

**From:** [Yu, Olivia, EMNRD](#)  
**To:** "Mark Larson"  
**Cc:** "[Nina\\_Hutton@xtoenergy.com](mailto:Nina_Hutton@xtoenergy.com)"; "[David\\_Askin@xtoenergy.com](mailto:David_Askin@xtoenergy.com)"  
**Subject:** RE: 1RP-4789 - Release Delineation Plan, EMSU B Produced Water Release, XTO Energy, Inc., Lea County, New Mexico, August 22, 2017  
**Date:** Monday, August 28, 2017 7:23:00 AM  
**Attachments:** revised1RP4789.pdf

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Good morning Mr. Larson:

Thank you for the information. Please see the modified initial C-141. All information remains the same except that the annotated surface ownership has been removed.

Olivia

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**From:** Mark Larson [mailto:Mark@laenvironmental.com]  
**Sent:** Friday, August 25, 2017 4:51 PM  
**To:** Yu, Olivia, EMNRD <Olivia.Yu@state.nm.us>  
**Cc:** 'Nina\_Hutton@xtoenergy.com' <Nina\_Hutton@xtoenergy.com>; 'David\_Askin@xtoenergy.com' <David\_Askin@xtoenergy.com>  
**Subject:** RE: 1RP-4789 - Release Delineation Plan, EMSU B Produced Water Release, XTO Energy, Inc., Lea County, New Mexico, August 22, 2017

Dear Olivia,

I confirmed with Jim Rutley with BLM Carlsbad District Office and their records show the surface is private and owned by the Bill Cooper Family Trust. However, BLM is the mineral owner. The initial C-141 submitted by XTO Energy did not contain information about the surface and mineral ownership. This information was inserted by OCD. Please see the approved C-141 attached. Please contact me if you have questions.

Mark

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**From:** Yu, Olivia, EMNRD [<mailto:Olivia.Yu@state.nm.us>]  
**Sent:** Friday, August 25, 2017 4:01 PM  
**To:** Mark Larson  
**Subject:** RE: 1RP-4789 - Release Delineation Plan, EMSU B Produced Water Release, XTO Energy, Inc., Lea County, New Mexico, August 22, 2017

Mr. Larson:

I received your voicemail. Please clarify about surface ownership for this release. If BLM is not the surface owner, do you have documentation? Is a revised initial C141 requested by XTO?

Thanks,  
Olivia

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**From:** Mark Larson [<mailto:Mark@laenvironmental.com>]

**Sent:** Tuesday, August 22, 2017 4:04 PM

**To:** Yu, Olivia, EMNRD <[Olivia.Yu@state.nm.us](mailto:Olivia.Yu@state.nm.us)>; Billings, Bradford, EMNRD <[Bradford.Billings@state.nm.us](mailto:Bradford.Billings@state.nm.us)>; Griswold, Jim, EMNRD <[Jim.Griswold@state.nm.us](mailto:Jim.Griswold@state.nm.us)>

**Cc:** 'Hutton, Nina' <[Nina\\_Hutton@xtoenergy.com](mailto:Nina_Hutton@xtoenergy.com)>; 'Askin, David' <[David\\_Askin@xtoenergy.com](mailto:David_Askin@xtoenergy.com)>

**Subject:** Re: 1RP-4789 - Release Delineation Plan, EMSU B Produced Water Release, XTO Energy, Inc., Lea County, New Mexico, August 22, 2017

All,

Larson & Associates, Inc. (LAI), on behalf of XTO Energy, Inc. (XTO) submits the attached plan to delineate the extent of a produced water release (1RP-4789) from a 10 inch cement line steel line at the Eunice Monument South Unit (EMSU) B in Lea County, New Mexico. LAI, on behalf of XTO, requests approval to begin the delineation according to the attached plan. Please contact Nina Hutton with XTO at Paladin at (817) 885-2274 or [Nina\\_Hutton@xtoenergy.com](mailto:Nina_Hutton@xtoenergy.com) or me if you have questions.

Respectfully,

Mark J. Larson, P.G.  
President/Sr. Project Manager  
507 N. Marienfeld St., Suite 205  
Midland, Texas 79701  
Office – 432-687-0901  
Cell – 432- 556-8656  
Fax – 432-687-0456  
[mark@laenvironmental.com](mailto:mark@laenvironmental.com)



**"Serving the Permian Basin Since 2000"**

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

State of New Mexico  
Energy Minerals and Natural Resources

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

Form C-141  
Revised April 3, 2017

Submit 1 Copy to appropriate District Office in  
accordance with 19.15.29 NMAC.

