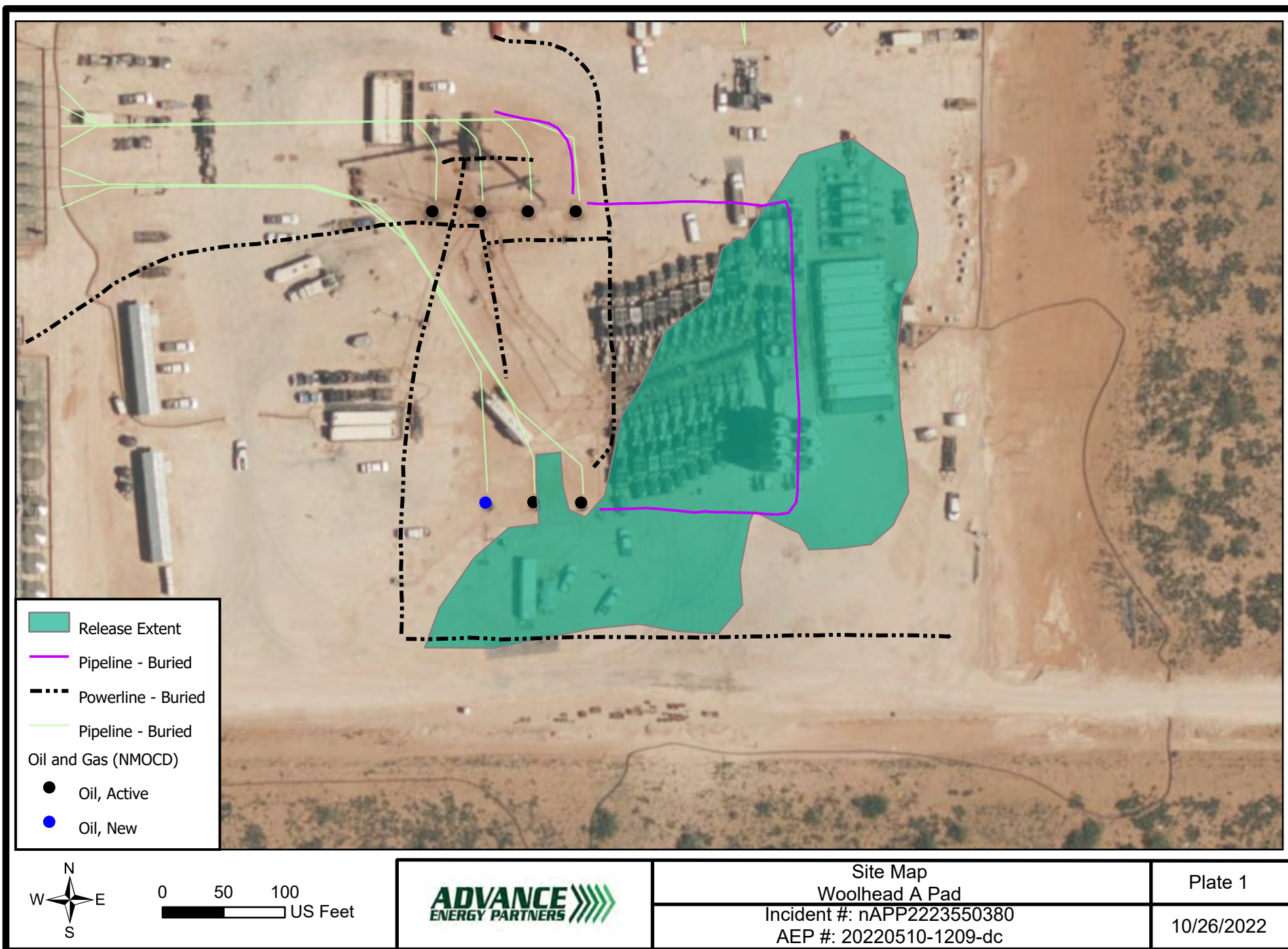
Ameredev Operating, on the behalf of Advance Energy Partners, LLC

