FIELD TICKET

Client **MERIT ENERGY COMPANY**

Well Ellsaesser 2

Job Description Squeeze-Hole - Existing Well

Print Date May 16, 2018 Field Ticket # FT-06812-D2D8Z50202-09304

Credit Approval #

Field Ticket # FT-06812-D2D8Z50202-09304

Client **Purchase Approval # MERIT ENERGY COMPANY**

> PO BOX 1293, LIBERAL, 67905-Invoice #

1293

Rep

Ellsaesser 2 **Field Rep Erik Chavez** Well

Field Client Well API# 15-081-20310 **Martin Aregon**

USA District Liberal, KS County

Job Type KS Squeeze-Hole - Existing Well State/Province

Job Depth (ft) 0.00 Field **LEMON NORTHEAST**

Ellsaesser Lease **Gas Used On** No

Job

FIELD TICKET

Client MERIT ENERGY COMPANY

Well Ellsaesser 2

Job Description Squeeze-Hole - Existing

Print Date Well May 16, 2018 Field Ticket # FT-06812-D2D8Z50202-09304

BJ

MATERIALS

Product Code	Description	UON	Quantity	List Price	Gross Amount	Disc (%)	Net Amount
L100112	ACCELERATOR, SALT, CHLORIDE, CALCIUM, A-7P, PELLETS	LB	235.0000	\$2.40	\$564.00	45.00	\$310.20
L100318	CEMENT EXTENDER, GYPSUM, A-10	LB	564.0000	\$0.72	\$406.08	45.00	\$223.34
L100022	CEMENT, CLASS H, HSR	SK	300.0000	\$50.27	\$15,081.00	45.00	\$8,294.55
L100120	EXTENDER, BENTONITE	LB	188.0000	\$2.08	\$391.04	45.00	\$215.07
L100404	SALT,SODIUM CHLORIDE, A-5	LB	485.0000	\$1.04	\$504.40	45.00	\$277.42
			Product Materia	l Subtotal:	\$16,946.52		\$9,320.58

SERVICES

Contractor of the latest							
Product Code	Description	иом	Quantity	List Price	Gross Amount	Disc (%)	Net Amount
S-100004	Cement Crew Mobilization- Demobilizaton Fee	EA	1.00	\$10,880.00	\$10,880.000	90.00	\$1,088.000
S-100051	Cement pump charge, 3,001-4,000 feet/901-1,200 m	6/HR	1.00	\$5,472.00	\$5,472.000	90.00	\$547.200
S-100001	Mileage - vehicle heavy weight	MI	50.00	\$18.96	\$948.000	90.00	\$94.800
S-100002	Mileage - vehicle light weight	MI	50.00	\$10.72	\$536.000	90.00	\$53.600
			Serv	ice Subtotal:	\$17,836.00		\$1,783.60

FIELD TICKET

Client

MERIT ENERGY COMPANY

Well

Ellsaesser 2

Job Description

Squeeze-Hole - Existing Well

Print Date

May 16, 2018

BI

Field Ticket # FT-06812-D2D8Z50202-09304

FIELD ESTIMATES

TOTAL GROSS AMOUNT

\$34,782.520

TOTAL % DISC

68.075%

TOTAL NET AMOUNT

\$11,104.180

Arrive Location

Client Rep.

Service Order

I authorize work to begin per service instructions in accordance with the terms and conditions printed on the following pages of this form and represent that I have authority to accept and sign this order.

Service receipt

I certify that the materials and services listed were received and all services performed in a workmanlike manner.

BJ REPRESENTATIVE

Erik Chavez

CLIENT AUTHORIZED AGENT

Martin Aregon



Start Date

5/16/2018

Field Ticket#

End Date

5/16/2018

Well

Ellsaesser 2

KS

Client

MERIT ENERGY COMPANY

API#

15-081-20310

Client Field Rep.

Martin Aregon

Well Classification

Service Sup.

Erik Chavez

County

District

Liberal, K\$

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Type of Job

Squeeze-Hole - Existing Well

State/Province

Formation

Execution ID

EXC-06812-D2D8Z502

Rig

Project ID

PRJ1006846

WELL GEOMETRY

Туре	ID (in)	OD (in)	Wt. (lb/ft)	MD (ft)	TVD (ft)	Excess(%)	Grade	Thread
Casing	4.95	5.50	15.50	4228.00	4228.00			
Tubing	2.44	2.88	6.50	4147.00	4147.00			

Shoe Length (ft):

HARDWARE

Bottom Plug Used?	No	Tool Type	Cement Retainer
Bottom Plug Provided By		Tool Depth (ft)	4,147.00
Bottom Plug Size		Max Tubing Pressure - Rated (psi)	
Top Plug Used?	No	Max Tubing Pressure - Operated (psi)	
Top Plug Provided By		Max Casing Pressure - Rated (psi)	
Top Plug Size		Max Casing Pressure - Operated (psi)	
Centralizers Used	No	Pipe Movement	None
Centralizers Quantity		Job Pumped Through	Squeeze Manifold
Centralizers Type		Top Connection Thread	8rd
Landing Collar Depth (ft)	4,147	Top Connection Size	2.875