**Release Notification and Corrective Action**

**OPERATOR**

☒ Initial Report ☐ Final Report

Name of Company: XTO Energy	Contact: Shannon Walker
Address 500 W. Illinois Suite 100 Midland, TX 79701	Telephone No. : 432-661-4649
Facility Name: EMSU B Injection System	Facility Type: Water Injection

Surface Owner: Jimmy Cooper	Mineral Owner: BLM	API No.
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**LOCATION OF RELEASE**

Unit Letter P	Section 14	Township 20 S	Range 36 E	Feet from the	North/South Line	Feet from the	East/West Line	County
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Latitude 32°34'03.40"N Longitude 103°19'13.08"W NAD83

**NATURE OF RELEASE**

Type of Release: Produced Water	Volume of Release: Not Yet Determined [see comment below]	Volume Recovered: 11,689 bbls [see comment below]
Source of Release: Injection Line	Date and Hour of Occurrence: Unknown	Date and Hour of Discovery: 6/9/2017
Was Immediate Notice Given? <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Not Required	If YES, To Whom? On Call Line	
By Whom? Shannon Walker	Date and Hour: 6/9/2017 ~ 1800 hrs MST and again on 6/28/2017	
Was a Watercourse Reached? <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No	If YES, Volume Impacting the Watercourse.	

If a Watercourse was Impacted, Describe Fully.\*


**RECEIVED**

By Olivia Yu at 4:08 pm, Aug 11, 2017

Describe Cause of Problem and Remedial Action Taken.\* 10" cement lined steel line, corrosion. Shut field in to isolate leak point. XTO provided immediate verbal notification of the release on 6/9/17 and began recovering water with vacuum trucks. Affected area measures ~405' x 561'. XTO provided updated verbal notification on June 28, 2017, that it had increased its estimate of the release volume to 1,655 bbls. Contacted Mark Larson w/ Larson & Associates to perform initial evaluation and EM surveys of the area. XTO and Larson & Associates are working to update the estimated volume of the release. XTO will submit delineation plan for OCD approval.

Describe Area Affected and Cleanup Action Taken.\*

I hereby certify that the information given above is true and complete to the best of my knowledge and understand that pursuant to NMOCD 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 NMOCD marked as "Final Report" does not relieve the operator of liability should their operations have failed to adequately investigate and remediate contamination that pose a threat to ground water, surface water, human health or the environment. In addition, NMOCD 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.

Signature: Patricia Donald	<b>OIL CONSERVATION DIVISION</b>	
Printed Name: Patricia Donald	Approved by Environmental Specialist: 	
Title: Regulatory Analyst	Approval Date: 8/11/2017	Expiration Date:
E-mail Address: Patricia_Donald@xtoenergy.com	Conditions of Approval: see attached directive	Attached <input checked="" type="checkbox"/>
Date: 8/11/2017 Phone: (432) 571-8220		

\* Attach Additional Sheets If Necessary

1RP-4789

fOY1722358348

nOY1722358518

pOY1722358879

Operator/Responsible Party,

The OCD has received the form C-141 you provided on 8/11/2017 regarding an unauthorized release. The information contained on that form has been entered into our incident database and remediation case number 1RP-4789 has been assigned. **Please refer to this case number in all future correspondence.**

It is the Division's obligation under both the Oil & Gas Act and Water Quality Act to provide for the protection of public health and the environment. Our regulations (19.15.29.11 NMAC) state the following,

*The responsible person shall complete division-approved corrective action for releases that endanger public health or the environment. The responsible person shall address releases in accordance with a remediation plan submitted to and approved by the division or with an abatement plan submitted in accordance with 19.15.30 NMAC. [emphasis added]*

Release characterization is the first phase of corrective action unless the release is ongoing or is of limited volume and all impacts can be immediately addressed. Proper and cost-effective remediation typically cannot occur without adequate characterization of the impacts of any release. Furthermore, the Division has the ability to impose reasonable conditions upon the efforts it oversees. **As such, the Division is requiring a workplan for the characterization of impacts associated with this release be submitted to the OCD District 1 office in Hobbs on or before 9/11/2017. If and when the release characterization workplan is approved, there will be an associated deadline for submittal of the resultant investigation report. Modest extensions of time to these deadlines may be granted, but only with acceptable justification.**