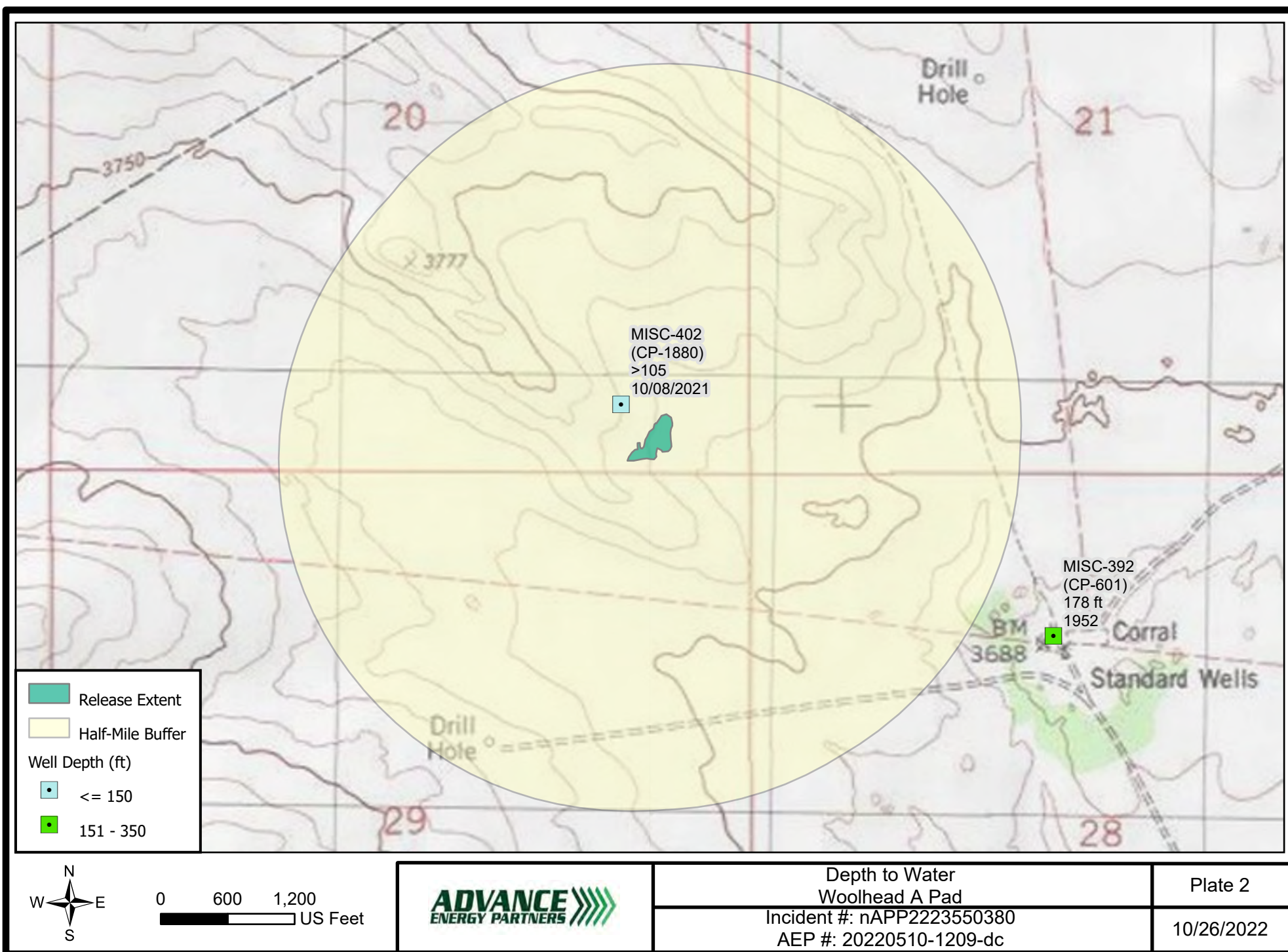
Environmental Scientist

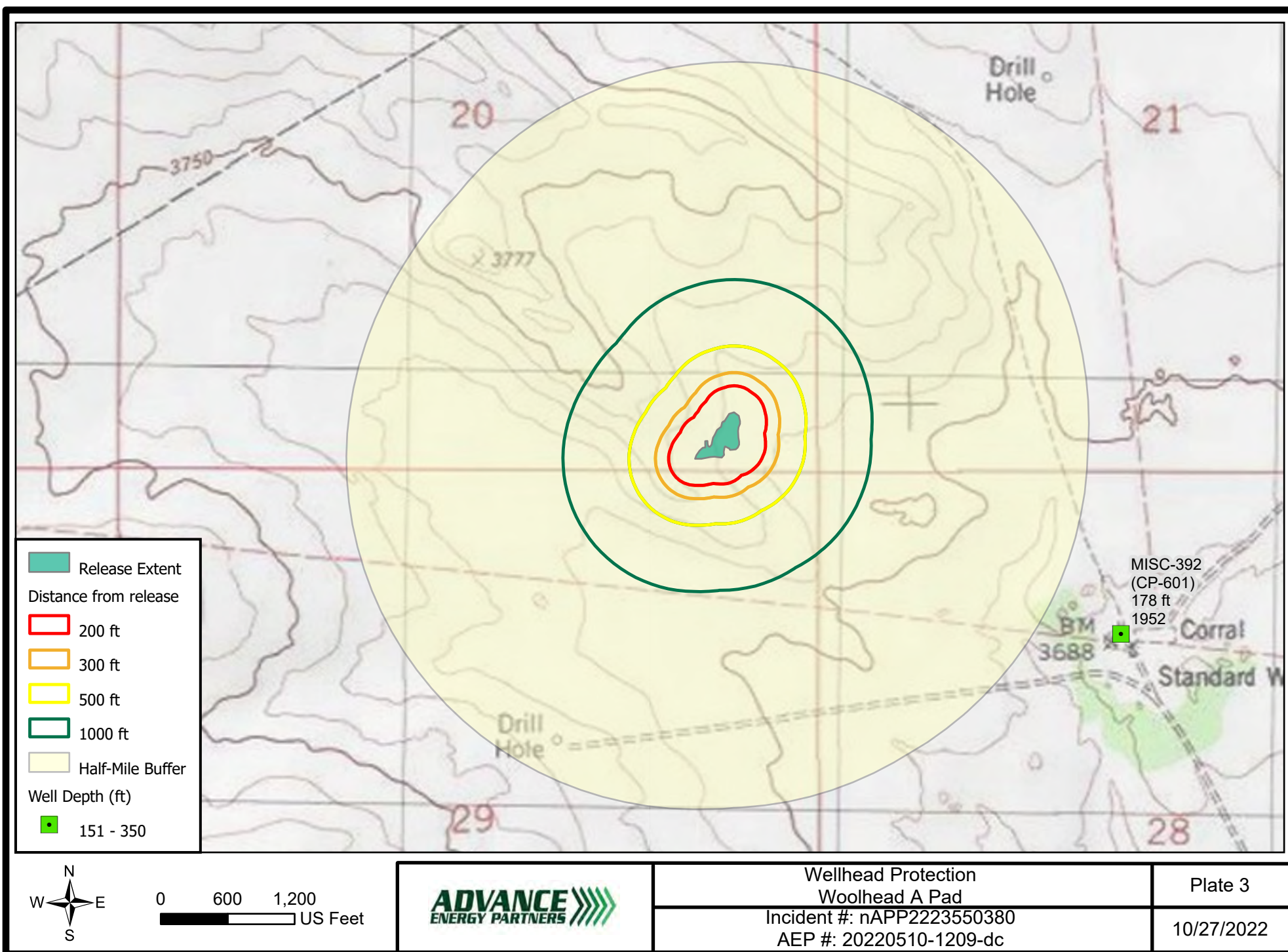
12/12/2022

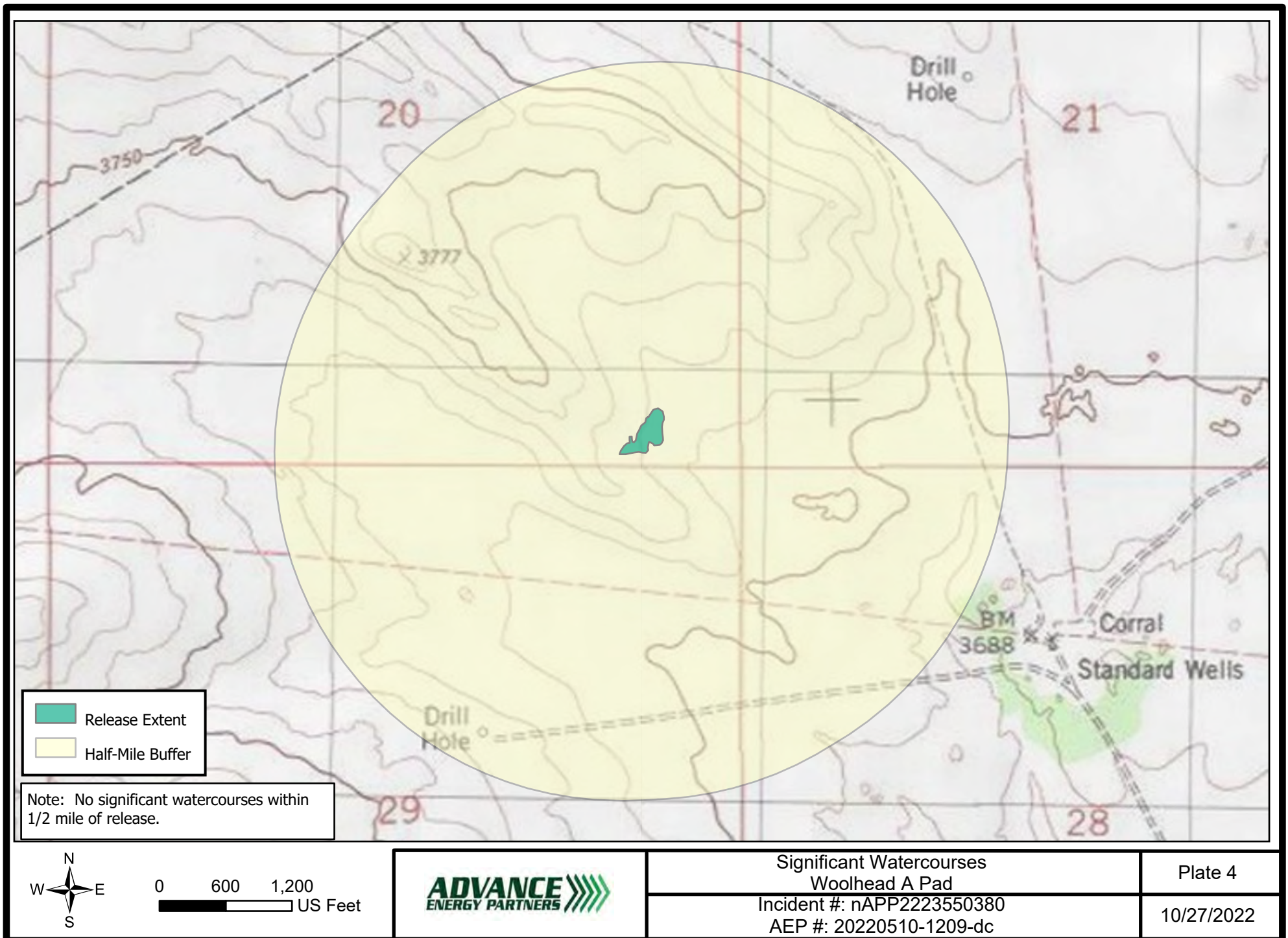
Plates

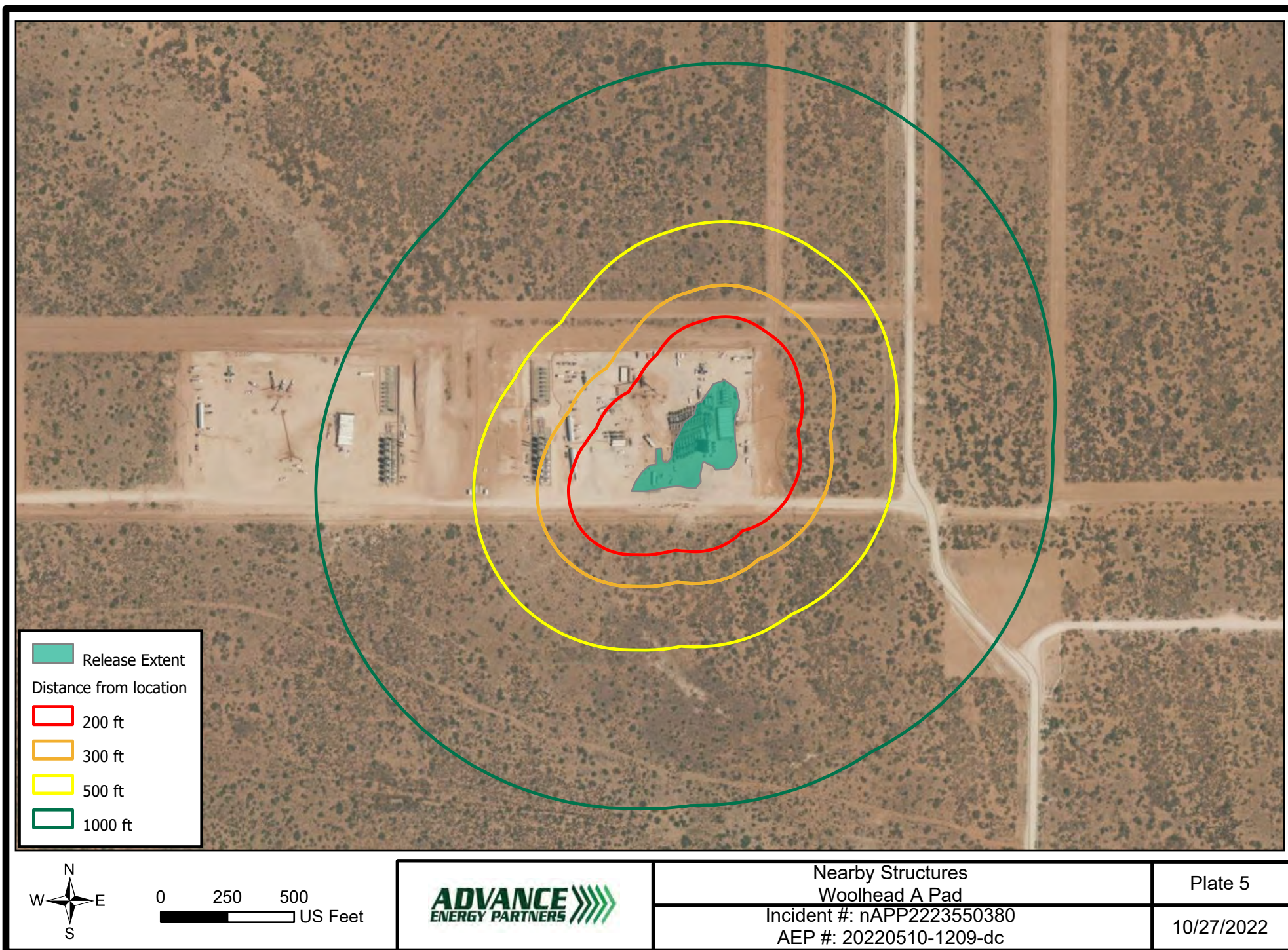


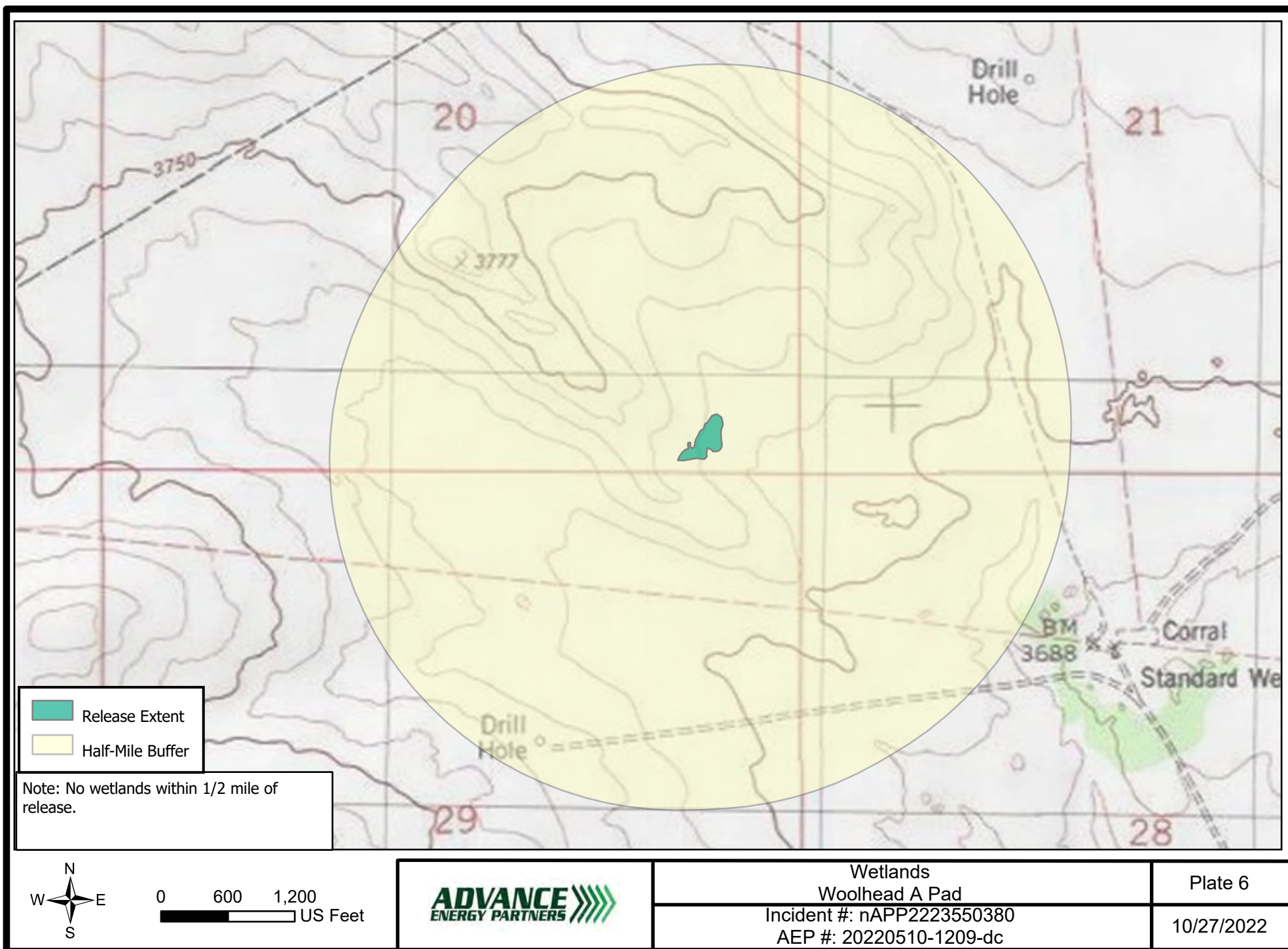


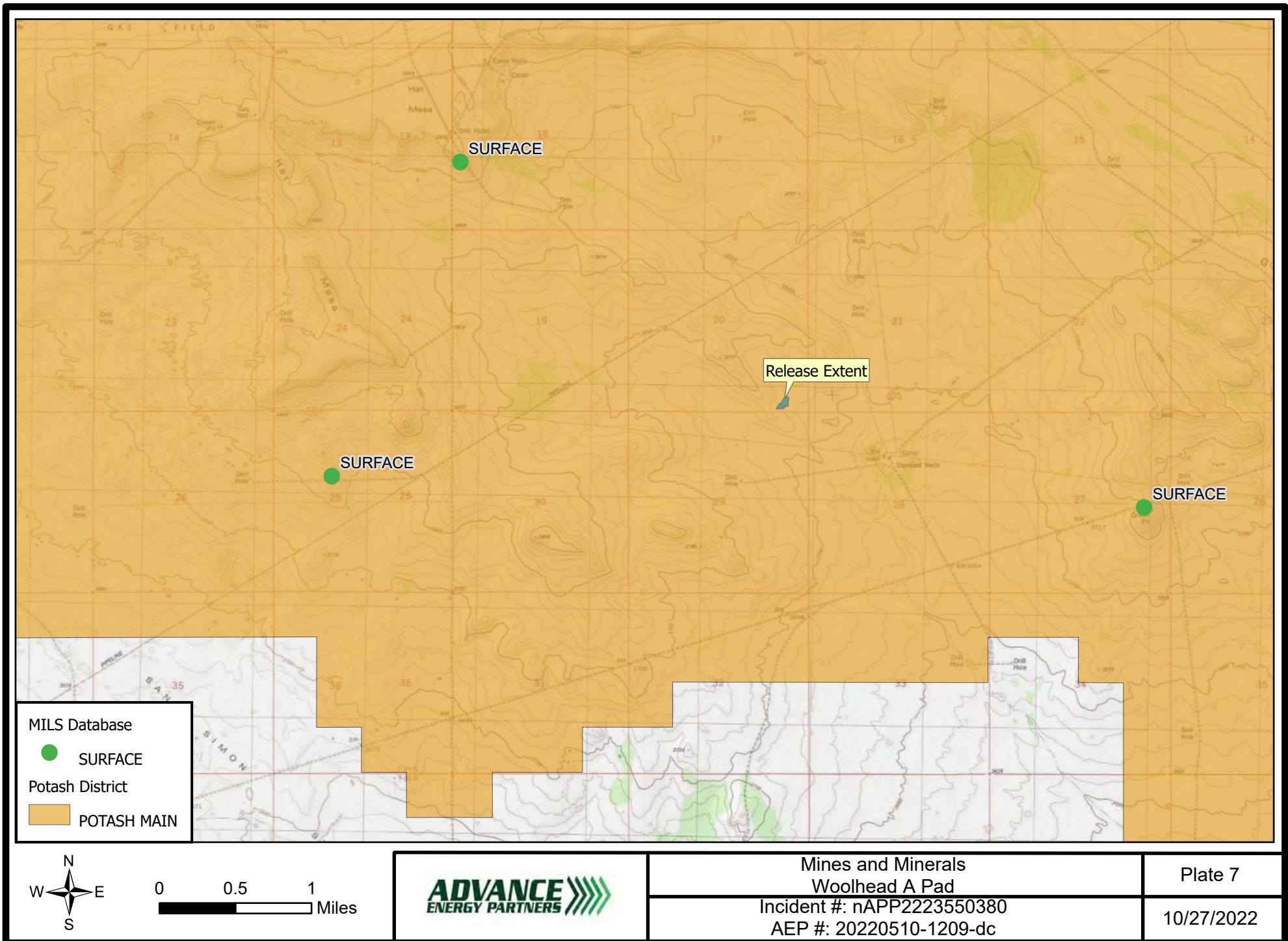


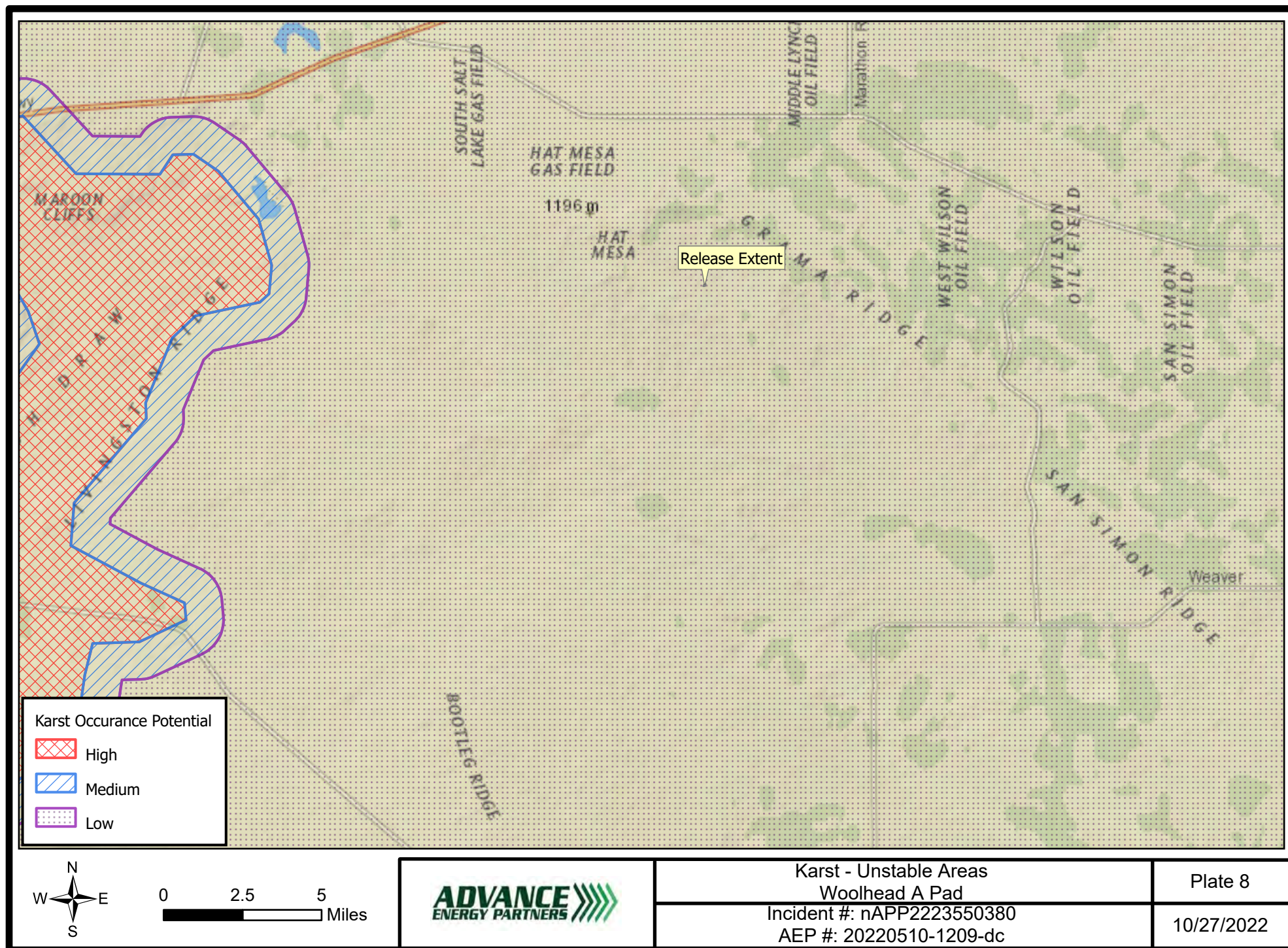


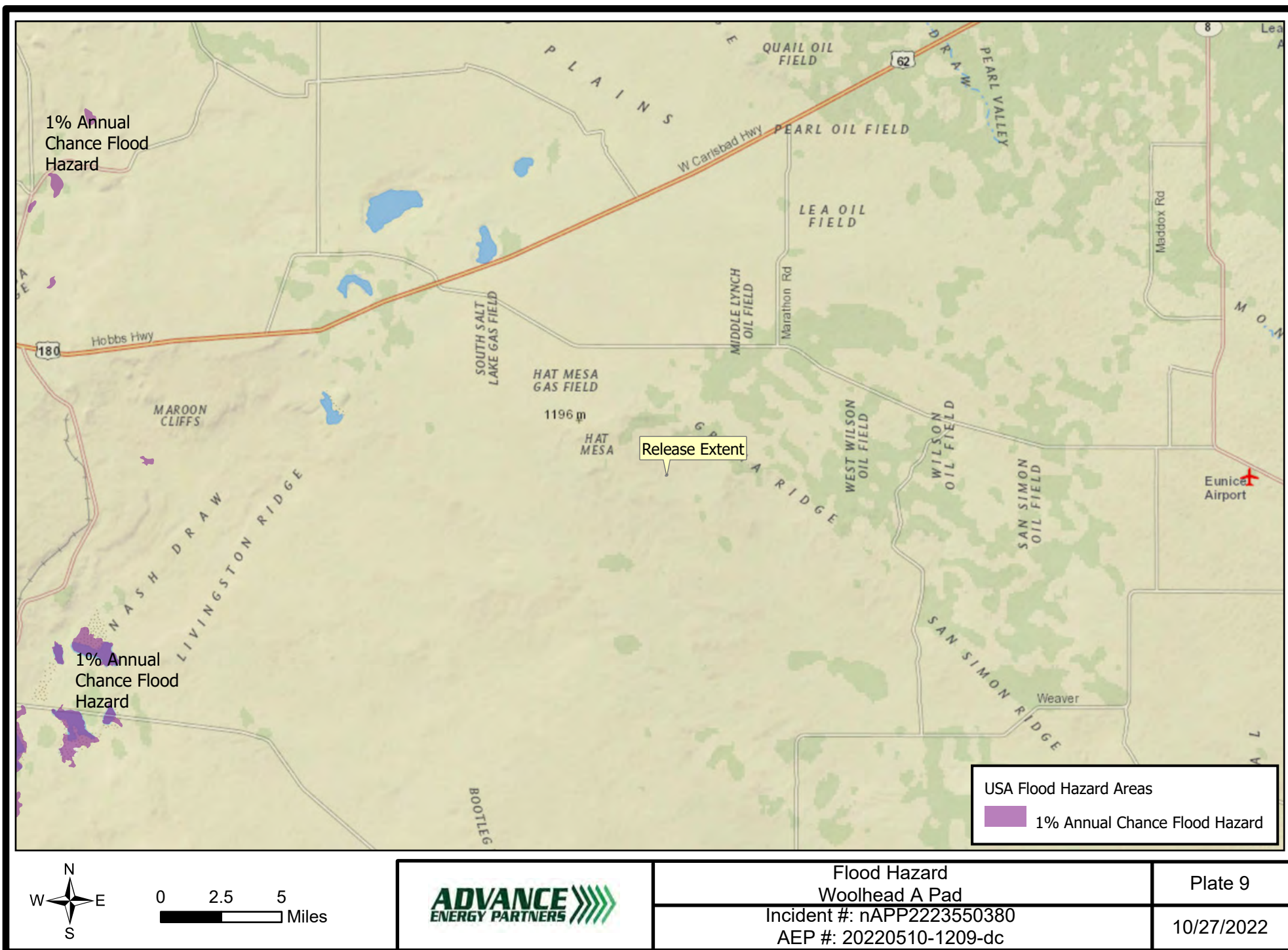


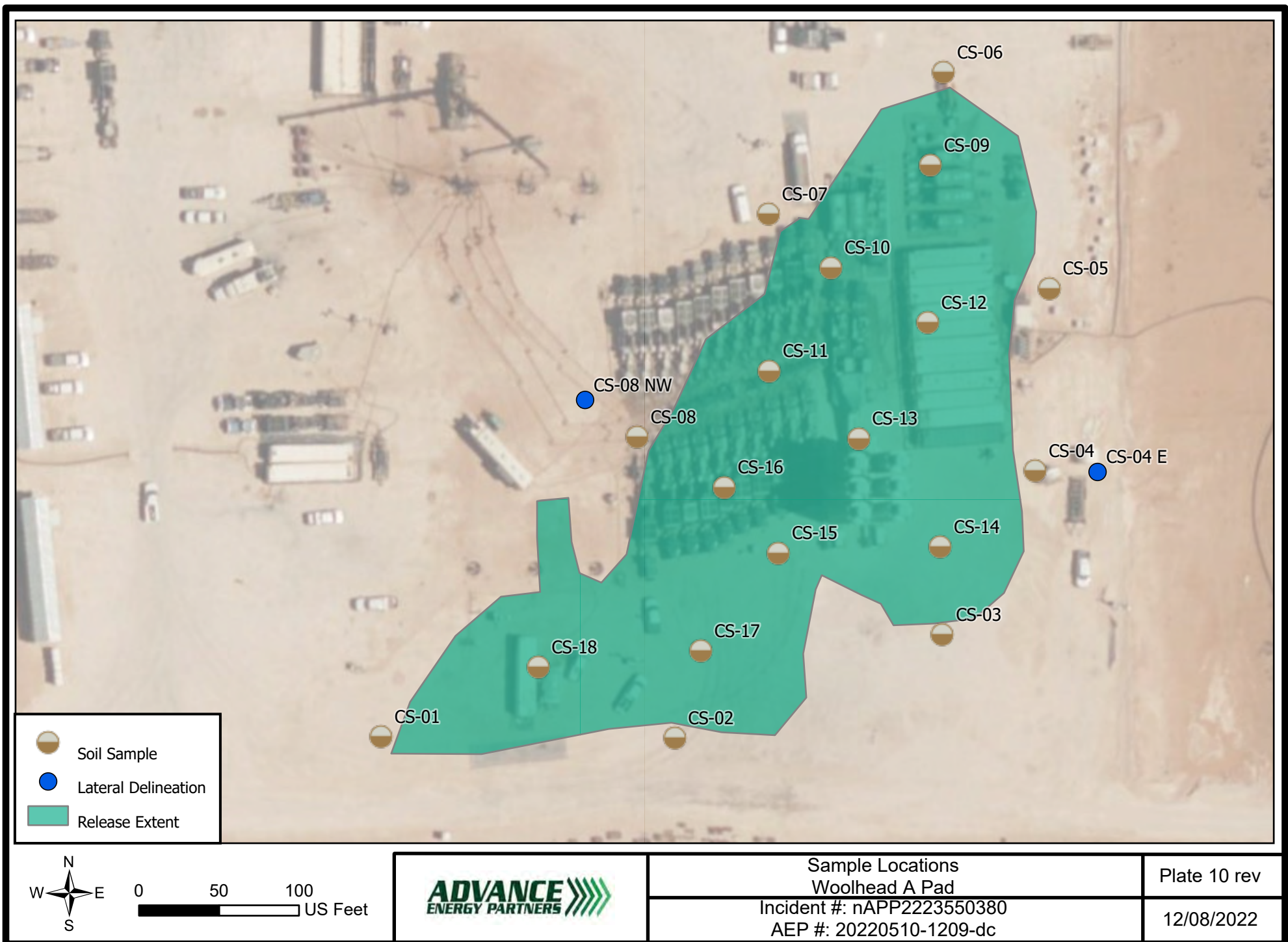












Tables



Sample Point	Latitude	Longitude
CS-01	32.45729882	-103.5890586
CS-02	32.45728256	-103.5885534
CS-03	32.45742345	-103.5880953
CS-04	32.45766549	-103.5879026
CS-04 E	32.45766970	-103.5878286
CS-05	32.45794005	-103.5878855
CS-06	32.45824892	-103.5880931
CS-07	32.45804481	-103.5883928
CS-08	32.45772871	-103.5886412
CS-08 NW	32.45777810	-103.5887116
CS-09	32.45811483	-103.5881156
CS-10	32.45796714	-103.5882858
CS-11	32.45781818	-103.5883914
CS-12	32.45788762	-103.5881203
CS-13	32.45772036	-103.5882386
CS-14	32.45756458	-103.5880987
CS-15	32.45755531	-103.5883757
CS-16	32.45765016	-103.5884683
CS-17	32.45741442	-103.5885084
CS-18	32.45739094	-103.5887867

December 08, 2022

Table B rev
Summary of Analytical

Incident ID: nAPP2223550380

Woolhead A Pad

AEP #: 20220510-1209-dc

Sample ID	Date	Discrete Depth (Feet)	Top Depth (Feet)	Bottom Depth (Feet)	Location	Chloride (mg/kg)	GRO+DRO (mg/kg)	TPH Ext. (mg/kg)	Benzene (mg/kg)	BTEX (mg/kg)	Comments	Lab (Hall/Cardinal)	Lab #
NMOCD Closure Criteria													
0 - 4 feet & "not in-use"						600	--	100	10	50			
> 4 ft or "in-use"						20,000	1,000	2,500	10	50			
CS-01	10/19/2022		0	2		320	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-01	10/19/2022		2	4		48	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-02	10/19/2022		0	2		240	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-02	10/19/2022		2	4		32	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-03	10/19/2022		0	2		208	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-03	10/19/2022		2	4		32	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-04	10/19/2022		0	2		3,120	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-04	10/19/2022		2	4		512	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-04	10/19/2022	4.5				608	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-04 E	12/2/2022	0				48	<20	<30	<0.05	<0.3	Lateral Delineation	Cardinal	H225661
