



Terra Energy Partners, LLC

LONG STRING POST JOB REPORT

Leverich WMC 314-18-793 05-045-24571
S:13 T:7S R:94W Garfield CO

CallSheet #: 88682
Proposal #: 71598



LONG STRING Post Job Report

Attention: Mr. Dustin Childers | (936) 524-8828 | dchilders@terraep.com

Terra Energy Partners, LLC

4828 Loop Central Dr., Suite 900 | Houston, TX 77081

Dear Mr. Dustin Childers,

Thank you for the opportunity to provide cementing services on this well. American Cementing strives to achieve complete customer satisfaction. If you have any questions regarding the services or data provided, please contact American Cementing at any time.

Sincerely,

Krystal Schell

Field Engineer I | (719) 992-1830 | krystal.schell@americacementing.com

Field Office 28730 US-6, Rifle, CO 81650
Phone: (970) 657-1187

Job Details & Summary

Geometry

Type	Function	OD (in)	ID (in)	Weight (lb/ft)	Thread	Top (ft)	Bottom (ft)	Excess (%)
Casing	Outer	9.625	8.921	36	n/a	0	1172	0
Open Hole	Outer	n/a	8.75	n/a	n/a	1172	7272	85
Open Hole	Outer	n/a	8.75	n/a	n/a	7272	10458	50
Casing	Inner	4.5	4	11.6	n/a	0	10458	0

Equipment / People

Unit Type	Unit	Power Unit	Employee #1
Field Storage Silo	FSS-438		
Cement Trailer Float	CTF-522	TRC-425	Pete Pangelinan
Cement Utility Float	CUF-162	LDV-049	Eric Dewit
Cement Pump Float	CPF-071	TRH-773	Christopher Lough

Timing

Event	Date/Time
ERTS	10/13/2023 01:00
Call Out	10/12/2023 16:00
Depart Facility	10/12/2023 21:30
On Location	10/12/2023 23:25
Rig Up Iron	10/12/2023 23:55
Job Started	10/13/2023 03:19
Job Completed	10/13/2023 05:31
Rig Down Iron	10/13/2023 05:35
Depart Location	10/13/2023 07:20

General Job Information

Metrics	Value
Well Fluid Density	9 lb/gal
Well Fluid Type	WBM
Rig Circulation Vol	800 bbls
Rig Circulation Time	1.5 hours
Calculated Displacement	161 bbls
Actual Displacement	161 bbls
Total Spacer to Surface	0 bbls
Total CMT to Surface	0 bbls
Well Topped Out	No

Job Details

Metrics	Value
Flare Prior to Job	No
Flare Prior to Job	0 units
Flare During Job	No
Flare During Job	0 units
Flare at End of Job	No
Flare at End of Job	0 units
Well Full Prior to Job	Yes
Well Fluid Density Into Well	9 lb/gal
Well Fluid Density Out of Well	9 lb/gal

Job Details (cont.)

Metrics	Value
BHCT	173 °F
BHST	230 °F

Water Analysis

Metrics	Value	Recommended
Water Source	Upright Rig Tank	
Temperature	67 °F	50-80 °F
pH Level	7	5.5-8.5
Chlorides	0 mg/L	0-3000 mg/L
Total Alkalinity	110	0-1000
Total Hardness	200 mg/L	0-500 mg/L
Carbonates	0 mg/L	0-100 mg/L
Sulfates	<250 mg/L	0-1500 mg/L
Potassium	300 mg/L	0-3000 mg/L
Iron	0 mg/L	0-300 mg/L

Circulation

Lost Circulation Experienced	Losses into Spacer	Losses into Cement	Losses into Displacement
Yes	0	0	0

Circulation Details

Did not have circulation during any part of the job

Job Execution Information

Fluid	Product	Function	Density (lb/gal)	Yield (ft ³ /sk)	Water Rq. (gal/sk)	Water Rq. (gal/bbl)	Volume (sks)	Volume (bbl)	Designed Top (ft)
1	Water	Flush	8.34			42.00		10.00	5566
2	Mud Flush	Flush	8.45			40.86		20.00	5665
3	Water	Flush	8.34			42.00		10.00	5863
4	Lead	Lead	12.50	2.21	12.31		337.00	132.58	5962
5	Tail	Tail	13.00	2.05	10.27		794.00	289.72	7272
6	Displacement	DisplacementFinal	8.34			42.00		168.00	0

