



RAILROAD COMMISSION OF TEXAS

Form W-2

1701 N. Congress  
P.O. Box 12967  
Austin, Texas 78701-2967

Status: Approved  
Date: 03/12/2018  
Tracking No.: 183463

OIL WELL POTENTIAL TEST, COMPLETION OR RECOMPLETION REPORT, AND LOG

OPERATOR INFORMATION

Operator Name: QEP ENERGY COMPANY Operator No.: 684474  
Operator Address: ATTN SOUTHERN DIV REGULATORY 1050 17TH ST SUITE 800 DENVER, CO 80265-0000

WELL INFORMATION

API No.: 42-317-40597 County: MARTIN  
Well No.: S 08SC RRC District No.: 08  
Lease Name: UNIVERSITY 7-2730 Field Name: SPRABERRY (TREND AREA)  
RRC Lease No.: 48980 Field No.: 85280300  
Location: Section: 27, Block: 7, Survey: UL, Abstract: U27  
  
Latitude: Longitude:  
This well is located 22 miles in a NE direction from ANDREWS, which is the nearest town in the county.

FILING INFORMATION

Purpose of filing: Initial Potential  
Type of completion: New Well  
Well Type: Producing Completion or Recompletion Date: 06/19/2017  

Type of Permit	Date	Permit No.
Permit to Drill, Plug Back, or Deepen	11/30/2016	820023
Rule 37 Exception		
Fluid Injection Permit		
O&G Waste Disposal Permit		
Other:		

COMPLETION INFORMATION

Spud date: 02/04/2017	Date of first production after rig released: 06/19/2017
Date plug back, deepening, recompletion, or drilling operation commenced: 02/04/2017	Date plug back, deepening, recompletion, or drilling operation ended: 04/03/2017
Number of producing wells on this lease in this field (reservoir) including this well: 24	Distance to nearest well in lease & reservoir (ft.): 111.0
Total number of acres in lease: 963.00	Elevation (ft.): 2916 GR
Total depth TVD (ft.): 9542	Total depth MD (ft.): 17196
Plug back depth TVD (ft.): 7923	Plug back depth MD (ft.): 17075
Was directional survey made other than inclination (Form W-12)? Yes	Rotation time within surface casing (hours): 77.5
Recompletion or reclass? No	Is Cementing Affidavit (Form W-15) attached? Yes
Type(s) of electric or other log(s) run: Gamma Ray (MWD)	Multiple completion? No
Electric Log Other Description:	
Location of well, relative to nearest lease boundaries	Off Lease : Yes
of lease on which this well is located: 2582.0 Feet from the North Line and 1604.0 Feet from the East Line of the UNIVERSITY 7-2730 Lease.	

FORMER FIELD (WITH RESERVOIR) & GAS ID OR OIL LEASE NO.

Field & Reservoir	Gas ID or Oil Lease No.	Well No.	Prior Service Type
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PACKET: N/A

W2:	N/A		
FOR NEW DRILL OR RE-ENTRY, SURFACE CASING DEPTH DETERMINED BY:			
GAU Groundwater Protection Determination		Depth (ft.): 350.0	Date: 08/29/2016
SWR 13 Exception		Depth (ft.):	

INITIAL POTENTIAL TEST DATA FOR NEW COMPLETION OR RECOMPLETION		
Date of test: 06/28/2017		Production method: Pumping
Number of hours tested: 24		Choke size:
Was swab used during this test?	No	Oil produced prior to test: 8028.58
PRODUCTION DURING TEST PERIOD:		
Oil (BBLs): 1199.82		Gas (MCF): 809
Gas - Oil Ratio: 674		Flowing Tubing Pressure: 220.00
Water (BBLs): 2854		
CALCULATED 24-HOUR RATE		
Oil (BBLs): 1199.8		Gas (MCF): 809
Oil Gravity - API - 60.:	40.0	Casing Pressure: 180.00
Water (BBLs): 2854		

