

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

FORM APPROVED
OMB NO. 1004-0137
Expires: January 31, 2018

SUNDRY NOTICES AND REPORTS ON WELLS
Do not use this form for proposals to drill or to re-enter an abandoned well. Use form 3160-3 (APD) for such proposals.

5. Lease Serial No.
NMNM036253

6. If Indian, Allottee or Tribe Name

7. If Unit or CA/Agreement, Name and/or No.

SUBMIT IN TRIPLICATE - Other instructions on page 2

1. Type of Well
 Oil Well Gas Well Other

8. Well Name and No.
E W MUDGE 8

2. Name of Operator
DJR OPERATING LLC
Contact: SHAW-MARIE CRUES
E-Mail: scrues@djrlc.com

9. API Well No.
30-045-26217-00-S1

3a. Address
1600 BROADWAY SUITE 1960
DENVER, CO 80202

3b. Phone No. (include area code)
Ph: 505-632-3476

10. Field and Pool or Exploratory Area
BISTI LOWER GALLUP

4. Location of Well (Footage, Sec., T., R., M., or Survey Description)
Sec 16 T25N R11W NWSE 1980FSL 1770FEL
36.399090 N Lat, 108.005770 W Lon

11. County or Parish, State
SAN JUAN COUNTY, NM

12. CHECK THE APPROPRIATE BOX(ES) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION			
<input checked="" type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-Off
<input type="checkbox"/> Subsequent Report	<input type="checkbox"/> Alter Casing	<input type="checkbox"/> Hydraulic Fracturing	<input type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input type="checkbox"/> Recomplete	<input checked="" type="checkbox"/> Other Workover Operations
	<input type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon	
	<input type="checkbox"/> Convert to Injection	<input type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal	

13. Describe Proposed or Completed Operation: Clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recomplete horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports must be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 must be filed once testing has been completed. Final Abandonment Notices must be filed only after all requirements, including reclamation, have been completed and the operator has determined that the site is ready for final inspection.

DJR Operating, LLC. plans to perform a workover on this well. The well has been SI for an extended period to perform surface reclamation work. The well was RTP & has made large volumes of water. DJR intends to determine if the water is coming from the Gallup Perfs (4828'-4988') or if the casing has developed a leak using an RBP & packer. A CBL log will be ran and the information will be reviewed. DJR request that we be allowed to set a packer above the Gallup perfs & pump the well to determine if the Gallup interval has been flooded & to determine if a casing repair job is warranted. Closed Loop System will be used. Workover Procedure & wellbore diagram are attached.

NMOCD

AUG 09 2019

DISTRICT III

**SEE ATTACHED FOR
CONDITIONS OF APPROVAL**

14. I hereby certify that the foregoing is true and correct.

**Electronic Submission #473790 verified by the BLM Well Information System
For DJR OPERATING LLC, sent to the Farmington
Committed to AFMSS for processing by JOE KILLINS on 07/31/2019 (19JK0113SE)**

Name (Printed/Typed) SHAW-MARIE CRUES	Title HSE TECHNICIAN
Signature (Electronic Submission)	Date 07/17/2019

THIS SPACE FOR FEDERAL OR STATE OFFICE USE

Approved By JOE KILLINS Title ENGINEER Date 07/31/2019

Conditions of approval, if any, are attached. Approval of this notice does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Office Farmington

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

(Instructions on page 2)

**** BLM REVISED ** BLM REVISED ** BLM REVISED ** BLM REVISED ** BLM REVISED ****

NMOCD



EW Mudge 8
Section 16, T25N, R11W
API#: 30-045-26217
July 11, 2019
Stacy Sandoval and Loren Diede

Workover Procedure:

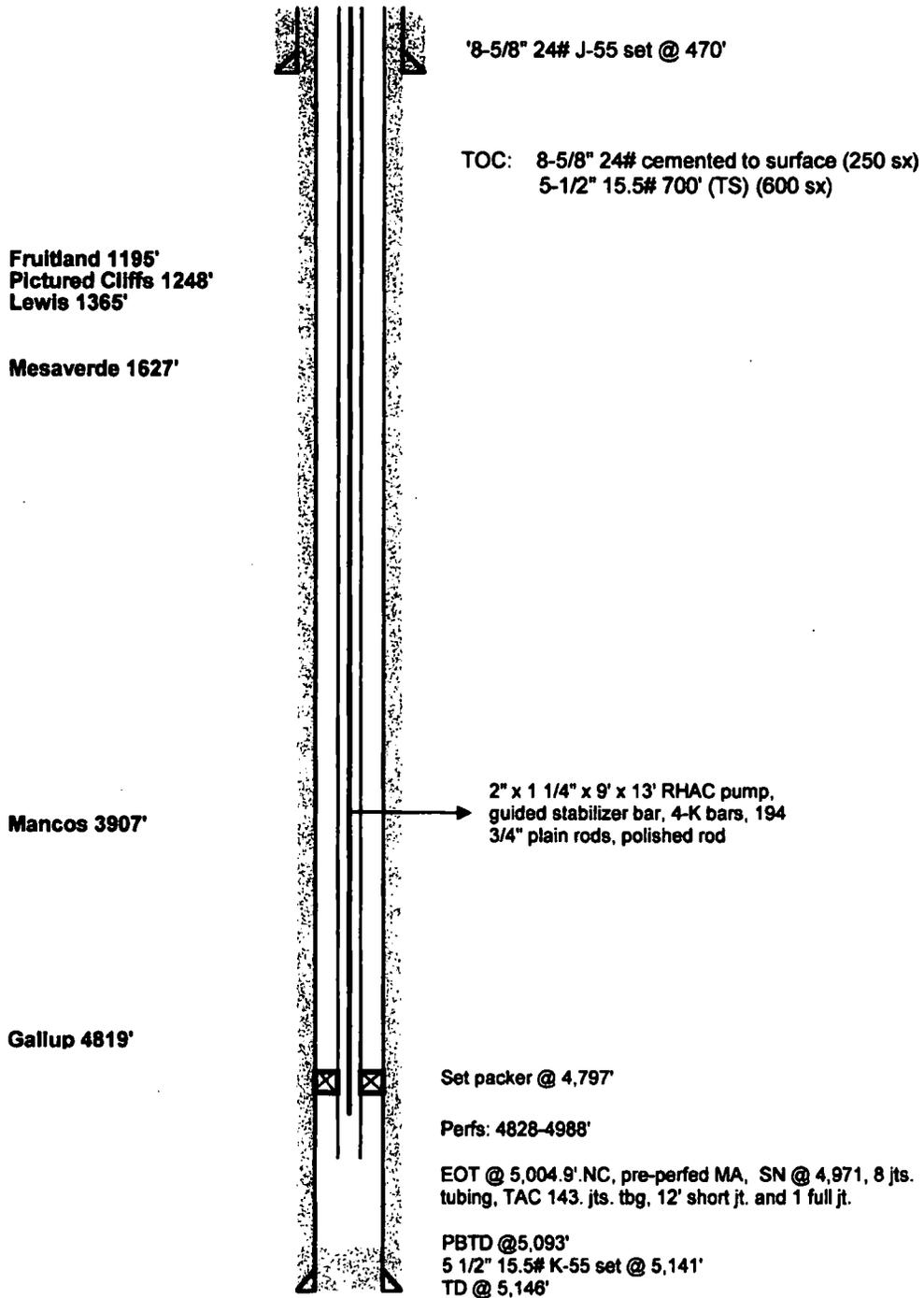
1. MIRU workover Rig
2. Pull rods, pump and tubing.
3. TIH with bit and scraper to PBTD. TOOH.
4. TIH with RBP and packer.
5. Find casing leak(s).
6. Run CBL log.
7. Review findings with NMOCD. Review repair options. (Water Analyses dated 6-27-19 showed a TDS of 36,800 mg/L)

Remarks:

-Based on our findings and evaluation of results the well will be either repaired or placed on the P&A list.