CS-05	10/19/2022		0	2		160	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-05	10/19/2022		2	4		48	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-06	10/19/2022		0	2		80	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-06	10/19/2022		2	4		32	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-07	10/19/2022		0	2		528	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-07	10/19/2022		2	4		176	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-07	10/19/2022	4.5				128	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-08	10/19/2022		0	2		1,310	<46.6	<56.6	<0.05	<0.3	Characterization	Cardinal	H224930
CS-08	10/19/2022		2	4		480	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-08	10/19/2022	4.5				320	<36	<46	<0.05	<0.3	Characterization	Cardinal	H224930
CS-08 NW	12/2/2022	0				32	<20	<30	<0.05	<0.3	Lateral Delineation	Cardinal	H225661
CS-09	10/19/2022		0	2		4,000	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-09	10/19/2022		2	4		272	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-09	10/19/2022	4.5				400	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-09	10/19/2022	5.5				560	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-10	10/19/2022		0	2		560	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-10	10/19/2022		2	4		48	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-11	10/19/2022		0	2		4,240	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-11	10/19/2022		2	4		1,440	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-11	10/19/2022	4.5				1,600	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-12	10/19/2022		0	2		6,640	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-12	10/19/2022		2	4		4,320	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-12	10/19/2022	4.5				3,840	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-12	10/19/2022	5.5				4,000	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-12	10/19/2022	6.6				4,480	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-13	10/19/2022		0	2		592	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-13	10/19/2022		2	4		64	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-14	10/19/2022		0	2		3,840	<25.6	<35.6	<0.05	<0.3	Characterization	Cardinal	H224930