CASING RECORD											
Row	Type of Casing	Casing Size (in.)	Hole Size (in.)	Setting Depth (ft.)	Multi - Stage Depth (ft.)	Multi - Stage Shoe Depth (ft.)	Cement Class	Cement Amount (sacks)	Slurry Volume (cu. ft.)	Top of Cement (ft.)	TOC Determined By
1	Surface	13 3/8	17 1/2	501			C	580	488.0	SURF ACE	Circulated to Surface
2	Intermediate	9 5/8	12 1/4	8240	5552		C	2405	5208.0	200	Calculation
3	Intermediate	9 5/8	12 1/4	8240			C	690	1580.0	5552	Circulated to Surface
4	Conventional Production	5 1/2	8 1/2	17191			VERSACE M/SOLUC	1970	3001.4	4765	Calculation

LINER RECORD									
Row	Liner Size (in.)	Hole Size (in.)	Liner Top (ft.)	Liner Bottom (ft.)	Cement Class	Cement Amount (sacks)	Slurry Volume (cu. ft.)	Top of Cement (ft.)	TOC Determined By
N/A									

TUBING RECORD			
Row	Size (in.)	Depth	Size (ft.)
1	2 7/8	8974	
Packer Depth (ft.)/Type /			

PRODUCING/INJECTION/DISPOSAL INTERVAL			
Row	Open hole?	From (ft.)	To (ft.)
1	No	L1 9802	17075.0

ACID, FRACTURE, CEMENT SQUEEZE, CAST IRON BRIDGE PLUG, RETAINER, ETC.				
Was hydraulic fracturing treatment performed?		Yes		
Is well equipped with a downhole actuation sleeve?		Yes		
If yes, actuation pressure (PSIG):		5621.0		
Production casing test pressure (PSIG) prior to hydraulic fracturing treatment:		10000		
Actual maximum pressure (PSIG) during hydraulic fracturing:		9062		
Has the hydraulic fracturing fluid disclosure been reported to FracFocus disclosure registry (SWR29)?		Yes		
Row	Type of Operation	Amount and Kind of Material Used		Depth Interval (ft.)
1	Acid	100,000 GAL 15% HCL ACID		9802 17075
2	Fracture	1,133,537 LBS 100 MESH, 8,357,471 LBS PREM WHITE, 722,073 LBS CRC		9802 17075

FORMATION RECORD					
Formations	Encountered	Depth TVD (ft.)	Depth MD (ft.)	Is formation isolated?	Remarks
SANTA ROSA	Yes	1505.0	1505.0	Yes	NOT LOGGED, ESTIMATED, CEMENTED CASING
YATES	Yes	3070.0	3070.0	Yes	NOT LOGGED, ESTIMATED, CEMENTED CASING
QUEEN	Yes	4050.0	4050.0	Yes	NOT LOGGED, ESTIMATED, CEMENTED CASING
GRAYBURG	Yes	4600.0	4600.0	Yes	NOT LOGGED, ESTIMATED, CEMENTED CASING
SAN ANDRES - ACTIVE CO2 FLOOD; HIGH FLOWS; H2S; CO	Yes	4845.0	4845.0	Yes	NOT LOGGED, ESTIMATED, CEMENTED CASING
CLEARFORK	Yes	6584.0	6623.0	Yes	
LEONARD	Yes	8167.0	8208.0	Yes	
CISCO	No			No	NOT ENCOUNTERED
SPRABERRY	Yes	8326.0	8368.0	Yes	
JO MILL	Yes	9179.0	9227.0	Yes	
DEAN	No			No	NOT ENCOUNTERED
WOLFCAMP	No			No	NOT ENCOUNTERED
PENNSYLVANIAN	No			No	NOT ENCOUNTERED
STRAWN	No			No	NOT ENCOUNTERED
MISSISSIPPIAN	No			No	NOT ENCOUNTERED
FUSSELMAN	No			No	NOT ENCOUNTERED
SILURIAN	No			No	NOT ENCOUNTERED
DEVONIAN	No			No	NOT ENCOUNTERED
ELLENBURGER	No			No	NOT ENCOUNTERED
Do the producing interval of this well produce H2S with a concentration in excess of 100 ppm (SWR 36)?					No
Is the completion being downhole commingled (SWR 10)?					No