**Wellbore Diagram
EW Mudge 8
SE/4, Sec 16, T25N, R11W
San Juan, County, NM
API: 30-045-26217**



Analytical Report

Report Summary

Client: DJR Operating, LLC

Samples Received: 6/20/2019

Job Number: 17035-0028

Work Order: P906092

Project Name/Location: EW Mudge 8

Report Reviewed By:



Date: 6/27/19

Walter Hinchman, Laboratory Director



Envirotech Inc. certifies the test results meet all requirements of TNI unless footnoted otherwise.
Statement of Data Authenticity: Envirotech, Inc. attests the data reported has not been altered in any way.
Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.
Envirotech, Inc. currently holds the appropriate and available Utah TNI certification NM009792018-1 for the data reported.



DJR Operating, LLC	Project Name	EW Mudge 8	Reported: 06/27/19 08:59
1 Rd 3263	Project Number	17035-0028	
Aztec NM, 87410	Project Manager	Amy Archuleta	

Analytical Report for Samples

Client Sample ID	Lab Sample ID	Matrix	Sampled	Received	Container
EW Mudge #8 Tubing	P906092-01A	Water	06/19/19	06/20/19	Poly 250mL

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.

DJR Operating, LLC 1 Rd 3263 Aztec NM, 87410	Project Name Project Number Project Manager	EW Mudge 8 17035-0028 Amy Archuleta	Reported: 06/27/19 08:59
--	---	---	------------------------------------

**EW Mudge #8 Tubing
P906092-01 (Water)**

Reporting									
Analyte	Result	Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes

Wet Chem/Gravimetric

Total Dissolved Solids	36800	10.0	mg/L	1	1925045	06/22/19	06/25/19	SM2540C	
------------------------	--------------	------	------	---	---------	----------	----------	---------	--

Dissolved Metals by 6010

Calcium	249	1.00	mg/L	1	1925042	06/21/19	06/24/19	EPA 6010C	
Iron	5.14	2.00	mg/L	1	1925042	06/21/19	06/24/19	EPA 6010C	
Magnesium	81.4	1.00	mg/L	1	1925042	06/21/19	06/24/19	EPA 6010C	
Potassium	81.8	50.0	mg/L	50	1925042	06/21/19	06/25/19	EPA 6010C	
Sodium	15600	100	mg/L	50	1925042	06/21/19	06/25/19	EPA 6010C	
Sodium Absorption Ratio	219		N/A	1	1926012	06/26/19	06/26/19	[CALC]	

Anions by 300.0/9056A

Chloride	21600	100	mg/L	50	1925035	06/20/19	06/21/19	EPA 300.0/9056A	
Fluoride	ND	12.5	mg/L	50	1925035	06/20/19	06/21/19	EPA 300.0/9056A	
Nitrate-N	ND	12.5	mg/L	50	1925035	06/20/19 16:53	06/21/19 10:06	EPA 300.0/9056A	
Nitrite-N	ND	12.5	mg/L	50	1925035	06/20/19 16:53	06/20/19 19:18	EPA 300.0/9056A	
o-Phosphate-P	ND	12.5	mg/L	50	1925035	06/20/19 16:53	06/20/19 19:18	EPA 300.0/9056A	
Sulfate	ND	100	mg/L	50	1925035	06/20/19	06/20/19	EPA 300.0/9056A	

Wet Chemistry

Total Alkalinity (as CaCO ₃ at pH 4.5)	4510	10.0	mg/L	1	1925036	06/21/19	06/21/19	SM2320B	
Specific Conductance (@ 25 C)	59300	10.0	uS/cm	1	1926006	06/25/19	06/25/19	9050A/2510 B	
pH @25°C	7.27		pH Units	1	1925037	06/21/19 07:30	06/21/19 09:26	9040C/4500 H+B	HI

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.