CS-14	10/19/2022		2	4		560	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930

December 08, 2022

Table B rev
Summary of AnalyticalIncident ID: nAPP2223550380
Woolhead A Pad
AEP #: 20220510-1209-dc

Sample ID	Date	Discrete Depth (Feet)	Top Depth (Feet)	Bottom Depth (Feet)	Location	Chloride (mg/kg)	GRO+DRO (mg/kg)	TPH Ext. (mg/kg)	Benzene (mg/kg)	BTEX (mg/kg)	Comments	Lab	Lab #
												(Hall/Cardinal)	
NMOCD Closure Criteria													
0 - 4 feet & "not in-use"						600	--	100	10	50			
> 4 ft or "in-use"						20,000	1,000	2,500	10	50			
CS-15	10/19/2022		0	2		1,680	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-15	10/19/2022		2	4		96	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-15	10/19/2022	4.5				176	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-16	10/19/2022		0	2		1,760	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-16	10/19/2022		2	4		144	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-16	10/19/2022	4.5				112	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-17	10/19/2022		0	2		32	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930
CS-18	10/19/2022		0	2		64	<20	<30	<0.05	<0.3	Characterization	Cardinal	H224930

Appendix A

Communications



Andrew Parker

From: Enviro, OCD, EMNRD <OCD.Enviro@emnrd.nm.gov>
Sent: Wednesday, November 23, 2022 1:09 PM
To: Andrew Parker
Cc: Bratcher, Michael, EMNRD; Nobui, Jennifer, EMNRD
Subject: RE: [EXTERNAL] nAPP2223550380 48 Hour Sampling Notice Wool Head A Pad

External (ocd.enviro@emnrd.nm.gov)

[Report This Email](#) [FAQ](#) [Protection by INKY](#)

Thank you for the notification. Please include a copy of this and all notifications in the remedial and/or closure reports to ensure the notifications are documented in the project file. Also in the future a date and time are essential pieces of information for the OCD.