REMARKS
KOP @ 9,043' DIRECTIONAL SURVEY ATTACHED LOG SUBMITTED VIA RRC ONLINE PORTAL 2/5/18

RRC REMARKS	
<b>PUBLIC COMMENTS:</b> [RRC Staff 2018-01-25 14:17:10.865] EDL=7273 feet, max acres=520, SPRABERRY (TREND AREA) oil well	
<b>CASING RECORD :</b>	
<b>TUBING RECORD:</b>	
<b>PRODUCING/INJECTION/DISPOSAL INTERVAL :</b>	
<b>ACID, FRACTURE, CEMENT SQUEEZE, CAST IRON BRIDGE PLUG, RETAINER, ETC. :</b>	
<b>POTENTIAL TEST DATA:</b>	

OPERATOR'S CERTIFICATION	
<b>Printed Name:</b> Katie Biersmith	<b>Title:</b> Regulatory Analyst
<b>Telephone No.:</b> (303) 672-6907	<b>Date Certified:</b> 03/07/2018





# RAILROAD COMMISSION OF TEXAS

1701 N. Congress  
P.O. Box 12967  
Austin, Texas 78701-2967

Form W-15

Rev. 08/2014

## CEMENTING REPORT

Cementer: Fill in shaded areas.  
Operator: Fill in other items.

OPERATOR INFORMATION	
Operator Name: QEP ENERGY COMPANY-EBIZ	Operator P-5 No.: 684474
Cementer Name: HALLIBURTON ENERGY SERVICES	Cementer P-5 No.: 347151

WELL INFORMATION		
District No.: 08	County: MARTIN	
Well No.: 5085C	API No.: 42-317-40597	Drilling Permit No.: 820023
Lease Name: UNIVERSITY 7-2730	Lease No.: 48980	
Field Name: Spraberry (Trend Area)	Field No.: 85280300	

I. CASING CEMENTING DATA		
Type of casing: <input type="checkbox"/> Conductor <input checked="" type="checkbox"/> Surface <input type="checkbox"/> Intermediate <input type="checkbox"/> Liner <input type="checkbox"/> Production		
Drilled hole size (in.): 17 1/2	Depth of drilled hole (ft.): 501	Est. % wash-out or hole enlargement:
Size of casing in O.D. (in.): 13 3/8	Casing weight (lbs/ft) and grade: J-55, 68#	No. of centralizers used: 4
Was cement circulated to ground surface (or bottom of cellar) outside casing? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO If no for surface casing, explain in Remarks.	Setting depth shoe (ft.): 501	Top of liner (ft.):
		Setting depth liner (ft.):
Hrs. waiting on cement before drill-out: 14.5	Calculated top of cement (ft.): Surface	Cementing date: 2/5/2017

SLURRY					
Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1	580	C	1% CaCl2 / 0.25 LBM POLY-E-FLAKE	488	662
2					
3					
Total	580			488	662

II. CASING CEMENTING DATA		
Type of casing: <input type="checkbox"/> Surface <input type="checkbox"/> Intermediate <input type="checkbox"/> Production <input type="checkbox"/> Tapered production <input type="checkbox"/> Multi-stage cement shoe <input type="checkbox"/> Multiple parallel strings		
Drilled hole size (in.):	Depth of drilled hole (ft.):	Est. % wash-out or hole enlargement:
Size of casing in O.D. (in.):	Casing weight (lbs/ft) and grade:	No. of centralizers used:
Tapered string drilled hole size (in.) Upper: Lower:	Tapered string depth of drilled hole (ft.) Upper: Lower:	
Tapered string size of casing in O.D. (in.) Upper: Lower:	Tapered string casing weight (lbs/ft) and grade Upper: Lower:	Tapered string no. of centralizers used Upper: Lower:
Was cement circulated to ground surface (or bottom of cellar) outside casing? <input type="checkbox"/> YES <input type="checkbox"/> NO	Setting depth shoe (ft.):	
Hrs. waiting on cement before drill-out:	Calculated top of cement (ft.):	Cementing date:

SLURRY					
Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1					
2					
3					
Total	0			0	0

III. CASING CEMENTING DATA		
Type of casing: <input type="checkbox"/> Surface <input type="checkbox"/> Intermediate <input type="checkbox"/> Production <input type="checkbox"/> Tapered production <input type="checkbox"/> Multi-stage cement/DV tool <input type="checkbox"/> Multiple parallel strings		
Drilled hole size (in.):	Depth of drilled hole (ft.):	Est. % wash-out or hole enlargement:
Size of casing in O.D. (in.):	Casing weight (lbs/ft) and grade:	No. of centralizers used:
Tapered string drilled hole size (in.) Upper: Lower:	Tapered string depth of drilled hole (ft.) Upper: Lower:	
Tapered string size of casing in O.D. (in.) Upper: Lower:	Tapered string casing weight (lbs/ft) and grade Upper: Lower:	Tapered string no. of centralizers used Upper: Lower:
Was cement circulated to ground surface (or bottom of cellar) outside casing? <input type="checkbox"/> YES <input type="checkbox"/> NO	Setting depth tool (ft.):	
Hrs. waiting on cement before drill-out:	Calculated top of cement (ft.):	Cementing date:

SLURRY					
Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1					
2					
3					
Total	0			0	0



## CEMENTING TO SQUEEZE, PLUG BACK OR PLUG AND ABANDON

	PLUG #1	PLUG #2	PLUG #3	PLUG #4	PLUG #5	PLUG #6	PLUG #7
Cementing Date							
Size of hole or pipe (in.)							
Depth to bottom of tubing or drill pipe (ft.)							
Cement retainer setting depth (ft.)							
CIBP setting depth (ft.)							
Amount of cement on top of CIBP (ft.)							
Sacks of cement used							
Slurry volume pumped (cu. ft.)							
Calculated top of plug (ft.)							
Measured top of plug, if tagged (ft.)							
Slurry weight (lbs/gal)							
Class/type of cement							
Perforate and squeeze (YES/NO)							

## REMARKS

S.O.#0903827869 CEMENT TO SURFACE 55 BBLS 230 SKS

CEMENTER'S CERTIFICATE: I declare under penalties prescribed in Sec. 91.143, Texas Natural Resources Code, that I am authorized to make this certification, that the cementing of casing and/or the placing of cement plugs in this well as shown in the report was performed by me or under my supervision, and that the cementing data and facts presented on both sides of this form are true, correct, and complete, to the best of my knowledge. This certification covers cementing data only.

GUSTAVO GARZA SERVICE SUPERVISOR

Halliburton

Name and title of cementer's representative

Cementing Company

Signature

6155 W. Murphy St.

Odessa, TX, 79763

432-571-8600

2/4/2017

Address

City,

State, Zip Code

Tel: Area Code

Number

Date: mo. day yr.

OPERATOR'S CERTIFICATE: I declare under penalties prescribed in Sec. 91.143, Texas Natural Resources Code, that I am authorized to make this certification, that I have knowledge of the well data and information presented in this report, and that data and facts presented on both sides of this form are true, correct, and complete, to the best of my knowledge. This certification covers all well data.

Katie Biersmith

Regulatory Analyst

Katie Biersmith

Typed or printed name of operator's representative

Title

Signature

1050 17<sup>th</sup> Street Suite 800

Denver CO 80265 (303) 672-6907

11/30/17

Address

City,

State, Zip Code

Tel: Area Code

Number

Date: mo. day yr.