DJR Operating, LLC 1 Rd 3263 Aztec NM, 87410	Project Name: EW Mudge 8 Project Number: 17035-0028 Project Manager: Amy Archuleta	Reported: 06/27/19 08:59
--	--	------------------------------------

Wet Chem/Gravimetric - Quality Control
Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
---------	--------	-----------------	-------	-------------	---------------	------	-------------	-----	-----------	-------

Batch 1925045 - Wet Chemistry Preparation

Blank (1925045-BLK1)				Prepared 06/22/19 0 Analyzed 06/25/19 1						
Total Dissolved Solids	ND	10.0	mg/L							
LCS (1925045-BS1)				Prepared 06/22/19 0 Analyzed 06/25/19 1						
Total Dissolved Solids	86.0	10.0	mg/L	100		86.0	50-150			
Duplicate (1925045-DUP1)				Source: P906093-06 Prepared 06/22/19 0 Analyzed 06/25/19 1						
Total Dissolved Solids	6520	10.0	mg/L		6480			0.654	5	

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.



DJR Operating, LLC 1 Rd 3263 Aztec NM, 87410	Project Name: EW Mudge 8 Project Number: 17035-0028 Project Manager: Amy Archuleta	Reported: 06/27/19 08:59
--	--	-----------------------------

Dissolved Metals by 6010 - Quality Control
Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
---------	--------	-----------------	-------	-------------	---------------	------	-------------	-----	-----------	-------

Batch 1925042 - Metals Water Hotblock Digestion EPA 3010A/200.2

Blank (1925042-BLK1)

Prepared 06/21/19 | Analyzed 06/24/19 |

Calcium	ND	1.00	mg/L							
Iron	ND	2.00	"							
Magnesium	ND	1.00	"							
Potassium	ND	1.00	"							
Sodium	ND	2.00	"							

LCS (1925042-BS1)

Prepared 06/21/19 | Analyzed 06/24/19 |

Calcium	49.8	1.00	mg/L	50.0		99.5	80-120			
Iron	100	2.00	"	100		100	80-120			
Magnesium	52.1	1.00	"	50.0		104	80-120			
Potassium	5.02	1.00	"	5.00		100	80-120			
Sodium	18.2	2.00	"	20.0		91.2	80-120			

Matrix Spike (1925042-MS1)

Source: P906093-01

Prepared 06/21/19 | Analyzed 06/24/19 |

Calcium	449	1.00	mg/L	50.0	405	86.6	75-125			
Iron	102	2.00	"	100	ND	102	75-125			
Magnesium	374	1.00	"	50.0	327	92.8	75-125			
Potassium	17.7	1.00	"	5.00	10.2	150	75-125			SPK1
Sodium	5250	200	"	20.0	4770	NR	75-125			SPK2

Matrix Spike Dup (1925042-MSD1)

Source: P906093-01

Prepared 06/21/19 | Analyzed 06/24/19 |

Calcium	451	1.00	mg/L	50.0	405	92.0	75-125	0.600	20	
Iron	102	2.00	"	100	ND	102	75-125	0.00	20	
Magnesium	372	1.00	"	50.0	327	89.0	75-125	0.510	20	
Potassium	17.6	1.00	"	5.00	10.2	148	75-125	0.396	20	SPK1
Sodium	5280	200	"	20.0	4770	NR	75-125	0.532	20	SPK2

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.



DJR Operating, LLC 1 Rd 3263 Aztec NM, 87410	Project Name: EW Mudge 8 Project Number: 17035-0028 Project Manager: Amy Archuleta	Reported: 06/27/19 08:59
--	--	------------------------------------

Anions by 300.0/9056A - Quality Control
Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
---------	--------	-----------------	-------	-------------	---------------	------	-------------	-----	-----------	-------

Batch 1925035 - Anion Extraction EPA 300.0/9056A

Blank (1925035-BLK1)

Prepared & Analyzed: 06/20/19 1

Fluoride	ND	0.250	mg/L							
Chloride	ND	2.00	"							
Nitrite-N	ND	0.250	"							
Nitrate-N	ND	0.250	"							
o-Phosphate-P	ND	0.250	"							
Sulfate	ND	2.00	"							

