



Terra Energy Partners, LLC

LONG STRING POST JOB REPORT

FEDERAL RWF 43-9 05-045-24397
S:9 T:6S R:94W Garfield CO

CallSheet #: 80376
Proposal #: 57816



LONG STRING Post Job Report

Attention: Dustin Childers | (936) 524-8828 | dchilders@terraep.com
Terra Energy Partners, LLC
4828 Loop Central Dr., Suite 900 | Houston, TX 77081

Dear 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,

Michael Harold

Field Engineer II | (970) 773-3636 | michael.harold@americacementing.com

Field Office 28730 US-6, Rifle, CO 81650
Phone: (970) 657-1157

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	1100	0
Open Hole	Outer	n/a	8.75	n/a	n/a	1100	9479	55
Casing	Inner	4.5	4	11.6	n/a	0	9479	0

Equipment / People

Unit Type	Unit	Power Unit	Employee #1	Employee #2
Field Storage Silo	FSS(CTS)-438			
Field Storage Silo	FSS(CTS)-470			
AS Cement Trailer	CTF-9309	TRC(TRB)-202		
AS Cement Trailer	CTF-048	TRC(TRB)-195		
AS Cement Trailer	CTF-9898	TRC(TRB)-090		
Cement Trailer	CTF-555	TRC(TRB)-194	Carrasco, Joel	
Cement Pump	CPF-053	TRH-855	Decker, Tonya	Brady, Shawn
Light Duty Vehicles	LDV-082		Kelsey, John	Martin, Chuck

Timing

Event	Date/Time
Call Out	3/1/2022 14:00
Depart Facility	3/1/2022 16:00
On Location	3/1/2022 17:00
Rig Up Iron	3/1/2022 18:15
Job Started	3/1/2022 20:00
Job Completed	3/1/2022 22:15
Rig Down Iron	3/1/2022 22:30
Depart Location	3/2/2022 01:15

General Job Information

Metrics	Value
Well Fluid Density	10.8 lb/gal
Well Fluid Type	WBM
Rig Circulation Vol	500 bbls
Rig Circulation Time	1 hours
Calculated Displacement	145.5 bbls
Actual Displacement	145.5 bbls
Total Spacer to Surface	0 bbls
Total CMT to Surface	0 bbls
Well Topped Out	n/a

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	10.8 lb/gal
Well Fluid Density Out of Well	10.9 lb/gal

Job Details (cont.)

Metrics	Value
BHCT	164 °F
BHST	234 °F

Water Analysis

Metrics	Value	Recommended
Water Source	Upright Rig Tank	
Temperature	55 °F	50-80 °F
pH Level	6	5.5-8.5
Chlorides	0 mg/L	0-3000 mg/L
Total Alkalinity	80	0-1000
Total Hardness	>450 mg/L	0-500 mg/L
Carbonates	0 mg/L	0-100 mg/L
Sulfates	<200 mg/L	0-1500 mg/L
Potassium	0 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
No			

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	3967
2	Mud Flush	Flush	8.45			40.86		20.00	4085
3	Water	Flush	8.34			42.00		10.00	4321
4	Primary Cement	Primary	14.20	1.72	8.08		1396.00	428.20	4439
5	Displacement	DisplacementFinal	8.34			42.00		145.50	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	Primary	Primary Cement	CLASS G	Cement	80.00	%
4	Primary	Primary Cement	FLY ASH (POZZOLAN)	Extender	20.00	%
4	Primary	Primary Cement	FL-66	FluidLoss	0.40	%BWOB
4	Primary	Primary Cement	FP-24	Defoamer	0.30	%BWOB
4	Primary	Primary Cement	GW-86	Viscosifier	0.10	%BWOB
4	Primary	Primary Cement	IntegraSeal POLI	LostCirculation	0.25	lb/sk
4	Primary	Primary Cement	R-3	Retarder	0.30	%BWOB
4	Primary	Primary Cement	S-8	StrengthRetrogression	27.00	%BWOB