## Instructions for Form W-15, Cementing Report

NOTICE: The Form W-15 must be submitted as an attachment to a Form G-1 (Gas Well Back Pressure Test, Completion or Recompletion Report, and Log), Form W-2 (Oil Well Potential Test, Completion or Recompletion Report, and Log), Form W-3 (Plugging Record), or Form W-4 (Application for Multiple Completion), any time cement is pumped in a wellbore.

- A. **What to file:** An operator should file an original and one copy of the completed Form W-15 for each cementing company used on a well. The cementing of different casing strings on a well by one cementing company may be reported on one form.  
The Form W-15 should be filed with the Form W-3, Plugging Record, unless the Form W-3 is signed by the cementing company representative. When reporting dry holes, operators must complete Form W-15, in addition to Form W-3, to show any casing cemented in the hole.
- B. **How to file:** An oil and gas completion report and Form W-15 may be filed online using the Commission's Online System (<https://webapps.rrc.state.tx.us/security/login.do>) or a paper copy of the form may be mailed to the Commission in Austin (P.O. Box 12967, Austin, Texas 78711-2967).
- C. **Surface casing:** An operator must set and cement sufficient surface casing to protect all usable-quality water strata, as defined by the Groundwater Advisory Unit in Austin. Sufficient cement shall be used to fill the annular space outside the casing from the shoe to the ground surface or to the bottom of the cellar. Before drilling a well, an operator must obtain a letter from the Groundwater Advisory Unit stating the protection depth. Surface casing should not be set deeper than 200 feet below the specified depth without prior approval from the Commission.  
To plug and abandon a well, operators must use only cementers approved by the Commission's Director of Field Operations in accordance with SWR 14 ([http://info.sos.state.tx.us/pls/pub/readtac\\$ext.TacPage?sl=R&app=9&p\\_dir=&p\\_rloc=&p\\_tloc=&p\\_ploc=&pg=1&p\\_tac=&ti=16&pt=1&ch=3&rl=14](http://info.sos.state.tx.us/pls/pub/readtac$ext.TacPage?sl=R&app=9&p_dir=&p_rloc=&p_tloc=&p_ploc=&pg=1&p_tac=&ti=16&pt=1&ch=3&rl=14)). Cementing companies, service companies, or operators can qualify as approved cementers by demonstrating that they are able to mix and pump cement in compliance with Commission rules and regulations.
- D. **Estimated % wash-out:** If the estimated % wash-out is less than 20% (or 30% along the Gulf Coast), provide supporting documentation such as a caliper log to show how the estimated % wash-out was obtained.
- E. **Multi-stage cement:** An operator must report the multi-stage cement shoe in II. Casing Cementing Data section by selecting the type of casing and Multi-stage cement shoe. The operator must report the multi-stage cement tool in III. Casing Cementing Data section by selecting the type of casing and Multi-stage cement/DV tool.
- F. **Multiple parallel strings:** An operator should file the Form W-15 as an attachment to the Form W-4, Application for Multiple Completion. An operator may be required to submit multiple Form W-15s to show all data for multiple parallel strings.
- G. **Slurry data:** If cement job exceeds three slurries, continue the list of slurries in the Slurry table in the subsequent Casing Cementing Data box.





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Form W-15

Rev. 08/2014

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Operator: Fill in other items.