LCS (1925035-BS1)

Prepared & Analyzed: 06/20/19 1

Fluoride	2.56	0.250	mg/L	2.50		102	90-110			
Chloride	25.6	2.00	"	25.0		102	90-110			
Nitrite-N	2.44	0.250	"	2.50		97.6	90-110			
Nitrate-N	2.58	0.250	"	2.50		103	90-110			
o-Phosphate-P	12.2	0.250	"	12.5		97.9	90-110			
Sulfate	23.8	2.00	"	25.0		95.1	90-110			

LCS Dup (1925035-BSD1)

Prepared & Analyzed: 06/20/19 1

Fluoride	2.55	0.250	mg/L	2.50		102	90-110	0.392	20	
Chloride	25.8	2.00	"	25.0		103	90-110	0.740	20	
Nitrite-N	2.45	0.250	"	2.50		98.1	90-110	0.532	20	
Nitrate-N	2.59	0.250	"	2.50		104	90-110	0.619	20	
o-Phosphate-P	12.4	0.250	"	12.5		99.2	90-110	1.23	20	
Sulfate	24.1	2.00	"	25.0		96.2	90-110	1.17	20	

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.



DJR Operating, LLC 1 Rd 3263 Aztec NM, 87410	Project Name: EW Mudge 8 Project Number: 17035-0028 Project Manager: Amy Archuleta	Reported: 06/27/19 08:59
--	--	-----------------------------

Wet Chemistry - Quality Control
Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
---------	--------	-----------------	-------	-------------	---------------	------	-------------	-----	-----------	-------

Batch 1925036 - Wet Chemistry Preparation

LCS (1925036-BS1)		Prepared: 06/21/19 0 Analyzed: 06/21/19 1								
Total Alkalinity (as CaCO3 at pH 4.5)	259	10.0	mg/L	250		103	70-130			
LCS Dup (1925036-BSD1)		Prepared: 06/21/19 0 Analyzed: 06/21/19 1								
Total Alkalinity (as CaCO3 at pH 4.5)	251	10.0	mg/L	250		100	70-130	3.06	20	

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.



DJR Operating, LLC 1 Rd 3263 Aztec NM, 87410	Project Name: EW Mudge 8 Project Number: 17035-0028 Project Manager: Amy Archuleta	Reported: 06/27/19 08:59
--	--	------------------------------------

Wet Chemistry - Quality Control
Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
---------	--------	-----------------	-------	-------------	---------------	------	-------------	-----	-----------	-------

Batch 1925037 - Wet Chemistry Preparation

LCS (1925037-BS1)				Prepared & Analyzed: 06/21/19 0							
pH	7.99		pH Units	8.00		99.9	98.75-101.25				
Duplicate (1925037-DUP1)				Source: P906092-01			Prepared & Analyzed: 06/21/19 0				
pH	7.31		pH Units	7.27				0.549	20		

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.



DJR Operating, LLC 1 Rd 3263 Aztec NM, 87410	Project Name: EW Mudge 8 Project Number: 17035-0028 Project Manager: Amy Archuleta	Reported: 06/27/19 08:59
--	--	-----------------------------

Wet Chemistry - Quality Control
Envirotech Analytical Laboratory

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
---------	--------	-----------------	-------	-------------	---------------	------	-------------	-----	-----------	-------

Batch 1926006 - Wet Chemistry Preparation

Blank (1926006-BLK1)		Prepared: 06/25/19 0 Analyzed: 06/25/19 1								
Specific Conductance (@ 25 C)	ND	10.0	uS/cm							
LCS (1926006-BS1)		Prepared: 06/25/19 0 Analyzed: 06/25/19 1								
Specific Conductance (@ 25 C)	1400	10.0	uS/cm	1410		99.1	98-102			
Duplicate (1926006-DUP1)		Source: P906106-01		Prepared: 06/25/19 0 Analyzed: 06/25/19 1						
Specific Conductance (@ 25 C)	ND	10.0	uS/cm		ND				20	

QC Summary Report

Comment:

Calculations are based off of the raw (non-rounded) data. However, for reporting purposes all QC data is rounded to three significant figures. Therefore, hand calculated values may differ slightly.