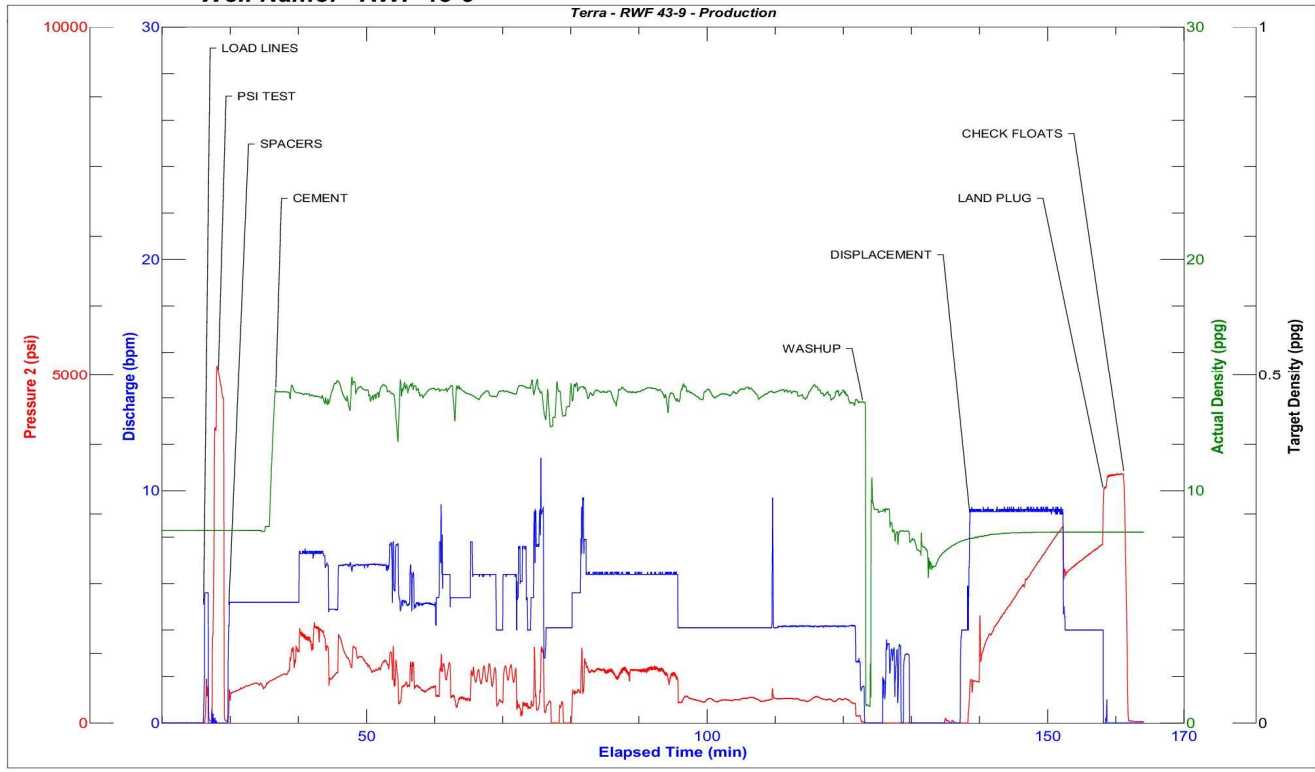
Job Logs

Line	Event	Date (MM/DD/YY)	Time (HH:MM)	Density (lb/gal)	Pump Rate (bpm)	Pump Volume (bbls)	Pipe Pressure (psi)	Comment
1	Callout	3/1/2022	14:00					Crew called to prepare for a production cement job. RTS is 17:00
2	Safety Meeting	3/1/2022	15:45					Journey management meeting
3	Depart yard	3/1/2022	16:00					Crew leaves Rifle, CO yard for location
4	Arrive on Location	3/1/2022	17:00					Arrive on location, verify all proper products, equipment and job procedure with customer, crew on standby while trucks move off location for us to spot up
5	Safety Meeting	3/1/2022	18:00					Rig up meeting
6	Spot Units	3/1/2022	18:10					Spot equipment for rig up
7	Rig up	3/1/2022	18:15					Rig up all equipment
8	Safety Meeting	3/1/2022	19:45					Pre job meeting
9	Load Lines	3/1/2022	20:00	8.34	5.6	3	760	Load lines for psi test
10	Pressure Test	3/1/2022	20:01	8.34	1	1	5200	Pressure test pump and lines
11	Fresh Spacer	3/1/2022	20:03	8.34	5.2	10	407	10 bbl fresh spacer
12	Mud Spacer	3/1/2022	20:04	8.5	5.2	20	573	20 bbl mud spacer
13	Fresh Spacer	3/1/2022	20:06	8.34	5.2	10	600	10 bbls fresh spacer
14	Cement	3/1/2022	20:07	14.2	7.4	10	1227	428 BBLS Primary CMT – 14.2 # 1.72 Y 8.1 MW 1396 sks 10 bbls away
15	Cement	3/1/2022	20:21	14.2	6.8	40	1071	50 bbls away
16	Cement	3/1/2022	20:27	14.2	6.8	50	848	100 bbls away
17	Cement	3/1/2022	20:35	14.2	5.5	50	390	150 bbls away
18	Cement	3/1/2022	20:45	14.2	6.4	50	790	200 bbls away
19	Cement	3/1/2022	20:55	14.2	5.6	50	470	250 bbls away
20	Cement	3/1/2022	21:00	14.2	6.4	50	696	300 bbls away
21	Cement	3/1/2022	21:12	14.2	4.1	50	350	350 bbls away
22	Cement	3/1/2022	21:21	14.2	4.1	50	344	400 bbls away
23	Cement	3/1/2022	21:37	14.2	4.1	28	300	428 bbls away shutdown to washup
24	check floats	3/1/2022	21:42					Washup and blow out lines to pit, drop plug
25	Displacement	3/1/2022	21:52	8.34	9.2	10	1350	Send plug and begin displacement, 10 bbls away
26	Displacement	3/1/2022	21:57	8.34	9.2	40	1631	50 bbls away
27	Displacement	3/1/2022	22:04	8.34	9.2	50	2560	100 bbls away
28	Displacement	3/1/2022	22:13	8.34	9.2	45.5	2550	145.5 bbls away land plug
29	Check Floats	3/1/2022	22:15					Check floats, floats held 2 bbls back
30	Safety Meeting	3/1/2022	22:20					Rig down meeting
31	Rig Down	3/1/2022	22:30					Rig down all equipment
32	Safety Meeting	3/2/2022	01:00					Journey management meeting
33	Depart Location	3/2/2022	01:15					Crew departs location

Pump Diagrams



JobMaster Program Version 5.01C1
Job Number: 80376
Customer: Terra
Well Name: RWF 43-9



BJ Services

Job Start: Tuesday, March 01, 2022