Many thanks and happy holidays,

JH

Jocelyn Harimon • Environmental Specialist
Environmental Bureau
EMNRD - Oil Conservation Division
1220 South St. Francis Drive | Santa Fe, NM 87505
(505)469-2821 | Jocelyn.Harimon@emnrd.nm.gov
[http:// www.emnrd.nm.gov](http://www.emnrd.nm.gov)



From: Andrew Parker <aparker@ameredev.com>
Sent: Wednesday, November 23, 2022 12:55 PM
To: Enviro, OCD, EMNRD <OCD.Enviro@emnrd.nm.gov>
Cc: Jacob Saenz <jsaenz@ameredev.com>; Jesus Palomares <jpalomares@ameredev.com>; Laura Parker <lparker@ameredev.com>
Subject: [EXTERNAL] nAPP2223550380 48 Hour Sampling Notice Wool Head A Pad

CAUTION: This email originated outside of our organization. Exercise caution prior to clicking on links or opening attachments.

NMOCD,

Please accept this email as the 48 hour sampling notice to laterally delineate sample locations CS-04 and CS-08.

nAPP2223550380
Wool Head 20 State Com 608H "A" Pad

20220510-1209-dc

Andrew Parker
Environmental Scientist
970-570-9535



From: OCDOnline@state.nm.us <OCDOnline@state.nm.us>
Sent: Wednesday, November 23, 2022 10:47 AM
To: Andrew Parker <aparker@ameredev.com>
Subject: [EXTERNAL] The Oil Conservation Division (OCD) has rejected the application, Application ID: 154612

To whom it may concern (c/o Andrew Parker for ADVANCE ENERGY PARTNERS HAT MESA, LLC),

The OCD has rejected the submitted *Application for administrative approval of a release notification and corrective action* (C-141), for incident ID (n#) nAPP2223550380, for the following reasons:

- **Deferral Request Denied. Please complete lateral delineation at locations CS-04 and CS-08. Please make sure all lateral delineation samples are delineated to 600 mg/kg for chlorides to define the edge of the release on pad, regardless of depth to groundwater. Please resubmit a revised Deferral Request to the OCD portal by December 23, 2022.**

The rejected C-141 can be found in the OCD Online: Permitting – Action Status, under the Application ID: 154612.

Please review and make the required correction(s) prior to resubmitting.

If you have any questions why this application was rejected or believe it was rejected in error, please contact me prior to submitting an additional C-141.

Thank you,
Jennifer Nobui
Environmental Specialist–Advanced
505-470-3407
Jennifer.Nobui@emnrd.nm.gov

New Mexico Energy, Minerals and Natural Resources Department
1220 South St. Francis Drive
Santa Fe, NM 87505

Appendix B

Well Logs





2904 W 2nd St.
Roswell, NM 88201
voice: 575.624.2420
fax: 575.624.2421
www.atkinseng.com

10/29/2021

DII-NMOSE
1900 W 2nd Street
Roswell, NM 88201

Hand Delivered to the DII Office of the State Engineer

Re: Well Record CP-1880 Pod1

To whom it may concern:

Attached please find a well log & record and a plugging record, in duplicate, for a one (1) soil borings, CP-1880 Pod1.

If you have any questions, please contact me at 575.499.9244 or lucas@atkinseng.com.

Sincerely,

A handwritten signature in black ink, appearing to read "Lucas Middleton".

Lucas Middleton

Enclosures: as noted above

USE DIT NO. 1 2021 PM4143



WELL RECORD & LOG

OFFICE OF THE STATE ENGINEER

www.ose.state.nm.us

1. GENERAL AND WELL LOCATION	OSE POD NO. (WELL NO.) POD1 (TW-1)		WELL TAG ID NO. n/a		OSE FILE NO(S). CP-1880			
	WELL OWNER NAME(S) Advanced Energy Partners				PHONE (OPTIONAL) 832.672.4700			
	WELL OWNER MAILING ADDRESS 11490 Westheimer Rd. Stuit 950				CITY Houston	STATE TX	ZIP 77077	
	WELL LOCATION (FROM GPS)	DEGREES LATITUDE 32	MINUTES 27	SECONDS 30.43 N	* ACCURACY REQUIRED: ONE TENTH OF A SECOND			
		LONGITUDE 103	35	22.44 W	* DATUM REQUIRED: WGS 84			
DESCRIPTION RELATING WELL LOCATION TO STREET ADDRESS AND COMMON LANDMARKS – PLSS (SECTION, TOWNSHIP, RANGE) WHERE AVAILABLE SE SE NE Sec. 30 T21S R33E								
2. DRILLING & CASING INFORMATION	LICENSE NO. 1249		NAME OF LICENSED DRILLER Jackie D. Atkins			NAME OF WELL DRILLING COMPANY Atkins Engineering Associates, Inc.		
	DRILLING STARTED 10/08/2021		DRILLING ENDED 10/08/2021		DEPTH OF COMPLETED WELL (FT) temporary well material	BORE HOLE DEPTH (FT) 105	DEPTH WATER FIRST ENCOUNTERED (FT) n/a	
	COMPLETED WELL IS: <input type="checkbox"/> ARTESIAN <input checked="" type="checkbox"/> DRY HOLE <input type="checkbox"/> SHALLOW (UNCONFINED)					STATIC WATER LEVEL IN COMPLETED WELL (FT) n/a		
	DRILLING FLUID: <input type="checkbox"/> AIR <input type="checkbox"/> MUD ADDITIVES – SPECIFY:							
	DRILLING METHOD: <input type="checkbox"/> ROTARY <input type="checkbox"/> HAMMER <input type="checkbox"/> CABLE TOOL <input checked="" type="checkbox"/> OTHER – SPECIFY: Hollow Stem Auger							
	DEPTH (feet bgl) FROM TO		BORE HOLE DIAM. (inches)	CASING MATERIAL AND/OR GRADE (include each casing string, and note sections of screen)	CASING CONNECTION TYPE (add coupling diameter)	CASING INSIDE DIAM. (inches)	CASING WALL THICKNESS (inches)	SLOT SIZE (inches)
	0 105		±6.5	Boring- HSA	--	--	--	--
3. ANNULAR MATERIAL	DEPTH (feet bgl) FROM TO		BORE HOLE DIAM. (inches)	LIST ANNULAR SEAL MATERIAL AND GRAVEL PACK SIZE-RANGE BY INTERVAL		AMOUNT (cubic feet)	METHOD OF PLACEMENT	

FOR OSE INTERNAL USE

WR-20 WELL RECORD & LOG (Version 06/30/17)

FILE NO.


POD NO.

TRN NO.

LOCATION

WELL TAG ID NO.

PAGE 1 OF 2

4. HYDROGEOLOGIC LOG OF WELL	DEPTH (feet bgl)		THICKNESS (feet)	COLOR AND TYPE OF MATERIAL ENCOUNTERED - INCLUDE WATER-BEARING CAVITIES OR FRACTURE ZONES (attach supplemental sheets to fully describe all units)	WATER BEARING? (YES / NO)	ESTIMATED YIELD FOR WATER- BEARING ZONES (gpm)
	FROM	TO				
	0	9	9	Caliche, with fine-grained sand, White/Tan	Y ✓ N	
	9	19	10	Sand, Fine-grained, poorly graded, with Caliche, Tan/ Brown	Y ✓ N	
	19	105	86	Sand, Fine-grained, poorly graded, Tan/ Brown	Y ✓ N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
					Y N	
METHOD USED TO ESTIMATE YIELD OF WATER-BEARING STRATA: <input type="checkbox"/> PUMP <input type="checkbox"/> AIR LIFT <input type="checkbox"/> BAILER <input type="checkbox"/> OTHER - SPECIFY:					TOTAL ESTIMATED WELL YIELD (gpm): 0.00	
5. TEST; RIG SUPERVISION	WELL TEST	TEST RESULTS - ATTACH A COPY OF DATA COLLECTED DURING WELL TESTING, INCLUDING DISCHARGE METHOD, START TIME, END TIME, AND A TABLE SHOWING DISCHARGE AND DRAWDOWN OVER THE TESTING PERIOD.				
	MISCELLANEOUS INFORMATION: Temporary well materials removed and the soil boring backfilled using drill cuttings from total depth to ten feet below ground surface, then hydrated bentonite chips from ten feet below ground surface to surface.					
	PRINT NAME(S) OF DRILL RIG SUPERVISOR(S) THAT PROVIDED ONSITE SUPERVISION OF WELL CONSTRUCTION OTHER THAN LICENSEE: Shane Eldridge, Carmelo Trevino, Cameron Pruitt					
6. SIGNATURE	THE UNDERSIGNED HEREBY CERTIFIES THAT, TO THE BEST OF HIS OR HER KNOWLEDGE AND BELIEF, THE FOREGOING IS A TRUE AND CORRECT RECORD OF THE ABOVE DESCRIBED HOLE AND THAT HE OR SHE WILL FILE THIS WELL RECORD WITH THE STATE ENGINEER AND THE PERMIT HOLDER WITHIN 30 DAYS AFTER COMPLETION OF WELL DRILLING: <div style="display: flex; justify-content: space-between;"> <div>  SIGNATURE OF DRILLER / PRINT SIGNEE NAME </div> <div> Jackie D. Atkins DATE </div> </div>					

FOR OSE INTERNAL USE

WR-20 WELL RECORD & LOG (Version 06/30/2017)

FILE NO.	POD NO.	TRN NO.
LOCATION	WELL TAG ID NO.	PAGE 2 OF 2






2021-10-28_CP-1880_OSE_Well Record and Log-forsign

Final Audit Report

2021-10-29

Created:	2021-10-29
By:	Lucas Middleton (lucas@atkinseng.com)
Status:	Signed
Transaction ID:	CBJCHBCAABAHAhGPqUFzZW-iJW82rSfLHfl-441ccwUI

"2021-10-28_CP-1880_OSE_Well Record and Log-forsign" History

-  Document created by Lucas Middleton (lucas@atkinseng.com)
2021-10-29 - 3:57:03 PM GMT- IP address: 69.21.248.123
-  Document emailed to Jack Atkins (jack@atkinseng.com) for signature
2021-10-29 - 3:57:56 PM GMT
-  Email viewed by Jack Atkins (jack@atkinseng.com)
2021-10-29 - 4:13:52 PM GMT- IP address: 64.90.153.232
-  Document e-signed by Jack Atkins (jack@atkinseng.com)
Signature Date: 2021-10-29 - 4:14:24 PM GMT - Time Source: server- IP address: 64.90.153.232
-  Agreement completed.
2021-10-29 - 4:14:24 PM GMT

CSE OTY NOV 1 2021 PM4:14J



PLUGGING RECORD



NOTE: A Well Plugging Plan of Operations shall be approved by the State Engineer prior to plugging - 19.27.4 NMAC

I. GENERAL / WELL OWNERSHIP:

State Engineer Well Number: CP-1880 POD1

Well owner: Advanced Energy Partners

Phone No.: 832.672.4700

Mailing address: 11490 Westheimer Rd. Suite 950

City: Houston

State: Texas

Zip code: 77077

II. WELL PLUGGING INFORMATION:

- 1) Name of well drilling company that plugged well: Jackie D. Atkins (Atkins Engineering Associates Inc.)
- 2) New Mexico Well Driller License No.: 1249 Expiration Date: 04/30/23
- 3) Well plugging activities were supervised by the following well driller(s)/rig supervisor(s):
Shane Eldridge, Carmelo Trevino, Cameron Pruitt
- 4) Date well plugging began: 10/14/2021 Date well plugging concluded: 10/14/2021
- 5) GPS Well Location: Latitude: 32 deg, 27 min, 30.43 sec
Longitude: 103 deg, 35 min, 22.44 sec, WGS 84
- 6) Depth of well confirmed at initiation of plugging as: 105 ft below ground level (bgl),
by the following manner: weighted tape
- 7) Static water level measured at initiation of plugging: n/a ft bgl
- 8) Date well plugging plan of operations was approved by the State Engineer: 07/08/2021
- 9) Were all plugging activities consistent with an approved plugging plan? Yes If not, please describe differences between the approved plugging plan and the well as it was plugged (attach additional pages as needed):

CSE DIT NOV 1 2021 PM 4:43

- For each interval plugged, describe within the following columns:**

Q38 JUT NDU 1 2021 PM4:43

I, Jackie D. Atkins, say that I am familiar with the rules of the Office of the State Engineer pertaining to the plugging of wells and that each and all of the statements in this Plugging Record and attachments are true to the best of my knowledge and belief.

