



02221020

FORM
27
Rev 6/99State of Colorado
Oil and Gas Conservation Commission

1120 Lincoln Street, Suite 801, Denver, Colorado 80203 (303)894-2100 Fax: (303)894-2109

#6685

FOR OGCC USE ONLY

SITE INVESTIGATION AND REMEDIATION WORKPLAN

This form shall be submitted to the Director for approval prior to the initiation of site investigation and remediation activities. Form 27 is intended to be used whenever possible. Additional documentation will be required when large volumes of soil and groundwater have been impacted or involve large facilities with multiple source areas. See Rule 910. Attach as many pages as needed to fully describe the proposed work.

OGCC Employee:

☐ Spill ☐ Complaint
☐ Inspection ☐ NOAV

Tracking No:

CAUSE OF CONDITION BEING INVESTIGATED AND REMEDIATED

☐ Spill or Release ☐ Plug & Abandon ☐ Central Facility Closure ☐ Site/Facility Closure ☒ Other (describe): Removal of 1/2 Buried tank

OGCC Operator Number: 10275A

Name of Operator: Augustus Energy Partners, LLC

Address: P. O. Box 250

City: Wray, State: CO Zip: 80758

Contact Name and Telephone:

Loni Davis

No: 970-332-3585

Fax: 970-332-3587

API Number: 05-125-11422

County: Yuma

Facility Name:

Facility Number:

Well Name: Chapman

Well Number: 19-10

Location: (QtrQtr, Sec, Twp, Rng, Meridian): NWSE/4 Sec. 19 T1S-R44W, 6th pm Latitude: 39.95444 Longitude: -102.34387

TECHNICAL CONDITIONS

Type of Waste Causing Impact (crude oil, condensate, produced water, etc): Produced Water

Site Conditions: Is location within a sensitive area (according to Rule 901e)? ☐ Y ☒ N If yes, attach evaluation.

Adjacent land use (cultivated, irrigated, dry land farming, industrial, residential, etc.): Irrigated and Pasture

Soil type, if not previously identified on Form 2A or Federal Surface Use Plan: 25: Kuma Keith Silt Loams

Potential receptors (water wells within 1/4 mi, surface waters, etc.): 2 Water wells withing 1/4 mile

Description of Impact (if previously provided, refer to that form or document):

Impacted Media (check):



Soils



Vegetation



Groundwater



Surface Water

Extent of Impact:

NA

NA

How Determined:

Soil Analysis

Soil Analysis

REMEDIALTION WORKPLAN

Describe initial action taken (if previously provided, refer to that form or document):

After removal of the 1/2 Buried produced water tank, we sampled the soil under the tank and the background area. Per the soil analysis the EC and SAR levels fell outside the COGCC Table 910-1 guidelines. Sample of analysis is attached for your review. The Chapman 19-11 API # 05-125-10373 also flowed to this removed tank.

Describe how source is to be removed:

NA

Describe how remediation of existing impacts is to be accomplished, including removal and disposal at an injection well or licensed facility, land treatment on site, removal of impacted groundwater, insitu bioremediation, burning of oily vegetation, etc.:

NA

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REMEDIATION WORKPLAN (Cont.)

Tracking Number: _____
Name of Operator: _____
OGCC Operator No: _____
Received Date: _____
Well Name & No: _____
Facility Name & No: _____

OGCC Employee: _____

If groundwater has been impacted, describe proposed monitoring plan (# of wells or sample points, sampling schedule, analytical methods, etc.):

NA

Describe reclamation plan. Discuss existing and new grade recontouring; method and testing of compaction alleviation; and reseeding program, including location of new seed, seed mix and noxious weed prevention. Attach diagram or drawing. Use additional sheet for description if required.