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Cementer Name: HALLIBURTON ENERGY SERVICES			Cementer P-5 No.: 347151		
WELL INFORMATION					
District No.: 08		County: MARTIN			
Well No.: S 08SC		API No.: 42-317-40597		Drilling Permit No.: 820023	
Lease Name: UNIVERSITY 7-2730		Lease No.: 48980			
Field Name: Spraberry (Trend Area)		Field No.: 85280300			
I. CASING CEMENTING DATA					
Type of casing: <input type="checkbox"/> Conductor <input type="checkbox"/> Surface <input type="checkbox"/> Intermediate <input type="checkbox"/> Liner <input type="checkbox"/> Production					
Drilled hole size (in.):		Depth of drilled hole (ft.):		Est. % wash-out or hole enlargement:	
Size of casing in O.D. (in.):		Casing weight (lbs/ft) and grade:		No. of centralizers used:	
Was cement circulated to ground surface (or bottom of cellar) outside casing? <input type="checkbox"/> YES <input type="checkbox"/> NO If no for surface casing, explain in Remarks.			Setting depth shoe (ft.):		Top of liner (ft.):
					Setting depth liner (ft.):
Hrs. waiting on cement before drill-out:		Calculated top of cement (ft.):		Cementing date:	
SLURRY					
Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1					
2					
3					
Total	0			0	0
II. CASING CEMENTING DATA					
Type of casing: <input type="checkbox"/> Surface <input type="checkbox"/> Intermediate <input type="checkbox"/> Production <input type="checkbox"/> Tapered production <input checked="" type="checkbox"/> Multi-stage cement shoe <input type="checkbox"/> Multiple parallel strings					
Drilled hole size (in.): 12 1/4		Depth of drilled hole (ft.): 8260		Est. % wash-out or hole enlargement: 20%	
Size of casing in O.D. (in.): 9 5/8		Casing weight (lbs/ft) and grade: 40# L-80		No. of centralizers used: 8	
Tapered string drilled hole size (in.)		Tapered string depth of drilled hole (ft.)			
Upper:	Lower:	Upper:	Lower:		
Tapered string size of casing in O.D. (in.)		Tapered string casing weight (lbs/ft) and grade		Tapered string no. of centralizers used	
Upper:	Lower:	Upper:	Lower:		
Was cement circulated to ground surface (or bottom of cellar) outside casing? <input type="checkbox"/> YES <input checked="" type="checkbox"/> NO			Setting depth shoe (ft.): 8240		
Hrs. waiting on cement before drill-out: 24+		Calculated top of cement (ft.): 5552		Cementing date: 02/12/2017	
SLURRY					
Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1	445	C	SEE REMARKS	1252	3996
2	245	C	SEE REMARKS	328	930
3					
Total	690			1580	4926
III. CASING CEMENTING DATA					
Type of casing: <input type="checkbox"/> Surface <input type="checkbox"/> Intermediate <input type="checkbox"/> Production <input type="checkbox"/> Tapered production <input checked="" type="checkbox"/> Multi-stage cement/DV tool <input type="checkbox"/> Multiple parallel strings					
Drilled hole size (in.): 12 1/4		Depth of drilled hole (ft.): 8260		Est. % wash-out or hole enlargement: 20%	
Size of casing in O.D. (in.): 9 5/8		Casing weight (lbs/ft) and grade: 40# L-80		No. of centralizers used: 7	
Tapered string drilled hole size (in.)		Tapered string depth of drilled hole (ft.)			
Upper:	Lower:	Upper:	Lower:		
Tapered string size of casing in O.D. (in.)		Tapered string casing weight (lbs/ft) and grade		Tapered string no. of centralizers used	
Upper:	Lower:	Upper:	Lower:		
Was cement circulated to ground surface (or bottom of cellar) outside casing? <input type="checkbox"/> YES <input checked="" type="checkbox"/> NO			Setting depth tool (ft.): 5552		
Hrs. waiting on cement before drill-out: 24+		Calculated top of cement (ft.): 200		Cementing date: 02/12/2017	
SLURRY					
Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1	1930	C	SEE REMARKS	4572	14587
2	475	C	SEE REMARKS	636	2025
3					
Total	2405			5208	16612



## CEMENTING TO SQUEEZE, PLUG BACK OR PLUG AND ABANDON

	PLUG #1	PLUG #2	PLUG #3	PLUG #4	PLUG #5	PLUG #6	PLUG #7
Cementing Date							
Size of hole or pipe (in.)							
Depth to bottom of tubing or drill pipe (ft.)							
Cement retainer setting depth (ft.)							
CIBP setting depth (ft.)							
Amount of cement on top of CIBP (ft.)							
Sacks of cement used							
Slurry volume pumped (cu. ft.)							
Calculated top of plug (ft.)							
Measured top of plug, if tagged (ft.)							
Slurry weight (lbs/gal)							
Class/type of cement							
Perforate and squeeze (YES/NO)							