10/29/2021

Date _____






2021-10-28_CP-1880-_WD-11 Plugging Record-forsign

Final Audit Report

2021-10-29

Created:	2021-10-29
By:	Lucas Middleton (lucas@atkinseng.com)
Status:	Signed
Transaction ID:	CBJCHBCAABAAAn2Et3mXPysmDjS0n_cG2KS-HTqqTalz8

"2021-10-28_CP-1880-_WD-11 Plugging Record-forsign" History

-  Document created by Lucas Middleton (lucas@atkinseng.com)
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-  Document emailed to Jack Atkins (jack@atkinseng.com) for signature
2021-10-29 - 3:58:06 PM GMT
-  Email viewed by Jack Atkins (jack@atkinseng.com)
2021-10-29 - 4:12:56 PM GMT- IP address: 64.90.153.232
-  Document e-signed by Jack Atkins (jack@atkinseng.com)
Signature Date: 2021-10-29 - 4:13:43 PM GMT - Time Source: server- IP address: 64.90.153.232
-  Agreement completed.
2021-10-29 - 4:13:43 PM GMT

CSE DT NOV 1 2021 PM 4:43

Appendix C

Certificate of Analysis





PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

October 24, 2022

ANDREW PARKER

ADVANCE ENERGY PARTNERS

11490 WESTHEIMER ROAD, STE. 950

HOUSTON, TX 77077

RE: WOOLHEAD A PAD

Enclosed are the results of analyses for samples received by the laboratory on 10/19/22 16:26.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-22-15. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/qa/lab_accred_certif.html.

Cardinal Laboratories is accredited through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in black ink that reads "Celey D. Keene". The signature is fluid and cursive, with the first name "Celey" and last name "Keene" clearly distinguishable.

Celey D. Keene

Lab Director/Quality Manager



PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 01 0-2 FT (H224930-01)

BTEX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTEX	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 97.5 % 69.9-140

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	320	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 83.3 % 45.3-161

Surrogate: 1-Chlorooctadecane 86.7 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 01 2-4 FT (H224930-02)

BTEx 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTEX	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 98.0 % 69.9-140

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	48.0	16.0	10/21/2022	ND	448	112	400	3.64	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 88.7 % 45.3-161

Surrogate: 1-Chlorooctadecane 91.8 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 02 0-2 FT (H224930-03)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTX	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 97.9 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	240	16.0	10/21/2022	ND	448	112	400	3.64	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 90.8 % 45.3-161

Surrogate: 1-Chlorooctadecane 94.7 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 02 2-4 FT (H224930-04)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63		
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32		
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93		
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89		
Total BTEx	<0.300	0.300	10/21/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 99.2 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	32.0	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 86.9 % 45.3-161

Surrogate: 1-Chlorooctadecane 89.9 % 46.3-178

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ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 03 0-2 FT (H224930-05)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTX	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 99.0 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	208	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 89.9 % 45.3-161

Surrogate: 1-Chlorooctadecane 94.9 % 46.3-178

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ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 03 2-4 FT (H224930-06)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTX	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 98.9 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	32.0	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 86.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 91.9 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 04 4.5 FT (H224930-07)

BTEx 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTEx	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 98.9 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	608	16.0	10/21/2022	ND	448	112	400	3.64	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 90.2 % 45.3-161

Surrogate: 1-Chlorooctadecane 96.0 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 04 0-2 FT (H224930-08)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTX	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 96.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	3120	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 83.4 % 45.3-161

Surrogate: 1-Chlorooctadecane 90.6 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 04 2-4 FT (H224930-09)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTX	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 97.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	512	16.0	10/21/2022	ND	448	112	400	3.64	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 86.4 % 45.3-161

Surrogate: 1-Chlorooctadecane 93.5 % 46.3-178

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Celey D. Keene, Lab Director/Quality Manager



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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 05 0-2 FT (H224930-10)

BTEX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63		
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32		
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93		
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89		
Total BTEX	<0.300	0.300	10/21/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	160	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 89.0 % 45.3-161

Surrogate: 1-Chlorooctadecane 94.1 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
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 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 05 2-4 FT (H224930-11)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/21/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/21/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/21/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/21/2022	ND	6.12	102	6.00	3.89	
Total BTX	<0.300	0.300	10/21/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 97.7 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	48.0	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 82.8 % 45.3-161

Surrogate: 1-Chlorooctadecane 89.9 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
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 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 06 0-2 FT (H224930-12)

BTEx 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	2.05	103	2.00	3.63	
Toluene*	<0.050	0.050	10/22/2022	ND	2.17	109	2.00	2.32	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.03	102	2.00	2.93	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.12	102	6.00	3.89	
Total BTEx	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 99.1 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	80.0	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 82.2 % 45.3-161

Surrogate: 1-Chlorooctadecane 85.9 % 46.3-178

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 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 06 2-4 FT (H224930-13)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30	QM-07	
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.0 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	32.0	16.0	10/21/2022	ND	448	112	400	3.64	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 88.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 93.9 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
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 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 07 0-2 FT (H224930-14)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 99.6 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	528	16.0	10/21/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 87.1 % 45.3-161

Surrogate: 1-Chlorooctadecane 90.8 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 07 2-4 FT (H224930-15)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30	
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9	
Total BTX	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 97.7 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	176	16.0	10/21/2022	ND	416	104	400	3.77	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 83.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 86.8 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
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 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 07 4.5 FT (H224930-16)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30	
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9	
Total BTX	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 97.4 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	128	16.0	10/21/2022	ND	416	104	400	3.77	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	213	106	200	6.70	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	217	108	200	8.41	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 85.7 % 45.3-161

Surrogate: 1-Chlorooctadecane 89.3 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
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 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 08 0-2 FT (H224930-17)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.1 % 69.9-140

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	1310	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	36.6	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 79.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 100 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 08 2-4 FT (H224930-18)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.2 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	480	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 83.8 % 45.3-161

Surrogate: 1-Chlorooctadecane 101 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 08 4.5 FT (H224930-19)

BTEx 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30	
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9	
Total BTEx	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 98.3 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	320	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	26.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 83.0 % 45.3-161

Surrogate: 1-Chlorooctadecane 102 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 09 0-2 FT (H224930-20)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 96.8 % 69.9-140

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	4000	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 80.1 % 45.3-161

Surrogate: 1-Chlorooctadecane 96.8 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 09 2-4 FT (H224930-21)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.5 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	272	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 78.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 94.5 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 09 4.5 FT (H224930-22)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30	
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9	
Total BTX	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 98.5 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	400	16.0	10/21/2022	ND	416	104	400	3.77	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 73.8 % 45.3-161

Surrogate: 1-Chlorooctadecane 97.4 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 09 5.5 FT (H224930-23)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30	
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9	
Total BTX	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 97.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	560	16.0	10/21/2022	ND	416	104	400	3.77	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 82.1 % 45.3-161

Surrogate: 1-Chlorooctadecane 100 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 10 0-2 FT (H224930-24)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30	
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9	
Total BTX	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 96.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	560	16.0	10/21/2022	ND	416	104	400	3.77	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 85.6 % 45.3-161

Surrogate: 1-Chlorooctadecane 105 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 10 2-4 FT (H224930-25)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 96.2 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	48.0	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 77.9 % 45.3-161

Surrogate: 1-Chlorooctadecane 94.4 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 11 0-2 FT (H224930-26)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	4240	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 89.0 % 45.3-161

Surrogate: 1-Chlorooctadecane 108 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 11 2-4 FT (H224930-27)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.5 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	1440	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 87.7 % 45.3-161

Surrogate: 1-Chlorooctadecane 106 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 11 4.5 FT (H224930-28)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	1600	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 78.6 % 45.3-161

Surrogate: 1-Chlorooctadecane 94.8 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 12 0-2 FT (H224930-29)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.4 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	6640	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/20/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/20/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/20/2022	ND					

Surrogate: 1-Chlorooctane 84.4 % 45.3-161

Surrogate: 1-Chlorooctadecane 102 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 12 2-4 FT (H224930-30)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.5 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	4320	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 85.0 % 45.3-161

Surrogate: 1-Chlorooctadecane 104 % 46.3-178

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ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 12 4.5 FT (H224930-31)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.3 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	3840	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 81.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 98.3 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 12 5.5 FT (H224930-32)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	2.06	103	2.00	9.30		
Toluene*	<0.050	0.050	10/22/2022	ND	2.18	109	2.00	9.66		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	2.05	102	2.00	10.5		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	6.18	103	6.00	10.9		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.7 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	4000	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 76.1 % 45.3-161

Surrogate: 1-Chlorooctadecane 92.0 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 12 6.5 FT (H224930-33)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85	
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24	
Total BTX	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 97.7 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride	4480	16.0	10/21/2022	ND	416	104	400	3.77	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 79.9 % 45.3-161

Surrogate: 1-Chlorooctadecane 96.1 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 13 0-2 FT (H224930-34)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.6 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	592	16.0	10/21/2022	ND	416	104	400	3.77		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 79.1 % 45.3-161

Surrogate: 1-Chlorooctadecane 95.4 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 13 2-4 FT (H224930-35)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.2 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	64.0	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	230	115	200	7.00	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 82.4 % 45.3-161

Surrogate: 1-Chlorooctadecane 100 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 14 0-2 FT (H224930-36)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	3840	16.0	10/21/2022	ND	432	108	400	3.64	QM-07	

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	230	115	200	7.00	
DRO >C10-C28*	15.6	10.0	10/21/2022	ND	221	110	200	2.26	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 84.9 % 45.3-161