The Soil was sampled on 10/02/11, the EC and SAR levels are outside the limits of the COGCC table 910-1. Per our consultant at Enviro-AG we will be applying 2.5 lb/Sq-ft of high Cal. Soil will be resampled in 2-3 weeks after treatment. Once the soil has reached the acceptable levels we will reseed and crimp grass straw to help alleviate erosion and promote revegetation.

Attach samples and analytical results taken to verify remediation of impacts. Show locations of samples on an onsite schematic or drawing.

Is further site investigation required? ☒ Y ☐ N If yes, describe:

Yes, we will continue to monitor site after treatment and reseeding for erosion and revegetation to determine if any further treatment will be required.

Final disposition of E&P waste (landtreated and disposed onsite, name of licensed disposal facility, recycling, reuse, etc.):

NA

IMPLEMENTATION SCHEDULE

Date Site Investigation Began: 09/21/11 Date Site Investigation Completed: 10/02/11 Date Remediation Plan Submitted: 11/08/11
Remediation Start Date: 11/14/11 Anticipated Completion Date: 12/05/11 Actual Completion Date: _____

I hereby certify that the statements made in this form are, to the best of my knowledge, true, correct, and complete.

Print Name: Lonl J. Davis

Signed: Lonl J. Davis

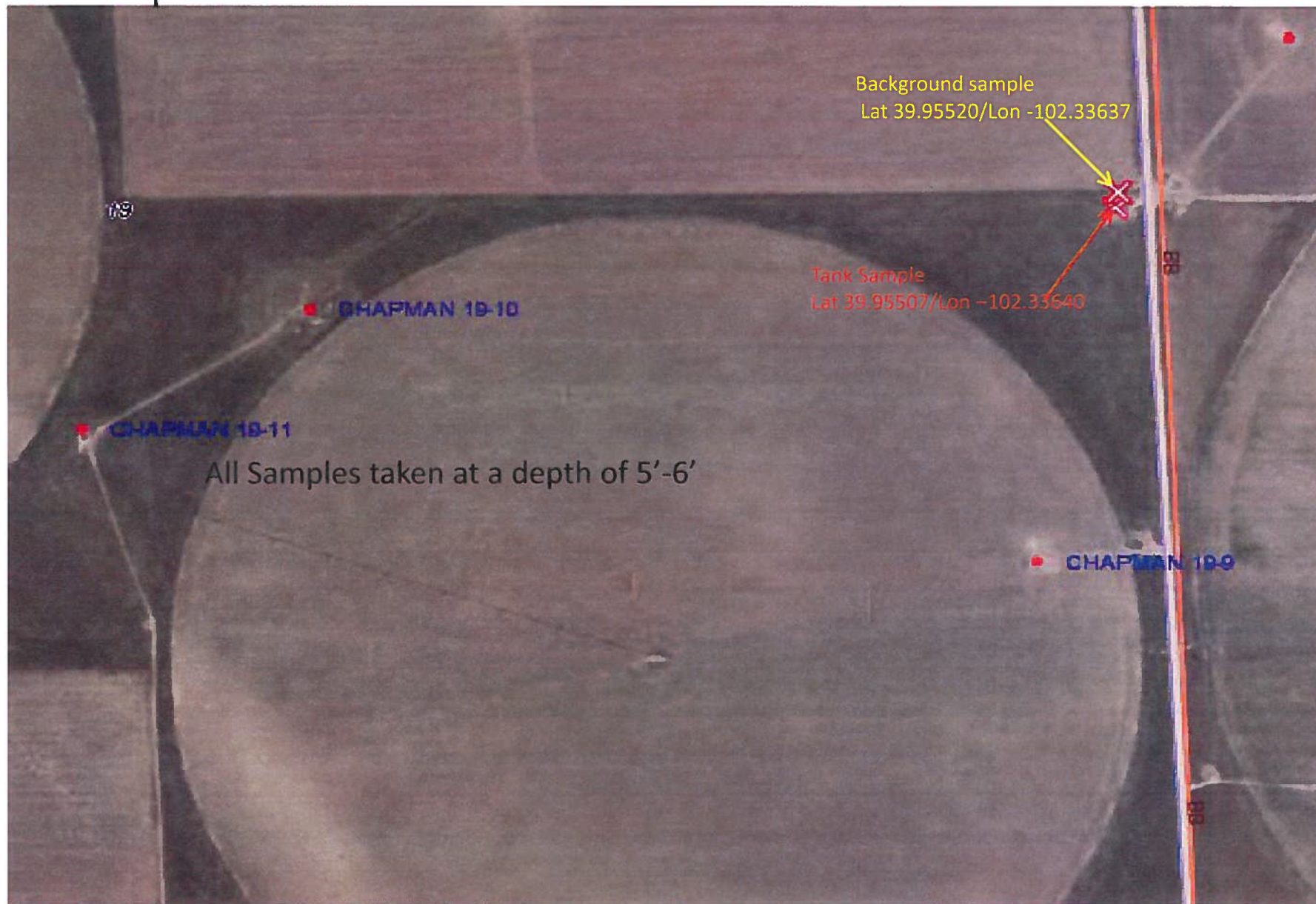
Title: Operations Accounting and Regulatory Specialist