CIRCULATION PRIOR TO JOB

Well Circulated By

Solids Present at End of Circulation

No



Circulation Prior to Job

No

10 sec SGS

Circulation Time (min)

10 min SGS

Circulation Rate (bpm)

30 min SGS

Circulation Volume (bbis)

Flare Prior to/during the Cement No

Job

Lost Circulation Prior to Cement No

dol

Gas Present

No

Mud Density In (ppg)

Gas Units

Mud Density Out (ppg)

PV Mud In

PV Mud Out

YP Mud In

YP Mud Out

TEMPERATURE

Ambient Temperature (°F)

78.00

Slurry Cement Temperature (°F)

Mix Water Temperature (°F)

64.00

Flow Line Temperature (°F)

BJ FLUID DETAILS

Fluid Type	Fluid Name	Density (ppg)	l	H2O Req. (gals/sk)	Planned Top of Fluid (Ft)	Length (Ft)	Vol (sk)	Vol (Cu Ft)	Vol (bbls)
Lead Slurry	Thixo Lead	15.6000	1.3270	5.81		0.00	100	133.0000	23.7000
Tail Slurry	Tail Cement	15.6000	1.1881	5.24		0.00	250	298.0000	53.1000

Fluid Type	Fluid Name	Component	Concentration	иом
Lead Slurry	Thixo Lead	EXTENDER, BENTONITE	2.0000	BWOB
Lead Slurry	Thixo Lead	CEMENT, CLASS H, HSR	100.0000	PCT
Lead Slurry	Thixo Lead	SALT, SODIUM CHLORIDE, A-5	10.0000	BWOW
Lead Slurry	Thixo Lead	CEMENT EXTENDER, GYPSUM, A-10	6.0000	BWOB
Tail Slurry	Tail Cement	ACCELERATOR, SALT, CHLORIDE, CALCIUM, A-7P, PELLETS	1.0000	BWOB
Tail Slurry	Tail Cement	CEMENT, CLASS H, HSR	100.0000	PCT

TREATMENT SUMMARY



Time	Fluid	Rate (bpm)	Fluid Vol. (bbls)	Pipe Pressure (psi)	Annulus Comm Pressure (psi)	ents
5/16/2018 1:26 PM	Thixo Lead	2.20	23.70	0.00		
5/16/2018 1:59 PM	Tail Cement	1.20	33.00	1,038.00		

	Min	Max	Avg
Pressure (psi)	0.00	1,038.00	0.00
Rate (bpm)	1.20	2.20	1.70

DISPLACEMENT AND END OF JOB SUMMARY

Displaced By		Amount of Cement Returned/Reversed	
Calculated Displacement Volume (bbls)		Method Used to Verify Returns	
Actual Displacement Volume (bbls)		Amount of Spacer to Surface	
Did Float Hold?	No	Pressure Left on Casing (psi)	0.00
Bump Plug	No	Amount Bled Back After Job	
Bump Plug Pressure (psi)		Total Volume Pumped (bbls)	111.00
Were Returns Planned at Surface	No	Top Out Cement Spotted	No
Cement returns During Job		Lost Circulation During Cement Job	No

CEMENT PLUG

Bottom of Cement Plug?	No	Wiper Balls Used?	No
Wiper Ball Quantity		Plug Catcher	No
Number of Plugs			
SQUEEZE			

SQUEEZE

Injection Rate (bpm)	2.200	Fluid Density (ppg)	8.40
Injection Pressure (psi)	0.000	ISIP (psi)	0.00
Type of Squeeze	Block	FSIP (psi)	850.00
Operators Max SQ Pressure (psi)	1,500.00		

COMMENTS

Treatment Report



Job Summary

Prime Lines 2 bbls
Pressure Test 1500 psi
Pressure Backside 500 psi
Injection Test 10 bbls
LCmt 100 sks @ 15.6 ppg / 23.633 bbls
TCmt 250 sks / 1% CC @ 15.6 ppg / 52.90 bbls
Shutdown/WashEquipment
Displacement / Hestitation per customer
Retainer=24.011 bbls
Top= 2.868 / 26.879 bbls
Btm= 3.2724 / 27.283 bbls
Sting out 8ft
Reverse out 50 bbls Fresh H20

- 1. Prime Lines 2 bbls
- 2. Pressure Test 1500 psi
- 3. Pressure up back side 500 psi
- 4. Injection test 10 bbls
- 5. LCmt 100 sks @ 15.6 ppg / 23.633 bbls
- 6. TCmt 250 sks / CC @ 15.6 / 52.90 bbls
- 7. Shutdown wash equipment
- 8. Displacement / Hestitation per customer

Retainer = 24.011

Top = 2.868 / 26.879

Btm = 3.2724 / 27.283

- 9. Sting out 8ft
- 10. Reverse out 50 bbls