Surrogate: 1-Chlorooctadecane 103 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	10/19/2022	Sampling Date:	10/19/2022
Reported:	10/24/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 14 2-4 FT (H224930-37)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 96.8 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	560	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 95.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 104 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 15 0-2 FT (H224930-38)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 99.4 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	1680	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 90.9 % 45.3-161

Surrogate: 1-Chlorooctadecane 98.7 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 15 2-4 FT (H224930-39)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.6 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	96.0	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 92.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 101 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 15 4.5 FT (H224930-40)

BTX 8021B		mg/kg		Analyzed By: JH					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85	
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19	
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36	
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24	
Total BTX	<0.300	0.300	10/22/2022	ND					

Surrogate: 4-Bromofluorobenzene (PID) 98.9 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	176	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 94.7 % 45.3-161

Surrogate: 1-Chlorooctadecane 102 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 16 0-2 FT (H224930-41)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.2 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	1760	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 94.8 % 45.3-161

Surrogate: 1-Chlorooctadecane 104 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 16 2-4 FT (H224930-42)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 98.0 % 69.9-140

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	144	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 93.6 % 45.3-161

Surrogate: 1-Chlorooctadecane 102 % 46.3-178

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Celey D. Keene, Lab Director/Quality Manager



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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 16 4.5 FT (H224930-43)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 97.4 % 69.9-140

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	112	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 92.2 % 45.3-161

Surrogate: 1-Chlorooctadecane 101 % 46.3-178

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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 17 0-2 FT (H224930-44)

BTEx 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTEx	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 99.6 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	32.0	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 92.6 % 45.3-161

Surrogate: 1-Chlorooctadecane 102 % 46.3-178

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Celey D. Keene, Lab Director/Quality Manager



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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received: 10/19/2022
 Reported: 10/24/2022
 Project Name: WOOLHEAD A PAD
 Project Number: 20220510-1209-DC
 Project Location: NONE GIVEN

Sampling Date: 10/19/2022
 Sampling Type: Soil
 Sampling Condition: Cool & Intact
 Sample Received By: Tamara Oldaker

Sample ID: CS - 18 0-2 FT (H224930-45)

BTX 8021B		mg/kg		Analyzed By: JH						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	10/22/2022	ND	1.99	99.7	2.00	4.85		
Toluene*	<0.050	0.050	10/22/2022	ND	2.12	106	2.00	4.19		
Ethylbenzene*	<0.050	0.050	10/22/2022	ND	1.98	99.1	2.00	4.36		
Total Xylenes*	<0.150	0.150	10/22/2022	ND	5.97	99.6	6.00	5.24		
Total BTX	<0.300	0.300	10/22/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 99.5 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	64.0	16.0	10/21/2022	ND	432	108	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	10/21/2022	ND	216	108	200	12.7	
DRO >C10-C28*	<10.0	10.0	10/21/2022	ND	204	102	200	7.34	
EXT DRO >C28-C36	<10.0	10.0	10/21/2022	ND					

Surrogate: 1-Chlorooctane 92.0 % 45.3-161

Surrogate: 1-Chlorooctadecane 102 % 46.3-178

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Notes and Definitions

QM-07	The spike recovery was outside acceptance limits for the MS and/or MSD. The batch was accepted based on acceptable LCS recovery.
ND	Analyte NOT DETECTED at or above the reporting limit
RPD	Relative Percent Difference
**	Samples not received at proper temperature of 6°C or below.
***	Insufficient time to reach temperature.
-	Chloride by SM4500Cl-B does not require samples be received at or below 6°C Samples reported on an as received basis (wet) unless otherwise noted on report

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A handwritten signature in black ink, appearing to read "Celey D. Keene".

Celey D. Keene, Lab Director/Quality Manager



101 East Marland, Hobbs, NM 88240
(575) 393-2326 FAX (575) 393-2476

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Company Name: <u>Advanced Energy Partners</u>		P.O. # <u>20220510-1204-DC</u>	
Project Manager: <u>Andrew Parker</u>		Company:	
Address:		Attn:	
City:	State:	Zip:	
Phone #:	Fax #:	Address:	
Project #:	Project Owner:	City:	
Project Name: <u>20220510-1204-DC</u>		State:	
Project Location: <u>Woolhead A Pond</u>		Zip:	
Sample Name: <u>5A40B SRE-2</u>		Phone #:	
		Fax #:	

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX						DATE	TIME	ANALYSIS REQUEST
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :			
H24930	CS-D1	0-2FT	C			X				10/19/22	8:10am	Chloride
	CS-01	2-4FT									8:15am	TPH (CRO + PRO + MRO)
	CS-02	0-2FT									8:20am	Benzene, BTLEA
	CS-02	2-4FT									8:25am	
	CS-03	0-2FT									8:30am	
	CS-03	2-4FT									8:40am	
	CS-03	4-5FT									8:55am	
	CS-04	0-2FT									9:05am	
	CS-04	2-4FT									9:15am	
	CS-05	0-2FT										

Relinquished By: <u>5A40B SRE-2</u>		Date: <u>10-19-22</u>	Received By: <u>[Signature]</u>
Relinquished By:		Date:	Received By:
Time:		Time:	
Delivered By: (Circle One)	Observed Temp. °C <u>3.9</u>	Sample Condition	CHECKED BY: (Initials)
Sampler - UPS - Bus - Other:	Corrected Temp. °C <u>3.3</u>	Cool <input type="checkbox"/> Intact <input type="checkbox"/>	
		Yes <input type="checkbox"/> No <input type="checkbox"/>	
		Yes <input type="checkbox"/> No <input type="checkbox"/>	
Turnaround Time:		Standard <input type="checkbox"/> Rush <input type="checkbox"/>	Bacteria (only) <input type="checkbox"/>
Thermometer ID #113		Cool <input type="checkbox"/> Intact <input type="checkbox"/>	Sample Condition
Correction Factor -0.8°C		Yes <input type="checkbox"/> No <input type="checkbox"/>	Observed Temp. °C
		Yes <input type="checkbox"/> No <input type="checkbox"/>	Corrected Temp. °C

REMARKS: * Sample ID change TO: 10/20/22

Verbal Result: ☐ Yes ☐ No Add'l Phone #:

All Results are emailed. Please provide Email address:

FORM-006 REV 3/07/10/22

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CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Company Name: <u>Adverse Envy Partners</u>		BILL TO	
Project Manager: <u>Andrew Parker</u>		P.O. # <u>20220510-1299-DC</u>	
Address:		Company:	
City:	State: Zip:	Attn:	
Phone #:	Fax #:	Address:	
Project #:	Project Owner:	City:	Zip:
Project Name: <u>20220510-1299-DC</u>		State:	Phone #:
Project Location: <u>Wool head 1A Pond</u>		Fax #:	
Sampler Name: <u>SRAB SHENZ</u>			

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX						PRESERV.	SAMPLING	DATE <-> TIME	ANALYSIS REQUEST
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :				
<u>H224930</u>													
11	CS-05	2-4PT	1									9:30am	10/19/22
12	CS-06	0-2PT										9:45am	
13	CS-06	2-4PT										9:55am	
14	CS-07	0-2PT										10am	
15	CS-07	2-4PT										10:10am	
16	CS-07	4-5PT										10:20am	
17	CS-08	0-2PT										10:40am	
18	CS-08	2-4PT										10:45am	
19	CS-08	4-5PT										10:55am	
20	CS-09	0-2PT											

Chloride													
TPH (GRO + DRO + MRO)													
Benzene, BTEX													

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Relinquished By: <u>SRAB SHENZ</u>	Date: <u>12/19/22</u>	Received By: <u>Juanita Chabaz</u>	Verbal Result: <input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> Add'l Phone #:
Relinquished By:	Date:	Received By:	All Results are emailed. Please provide Email address:
Time:			
Time:			

Delivered By: (Circle One)	Observed Temp. °C <u>39</u>	Sample Condition	CHECKED BY: (Initials)	Turnaround Time:	Standard	Bacteria (only)	Sample Condition
Sampler - UPS - Bus - Other:	Corrected Temp. °C <u>33</u>	<input checked="" type="checkbox"/> Cool <input type="checkbox"/> Intact <input type="checkbox"/> Yes <input type="checkbox"/> No	<u>Y.O.</u>	Thermometer ID #113	<u>Rush</u>	<input checked="" type="checkbox"/> Bacteria (only) <input type="checkbox"/> Cool <input type="checkbox"/> Intact <input type="checkbox"/> Yes <input type="checkbox"/> No	Observed Temp. °C
				Correction Factor -0.5°C			Corrected Temp. °C

FORM 006 R-3.3 07/16/22

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CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Company Name: Advice Energy Partners Project Manager: Andrew Parker Address: City: State: Zip: Phone #: Fax #: Project #: Project Owner: Project Name: 20220510-1204-06 Project Location: wellhead A-02A Sample Name: SHAOB SHAEN2 FOR LAB USE ONLY		BILL TO P.O. #: 20220510-1204-06 Company: Attn: Address: City: State: Zip: Phone #: Fax #: Matrix: GROUNDWATER, WASTEWATER, SOIL, OIL, SLUDGE, OTHER: ACID/BASE: ICE / COOL, OTHER: PRESERV: DATE (→) TIME SAMPLING		ANALYSIS REQUEST	
Lab I.D. Sample I.D. HZ24930 21 CS-09 2-4FT 22 CS-09 4.5FT 23 CS-09 5.5FT 24 CS-10 0-2FT 25 CS-10 2-4FT 26 CS-11 0-2FT 27 CS-11 2-4FT 28 CS-11 4.5FT 29 CS-12 0-2FT 30 CS-12 2-4FT		(G)RAB OR (C)OMP. # CONTAINERS MATRIX PRESERV SAMPLING		Chloride TPIT (CROTONOLINO) Benzene, BTEX	
Relinquished By: SHAOB SHAEN2 Date: 12-19-22 Time: 10:24 Received By: [Signature] Date: 12-19-22 Time: 10:24 Received By: [Signature]		Verbal Result: <input type="checkbox"/> Yes <input type="checkbox"/> No Add'l Phone #: All Results are emailed. Please provide Email address: REMARKS:		Turnaround Time: Standard <input checked="" type="checkbox"/> Rush <input type="checkbox"/> Thermometer ID #13 <input type="checkbox"/> Bacteria (only) Sample Condition Correction Factor -0.5°C <input type="checkbox"/> Cool Intact <input type="checkbox"/> Observed Temp. °C Corrected Temp. °C	
Delivered By: (Circle One) Observed Temp. °C 39 Sampler - UPS - Bus - Other: Corrected Temp. °C 33 FORM 006 R 3.3 07/10/22		Cardinal cannot accept verbal changes. Please email changes to caley.keene@cardinallabsnm.com			