## REMARKS

1ST LEAD ADDS.- NEOCEM TM      1ST TAIL ADDS.- .40% HALAD-344, .70% HR-800  
 2ND LEAD ADDS.- NEOCEM TM      2ND TAIL ADDS.- .40% HALAD-344, .65% HR-800

CEMENTER'S CERTIFICATE: I declare under penalties prescribed in Sec. 91.143, Texas Natural Resources Code, that I am authorized to make this certification, that the cementing of casing and/or the placing of cement plugs in this well as shown in the report was performed by me or under my supervision, and that the cementing data and facts presented on both sides of this form are true, correct, and complete, to the best of my knowledge. This certification covers cementing data only.

Richard Jones - Service Supervisor

Halliburton

Name and title of cementer's representative

Cementing Company

6155 W. Murphy St.

Odessa, TX, 79763

Signature

432-571-8600

02/12/2017

Address

City, State, Zip Code

Tel: Area Code

Number

Date: mo. day yr.

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Katie Biersmith

Regulatory Analyst

Katie Biersmith

Typed or printed name of operator's representative

Title

Signature

1050 17th Street Suite 800

Denver, CO 80265

(303) 672-6907

11/30/17

Address

City, State, Zip Code

Tel: Area Code

Number

Date: mo. day yr.

## Instructions for Form W-15, Cementing Report

NOTICE: The Form W-15 must be submitted as an attachment to a Form G-1 (Gas Well Back Pressure Test, Completion or Recompletion Report, and Log), Form W-2 (Oil Well Potential Test, Completion or Recompletion Report, and Log), Form W-3 (Plugging Record), or Form W-4 (Application for Multiple Completion), any time cement is pumped in a wellbore.

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- C. **Surface casing:** An operator must set and cement sufficient surface casing to protect all usable-quality water strata, as defined by the Groundwater Advisory Unit in Austin. Sufficient cement shall be used to fill the annular space outside the casing from the shoe to the ground surface or to the bottom of the cellar. Before drilling a well, an operator must obtain a letter from the Groundwater Advisory Unit stating the protection depth. Surface casing should not be set deeper than 200 feet below the specified depth without prior approval from the Commission.  
 To plug and abandon a well, operators must use only cementers approved by the Commission's Director of Field Operations in accordance with SWR 14 ([http://info.sos.state.tx.us/pls/pub/readtac\\$ext.TacPage?sl=R&app=9&p\\_dir=&p\\_rloc=&p\\_tloc=&p\\_ploc=&pg=1&p\\_tac=&ti=16&pt=1&ch=3&rl=14](http://info.sos.state.tx.us/pls/pub/readtac$ext.TacPage?sl=R&app=9&p_dir=&p_rloc=&p_tloc=&p_ploc=&pg=1&p_tac=&ti=16&pt=1&ch=3&rl=14)). Cementing companies, service companies, or operators can qualify as approved cementers by demonstrating that they are able to mix and pump cement in compliance with Commission rules and regulations.
- D. **Estimated % wash-out:** If the estimated % wash-out is less than 20% (or 30% along the Gulf Coast), provide supporting documentation such as a caliper log to show how the estimated % wash-out was obtained.
- E. **Multi-stage cement:** An operator must report the multi-stage cement shoe in II. Casing Cementing Data section by selecting the type of casing and Multi-stage cement shoe. The operator must report the multi-stage cement tool in III. Casing Cementing Data section by selecting the type of casing and Multi-stage cement/DV tool.
- F. **Multiple parallel strings:** An operator should file the Form W-15 as an attachment to the Form W-4, Application for Multiple Completion. An operator may be required to submit multiple Form W-15s to show all data for multiple parallel strings.
- G. **Slurry data:** If cement job exceeds three slurries, continue the list of slurries in the Slurry table in the subsequent Casing Cementing Data box.