The goals of a characterization effort are: 1) determination of the lateral and vertical extents along with the magnitude of soil contamination. 2) determine if groundwater or surface waters have been impacted. 3) If groundwater or surface waters have been impacted, what are the extents and magnitude of that impact. 4) The characterization of any other adverse impacts that may have occurred (examples: impacts on vegetation, impacts on wildlife, air quality, loss of use of property, etc.). To meet these goals as quickly as possible, the following items must, at a minimum, be addressed in the release characterization workplan and subsequent reporting:

- Horizontal delineation of soil impacts in each of the four cardinal compass directions. Adsorbed soil contamination must be characterized for the following constituents using the associated laboratory methods: benzene, toluene, ethylbenzene, and total xylenes by either Method 8260 or 8021, total petroleum hydrocarbons by Method 8015 extended range (GRO+DRO+MRO; C<sub>6</sub> thru C<sub>36</sub>), and for chloride by Method 300. This is not an exclusive list of potential contaminants. Analyzed parameters should be modified based on the nature of the released substance(s). Soil sampling must be both within the impacted area and beyond.
- Vertical delineation of soil impacts. Adsorbed soil contamination must be characterized for the following constituents using the associated laboratory methods: benzene, toluene, ethylbenzene, and total xylenes by either Method 8260 or 8021, total petroleum hydrocarbons by Method 8015 extended range (GRO+DRO+MRO; C<sub>6</sub> thru C<sub>36</sub>), and for chloride by Method 300. As above, this is not an exclusive list of potential contaminants and can be modified. Vertical characterization samples should be taken at depth intervals no greater than five feet apart. Lithologic description of encountered soils must also be provided. At least ten vertical feet of soils with contaminant concentrations at or below these values must be demonstrated as existing above the water table.
- Nominal detection limits for field and laboratory analyses must be provided.
- Composite sampling is not generally allowed.
- Field screening and assessment techniques are acceptable (headspace, titration, EC [include algorithm for validation purposes], EM, etc.), but the sampling and assay procedures must be clearly defined. Copies of field notes are highly desirable. A statistically significant set of split samples must be submitted for confirmatory laboratory analysis, including the laterally farthest and vertically deepest sets of soil samples. Make sure there are at least two soil samples submitted

for laboratory analysis from each borehole or test pit (highest observed contamination and deepest depth investigated). Copies of the actual laboratory results must be provided including chain of custody documentation.

- Probable depth to shallowest protectable groundwater and lateral distance to nearest surface water. If there is an estimate of groundwater depth, the information used to arrive at that estimate must be provided. If there is a reasonable assumption that the depth to protectable water is 50 feet or less, the responsible party should anticipate the need for at least one groundwater monitoring well to be installed in the area of likely maximum contamination.

- If groundwater contamination is encountered, an additional investigation workplan may be required to determine the extents of that contamination. Groundwater and/or surface water samples, if any, must be analyzed by a competent laboratory for volatile organic hydrocarbons (typically Method 8260 full list), total dissolved solids, pH, major anions and cations including chloride and sulfate, dissolved iron, and dissolved manganese. The investigation workplan must provide the groundwater sampling method(s) and sample handling protocols. To the fullest extent possible, aqueous analyses must be undertaken using nominal method detection limits. As with the soil analyses, copies of the actual laboratory results must be provided including chain of custody documentation.

- Accurately scaled and well-drafted site maps must be provided providing the location of borings, test pits, monitoring wells, potentially impacted areas, and significant surface features including roads and site infrastructure that might limit either the release characterization or remedial efforts. Field sketches may be included in subsequent reporting, but should not be considered stand-alone documentation of the site's layout. Digital photographic documentation of the location and fieldwork is recommended, especially if unusual circumstances are encountered.

**Nothing herein should be interpreted to preclude emergency response actions or to imply immediate remediation by removal cannot proceed as warranted. Nonetheless, characterization of impacts and confirmation of the effectiveness of remedial efforts must still be provided to the OCD before any release incident will be closed.**

**Jim Griswold**

OCD Environmental Bureau Chief  
1220 South St. Francis Drive  
Santa Fe, New Mexico 87505  
505-476-3465  
jim.griswold@state.nm.us