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CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Company Name: Advance Energy Partners Project Manager: Andrew Palmer Address: City: State: Zip: Phone #: Fax #: Project #: Project Owner: Project Name: 20220510-1204-DC Project Location: Woodhead AP4 Sample Name: 5H24936 5H24936				BILL TO P.O. #: 20220510-1204-DC Company: Attn: Address: City: State: Zip: Phone #: Fax #:				ANALYSIS REQUEST			
Lab I.D. Sample I.D.		(G)RAB OR (C)OMP. # CONTAINERS GROUNDWATER WASTEWATER SOIL OIL SLUDGE OTHER : ACID/BASE: ICE / COOL OTHER :		MATRIX PRESERV. SAMPLING		DATE & TIME		ANALYSIS Chloride TPH (GRO + PRO + MGO) Benzene, BTEX			
31 4.5FT 32 5.5FT 33 6.5FT 34 8.5FT 35 10.5FT 36 12.5FT 37 14.5FT 38 16.5FT 39 18.5FT 40 20.5FT		1 1 1 1 1 1 1 1 1 1		12:45pm 1:00pm 1:15pm 1:30pm 1:45pm 2:00pm 2:15pm 2:30pm 2:45pm 3:00pm		10/14/02 10/14/02 10/14/02 10/14/02 10/14/02 10/14/02 10/14/02 10/14/02 10/14/02		α α α α α α α α α α			
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Relinquished By: 5H24936 5H24936 Date: 10/14/02 Time: 10:00 Received By: [Signature] Date: 10/14/02 Time: 10:00				Verbal Result: <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Add'l Phone #: All Results are emailed. Please provide Email address:				REMARKS:			
Relinquished By: 5H24936 5H24936 Date: 10/14/02 Time: 10:00 Received By: [Signature]				Turnaround Time: Standard <input checked="" type="checkbox"/> Rush <input type="checkbox"/> Thermometer ID #113 Bacteria (only) Sample Condition Cool Intact <input checked="" type="checkbox"/> Observed Temp. °C Corrected Temp. °C				Standard <input checked="" type="checkbox"/> Rush <input type="checkbox"/> Bacteria (only) Sample Condition Cool Intact <input checked="" type="checkbox"/> Observed Temp. °C Corrected Temp. °C			



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CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

Company Name: <u>Admiral Energy Partners</u>		P.O. #: <u>2020510-1209-PL</u>	
Project Manager: <u>Andrew Parker</u>		Company:	
Address:		Attn:	
City:	State:	Zip:	Address:
Phone #:	Fax #:	City:	State:
Project #:	Project Owner:	Zip:	Phone #:
Project Name: <u>2020510-1209-PL</u>	Project Location: <u>Wellhead PAD</u>	Fax #:	
Sample Name: <u>SHALB SHALR-2</u>			

Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX						PRESERV.	SAMPLING	DATE (→) TIME	ANALYSIS REQUEST
				GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :				
<u>H224930</u>													
<u>41</u>	<u>CS-16</u>	<u>C</u>	<u>1</u>									<u>2:15 PM 10/14/22</u>	<u>Chloride</u>
<u>42</u>	<u>CS-16</u>	<u>C</u>	<u>1</u>									<u>2:30 PM</u>	<u>TPH (6 not 100 mg)</u>
<u>43</u>	<u>CS-16</u>	<u>C</u>	<u>1</u>									<u>2:35 PM</u>	<u>Benzene, BTEX</u>
<u>44</u>	<u>CS-17</u>	<u>C</u>	<u>1</u>									<u>2:40 PM</u>	
<u>45</u>	<u>CS-18</u>	<u>C</u>	<u>1</u>									<u>2:55 PM</u>	

Relinquished By: <u>SHALB SHALR-2</u>		Date: <u>10-19-22</u>	Received By: <u>Andrew Parker</u>	Verbal Result: <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Add'l Phone #:
Relinquished By:		Date:	Received By:	All Results are emailed. Please provide Email address:
Time:				
Time:				
Delivered By: (Circle One)	Observed Temp. °C: <u>39</u>	Sample Condition: <input checked="" type="checkbox"/> Intact <input type="checkbox"/> Cool <input type="checkbox"/> Yes <input type="checkbox"/> No	CHECKED BY: (Initials) <u>AP</u>	Turnaround Time: <u>Standard</u> <input checked="" type="checkbox"/> <u>Rush</u> <input type="checkbox"/>
Sampler - UPS - Bus - Other:	Corrected Temp. °C: <u>5.3</u>	<input type="checkbox"/> Yes <input type="checkbox"/> No		Bacteria (only) Sample Condition: <input type="checkbox"/> Intact <input type="checkbox"/> Cool <input type="checkbox"/> Yes <input type="checkbox"/> No
FORM-006 R33 07/16/22		† Cardinal cannot accept verbal changes. Please email changes to celey.keene@cardinallabsnm.com		



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December 07, 2022

ANDREW PARKER

ADVANCE ENERGY PARTNERS

11490 WESTHEIMER ROAD, STE. 950

HOUSTON, TX 77077

RE: WOOLHEAD A PAD

Enclosed are the results of analyses for samples received by the laboratory on 12/02/22 14:25.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-22-15. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/qa/lab_accred_certif.html.

Cardinal Laboratories is accredited through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in black ink that reads "Mike Snyder". The signature is fluid and cursive, with the first name "Mike" and last name "Snyder" clearly distinguishable.

Mike Snyder For Celey D. Keene

Lab Director/Quality Manager



PHONE (575) 393-2326 ° 101 E. MARLAND ° HOBBS, NM 88240

Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	12/02/2022	Sampling Date:	12/02/2022
Reported:	12/07/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 04 E 0 FT (H225661-01)

BTEX 8021B		mg/kg		Analyzed By: JH/						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	12/05/2022	ND	2.15	108	2.00	1.26		
Toluene*	<0.050	0.050	12/05/2022	ND	2.15	107	2.00	1.64		
Ethylbenzene*	<0.050	0.050	12/05/2022	ND	2.11	105	2.00	0.280		
Total Xylenes*	<0.150	0.150	12/05/2022	ND	6.46	108	6.00	1.36		
Total BTEX	<0.300	0.300	12/05/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 112 % 69.9-140

Chloride, SM4500Cl-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	48.0	16.0	12/06/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	12/05/2022	ND	203	102	200	5.98	
DRO >C10-C28*	<10.0	10.0	12/05/2022	ND	186	92.8	200	1.88	
EXT DRO >C28-C36	<10.0	10.0	12/05/2022	ND					

Surrogate: 1-Chlorooctane 95.5 % 45.3-161

Surrogate: 1-Chlorooctadecane 94.5 % 46.3-178

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Mike Snyder For Celey D. Keene, Lab Director/Quality Manager



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Analytical Results For:

ADVANCE ENERGY PARTNERS
 ANDREW PARKER
 11490 WESTHEIMER ROAD, STE. 950
 HOUSTON TX, 77077
 Fax To: (832) 672-4609

Received:	12/02/2022	Sampling Date:	12/02/2022
Reported:	12/07/2022	Sampling Type:	Soil
Project Name:	WOOLHEAD A PAD	Sampling Condition:	Cool & Intact
Project Number:	20220510-1209-DC	Sample Received By:	Tamara Oldaker
Project Location:	NONE GIVEN		

Sample ID: CS - 08 NW 0 FT (H225661-02)

BTEx 8021B		mg/kg		Analyzed By: JH/						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Benzene*	<0.050	0.050	12/05/2022	ND	2.15	108	2.00	1.26		
Toluene*	<0.050	0.050	12/05/2022	ND	2.15	107	2.00	1.64		
Ethylbenzene*	<0.050	0.050	12/05/2022	ND	2.11	105	2.00	0.280		
Total Xylenes*	<0.150	0.150	12/05/2022	ND	6.46	108	6.00	1.36		
Total BTEx	<0.300	0.300	12/05/2022	ND						

Surrogate: 4-Bromofluorobenzene (PID) 110 % 69.9-140

Chloride, SM4500CI-B		mg/kg		Analyzed By: AC						
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier	
Chloride	32.0	16.0	12/06/2022	ND	448	112	400	3.64		

TPH 8015M		mg/kg		Analyzed By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
GRO C6-C10*	<10.0	10.0	12/05/2022	ND	203	102	200	5.98	
DRO >C10-C28*	<10.0	10.0	12/05/2022	ND	186	92.8	200	1.88	
EXT DRO >C28-C36	<10.0	10.0	12/05/2022	ND					

Surrogate: 1-Chlorooctane 101 % 45.3-161

Surrogate: 1-Chlorooctadecane 101 % 46.3-178

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Mike Snyder For Celey D. Keene, Lab Director/Quality Manager



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Notes and Definitions

QM-07	The spike recovery was outside acceptance limits for the MS and/or MSD. The batch was accepted based on acceptable LCS recovery.
ND	Analyte NOT DETECTED at or above the reporting limit
RPD	Relative Percent Difference
**	Samples not received at proper temperature of 6°C or below.
***	Insufficient time to reach temperature.
-	Chloride by SM4500Cl-B does not require samples be received at or below 6°C Samples reported on an as received basis (wet) unless otherwise noted on report

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A handwritten signature in black ink, appearing to read "Mike Snyder", is written over a horizontal line.

Mike Snyder For Celey D. Keene, Lab Director/Quality Manager



CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

101 East Marland, Hobbs, NM 88240
(575) 393-2326 FAX (575) 393-2476

Company Name: Advance Energy Partners Project Manager: Andrew Parker Address: On-File City: State: Zip: Phone #: Fax #: Project #: Project Owner: Project Name: 2020 0510-1209-dc Project Location: Weatherford A Pad Sampler Name: Jacob Saenz		BILL TO P.O. #: 2020 0510-1209-dc Company: AEP Attn: Send to Address: aparker@ City: ameredev.com State: Zip: Phone #: Fax #:	
Lab I.D. Sample I.D. H225461 1 CS-04E Q5-T 2 CS-08NW Q5-T		FOR LAB USE ONLY (G)RAB OR (C)OMP. # CONTAINERS GROUNDWATER WASTEWATER SOIL OIL SLUDGE OTHER : ACID/BASE: ICE / COOL OTHER : DATE TIME 12/27/22 9am 12/29/22 9:15am	
Relinquished By: [Signature] Date: 12-2-22 Time: 1435 Received By: [Signature] Date: 12-2-22 Time:		ANALYSIS REQUEST CHLORIDE TPH (GRO+DRO+MRO) BENZENE, BTEX	
Delivered By: (Circle One) Sampler - UPS - Bus - Other: 5.42/4.82 Sample Condition Cool <input checked="" type="checkbox"/> Intact <input checked="" type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> CHECKED BY: (Initials) 720		REMARKS: Phone Result: <input type="checkbox"/> Yes <input type="checkbox"/> No Add'l Phone #: Fax Result: <input type="checkbox"/> Yes <input type="checkbox"/> No Add'l Fax #:	

† Cardinal cannot accept verbal changes. Please fax written changes to (575) 393-2326

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

Action 165984

CONDITIONS

Operator: ADVANCE ENERGY PARTNERS HAT MESA, LLC 11490 Westheimer Rd., Ste 950 Houston, TX 77077	OGRID: 372417
	Action Number: 165984
	Action Type: [C-141] Release Corrective Action (C-141)

CONDITIONS

Created By	Condition	Condition Date
jnobui	Closure Report Approved. Please implement 19.15.29.13 NMAC when completing P&A.	1/10/2023