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.

DJR Operating, LLC	Project Name:	EW Mudge 8	Reported: 06/27/19 08:59
1 Rd 3263	Project Number:	17035-0028	
Aztec NM, 87410	Project Manager:	Amy Archuleta	

Notes and Definitions

- SPK2 The spike recovery was outside of QC acceptance limits for the MS and/or MSD due to native analyte concentration at 4 times or greater than the spike concentration.
- SPK1 The spike recovery is outside of quality control limits.
- H1 Sample was received after regulatory hold-time exceeded for target analyte.
- DET Analyte DETECTED
- ND Analyte NOT DETECTED at or above the reporting limit
- NR Not Reported
- RPD Relative Percent Difference
- ** Methods marked with ** are non-accredited methods.

Partial or incomplete reproduction of this report is prohibited, unless approved by Envirotech, Inc.

Client: DJR OPERATING.
 Project: EW MUDGE #8
 Sampler: TYLYNN BIRDSON
 Phone: mcoley@walsheng.net
 Email(s): vern@walsheng.net, ssandoval@djrlc.com
 Project Manager:

RUSH?
 1d
 3d

Lab Use Only		Analysis and Method							lab Only			
Lab WO#		GRO/DRO by 8015	BTEX by 8021	TPH by 418.1	Chloride by 300.0	TCLP Metals	CO Table 910-1	TDS	CATION/ANION	PH	Lab Number	Correct Cont./Prsrv (s) Y/N
Job Number												
P906092		17035-0028										

Page 1 of 1

Sample ID	Sample Date	Sample Time	Matrix	Containers QTY - Vol/TYPE/Preservative	GRO/DRO by 8015	BTEX by 8021	TPH by 418.1	Chloride by 300.0	TCLP Metals	CO Table 910-1	TDS	CATION/ANION	PH	Lab Number	Correct Cont./Prsrv (s) Y/N
EW MUDGE #8 TUSING.	6/19/19	2:00pm										X	X	1	

Relinquished by: (Signature) <i>Andy Nelson</i>	Date 6/20/19	Time 1449	Received by: (Signature) <i>Raina Lopez</i>	Date 6/20/19	Time 2:50pm	Lab Use Only					
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time	**Received on Ice Y / (N)					
						T1 30.6	T2	T3	AVG Temp °C 30.6		

Sample Matrix: S - Soil, Sd - Solid, Sg - Sludge, A - Aqueous, O - Other _____ Container Type: g - glass, p - poly/plastic, ag - amber glass

**Samples requiring thermal preservation must be received on ice the day they are sampled or received packed in ice at an avg temp above 0 but less than 6 °C on subsequent days.

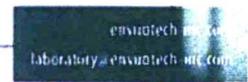
Sample(s) dropped off after hours to a secure drop off area. Chain of Custody Notes/Billing info:

Page 11 of 11



5796 US Highway 64, Farmington, NM 87401
 Three Springs - 65 Mercado Street, Suite 115, Durango, CO 81301

Ph (505) 632-0615 Fx (505) 632-1865
 Ph (970) 259-0615 Fr (800) 362-1879



UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
FARMINGTON DISTRICT OFFICE
6251 COLLEGE BLVD.
FARMINGTON, NEW MEXICO 87402

Attachment to notice of
Intention to workover:
API: 30-045-26217

Re: workover
Well: E.W. MUDGE 008

CONDITIONS OF APPROVAL

1. Workover operations authorized are subject to these conditions.
2. Farmington Office is to be notified at least 24 hours before the logging operations commence (505) 564-7750.
3. Submit electronic copy of the log for verification to the following addresses: jkillins@blm.gov and Brandon.Powell@state.nm.us .