Job Fluid Details

Fluid	Type	Fluid	Product	Function	Conc.	Uom
2	Flush	Mud Flush	SAPP	Surfactant	10.00	lb/bbl
2	Flush	Mud Flush	SS-201	Surfactant	0.50	gal/bbl
4	Lead	Lead	ASTM TYPE IL	Cement	100.00	%
4	Lead	Lead	A-2	Accelerator	0.20	%BWOB
4	Lead	Lead	FL-66	FluidLoss	0.30	%BWOB
4	Lead	Lead	GW-86	Viscosifier	0.10	%BWOB
4	Lead	Lead	R-3	Retarder	0.50	%BWOB
4	Lead	Lead	R-7C	Retarder	0.10	%BWOB
4	Lead	Lead	STATIC FREE	Other	0.01	lb/sk
4	Lead	Lead	XCem-1009	Extender	10.00	lb/sk
4	Lead	Lead	XCem-308	Defoamer	0.30	%BWOB
5	Tail	Tail	CLASS G	Cement	50.00	%
5	Tail	Tail	FLY ASH (POZZOLAN)	Extender	50.00	%
5	Tail	Tail	BENTONITE	Viscosifier	6.00	%BWOB
5	Tail	Tail	FL-66	FluidLoss	0.40	%BWOB
5	Tail	Tail	GW-86	Viscosifier	0.10	%BWOB
5	Tail	Tail	IntegraSeal PHENO	LostCirculation	0.50	lb/sk
5	Tail	Tail	IntegraSeal POLI	LostCirculation	0.25	lb/sk
5	Tail	Tail	S-8	StrengthRetgression	20.00	%BWOB
5	Tail	Tail	XCem-1009	Extender	6.00	lb/sk
5	Tail	Tail	XCem-308	Defoamer	0.30	%BWOB
5	Tail	Tail	XCem-916	Retarder	0.40	%BWOB