Date: 11/08/11

OGCC Approved: [Signature]Title: ESRDate: 11/10/11

North
↑

Chapman 19-10 & 19-11



SOIL ANALYSIS REPORT



**Servi-Tech
Laboratories**
www.servitechlabs.com

6921 S. Bell
Amarillo, TX 79109
800.557.7509
806.677.0093
Fax 806.677.0329

CLIENT:	ENVIRO-AG ENGINEERING INC
6224	3404 AIRWAY BLVD AMARILLO, TX 79118

LAB NO:	319 - 320
INVOICE NO:	118380
DATE RECEIVED:	10/04/2011
DATE REPORTED:	10/14/2011

SOIL ANALYSIS RESULTS FOR AUGUSTUS ENERGY

FIELD IDENTIFICATION: CHAPMAN 19-10

METHOD USED:			2:1 Water-Soil		2:1 Water-Soil																
Lab Number	Sample ID	Sample Depth	Soil pH	Buffer pH	Sol. Salts mmho/cm	Excess Lime	% Organic Matter			Phosphorus ppm P	Potassium ppm K	Sulfur ppm	lb. S/A	Calcium ppm Ca	Magnesium ppm Mg	Sodium ppm Na	Zinc ppm Zn	Iron ppm Fe	Manganese ppm Mn	Copper ppm Cu	Boron ppm B
319	TANK	60 - 72	8.9		2.02	Hi															
320	BACKGROUND	60 - 72	8.7		0.19	Hi															

METHOD USED:			Sat. Paste																	
Lab Number	Sample ID	Sample Depth	Saturation % Sat	Electrical Conductivity mmho/cm	Calcium mg/L Ca	Magnesium mg/L Mg	Sodium mg/L Na	Sodium Adsorption Ratio												
319	TANK	60 - 72	55	8.78	60	11	1820	56.7												
320	BACKGROUND	60 - 72	44	0.38	28	7	39	1.7												

FERTILIZER RECOMMENDATIONS:

POUNDS ACTUAL NUTRIENT PER ACRE

Lab Number	Sample ID	Crop To Be Grown	Yield Goal	Lime, ECC Tons/A to raise pH to:			N	P ₂ O ₅	K ₂ O	Zn	S	Mn	Cu	MgO	B	Ca	Cl	Cation Exchange Capacity					
				6.0	6.5	7.0																	
319	TANK																	CEC	%H	%K	%Ca	%Mg	%Na
320	BACKGROUND																						

ADDITIONAL WELL: CHAPMAN 19-11

Analyses are representative of the samples submitted

Samples are retained 30 days after report of analysis

Explanations of soil analysis terms are available upon request

Reviewed and
Approved By:

Todd Whatley
Laboratory Manager

Todd D. Whatley

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