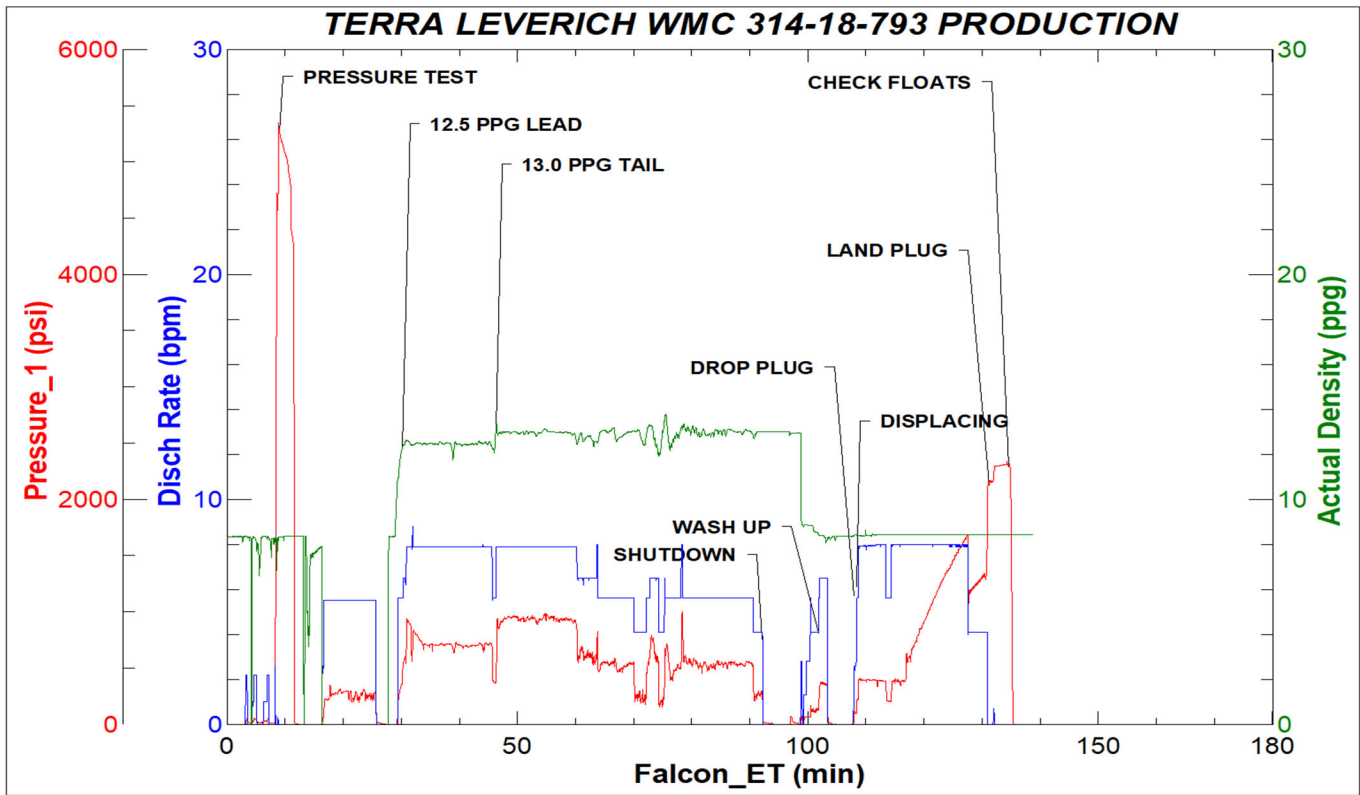
Job Logs

Line	Event	Date (MM/DD/YY)	Time (HH:MM)	Density (lb/gal)	Pump Rate (bpm)	Pump Volume (bbls)	Pipe Pressure (psi)	Comment
1	Callout	10/12/2023	16:00					Customer calls with and RTS of 01:00 on 10/13/23
2	Arrive On Location	10/12/2023	23:25					Rig is running casing
3	Spot Trucks	10/12/2023	23:40					
4	Rig Up Iron	10/12/2023	23:55					Rig up iron to the stand pipe, bulk, and water
5	Safety Meeting	10/13/2023	02:30					Pre-job safety meeting with AC crew, rig crew, and company man
6	Rig Up Iron	10/13/2023	03:00					Rig up cement head
7	Fill Lines	10/13/2023	03:19	8.37	2.2	5	135	
8	Pressure Test Lines	10/13/2023	03:25	8.34	0	0	5580	
9	Pump Spacer	10/13/2023	03:33	8.34	5.5	10	202	Pump 10 bbls of fresh water
10	Pump Spacer	10/13/2023	03:35	8.34	5.5	20	272	Pump 20 bbls of mud flush
11	Pump Spacer	10/13/2023	03:39	8.34	5.5	10	300	Pump 10 bbls of fresh water
12	Pump Lead Cement	10/13/2023	03:46	12.5	7.9	137	904	Pump 337 sks of Lead Cement @12.5 ppg
13	Pump Tail Cement	10/13/2023	04:03	13	6	290	600	Pump 794 sks of Tail Cement @13 ppg
14	Drop Top Plug	10/13/2023	04:57	0	0	0	0	Drop plug, wash pumps and lines
15	Pump Displacement	10/13/2023	05:05	8.34	7.9	0	0	Send plug, start KCL displacement
16	Drop Rate	10/13/2023	05:24	4	4	145	1228	Drop rate, pressure before dropping rate was 1850
17	Land Plug	10/13/2023	05:28	4	4	161	2392	FCP was 1327
18	Check Floats	10/13/2023	05:31	0	0			Floats held (1.5 bbls back)
19	Rig Down Iron	10/13/2023	05:35					Rig everything down
20	Leave Location	10/13/2023	07:20					

Pump Diagrams



JobMaster Program Version 5.01C1
Job Number: 88682
Customer: Terra
Well Name: Leverich WMC 314-18-793



Job Start: Friday, October 13, 2023