## RAILROAD COMMISSION OF TEXAS

1701 N. Congress  
P.O. Box 12967  
Austin, Texas 78701-2967

Form W-15

Rev. 08/2014

Cementer: Fill in shaded areas.

Operator: Fill in other items.

## CEMENTING REPORT

## OPERATOR INFORMATION

Operator Name: GEP ENERGY COMPANY EBIT

Operator P-5 No.: 684474

Cementer Name: HALLIBURTON ENERGY SERVICES

Cementer P-5 No.: 347151

## WELL INFORMATION

District No.: 08

County: MARTIN

Well No.: 5085C

API No.: 42-317-40597 Drilling Permit No.: 820023

Lease Name: UNIVERSITY 7-2730

Lease No.:

Field Name: Spraberry (Trend Area)

Field No.: 85280300

## I. CASING CEMENTING DATA

Type of casing: ☐ Conductor ☐ Surface ☐ Intermediate ☐ Liner ☒ Production

Drilled hole size (in.): 8 1/2

Depth of drilled hole (ft.): 17,196

Est. % wash-out or hole enlargement: 20%

Size of casing in O.D. (in.): 5 1/2

Casing weight (lbs/ft) and grade: 20# HCP-110

No. of centralizers used:

Was cement circulated to ground surface (or bottom of cellar) outside casing? ☐ YES ☒ NO If no for surface casing, explain in Remarks.

Setting depth shoe (ft.):

Top of liner (ft.):

17191

Setting depth liner (ft.):

Hrs. waiting on cement before drill-out:

Calculated top of cement (ft.): 4765

Cementing date: 04/02/2017

## SLURRY

Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1	1870	VERSACEM	REMARKS	2739.55	11960.78
2	100	SOLUCEM	REMARKS	261.8	1151.96
3					
Total	1970			3001.35	13112.74

## II. CASING CEMENTING DATA

Type of casing: ☐ Surface ☐ Intermediate ☐ Production ☐ Tapered production ☐ Multi-stage cement shoe ☐ Multiple parallel strings

Drilled hole size (in.):

Depth of drilled hole (ft.):

Est. % wash-out or hole enlargement:

Size of casing in O.D. (in.):

Casing weight (lbs/ft) and grade:

No. of centralizers used:

Tapered string drilled hole size (in.)

Tapered string depth of drilled hole (ft.)

Upper:

Lower:

Upper:

Lower:

Tapered string size of casing in O.D. (in.)

Tapered string casing weight (lbs/ft) and grade

Tapered string no. of centralizers used

Upper:

Lower:

Upper:

Lower:

Upper:

Lower:

Was cement circulated to ground surface (or bottom of cellar) outside casing? ☐ YES ☐ NO

Setting depth shoe (ft.):

Hrs. waiting on cement before drill-out:

Calculated top of cement (ft.):

Cementing date:

## SLURRY

Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1					
2					
3					
Total	0			0	0

## III. CASING CEMENTING DATA

Type of casing: ☐ Surface ☐ Intermediate ☐ Production ☐ Tapered production ☐ Multi-stage cement/OV tool ☐ Multiple parallel strings

Drilled hole size (in.):

Depth of drilled hole (ft.):

Est. % wash-out or hole enlargement:

Size of casing in O.D. (in.):

Casing weight (lbs/ft) and grade:

No. of centralizers used:

Tapered string drilled hole size (in.)

Tapered string depth of drilled hole (ft.)

Upper:

Lower:

Upper:

Lower:

Tapered string size of casing in O.D. (in.)

Tapered string casing weight (lbs/ft) and grade

Tapered string no. of centralizers used

Upper:

Lower:

Upper:

Lower:

Upper:

Lower:

Was cement circulated to ground surface (or bottom of cellar) outside casing? ☐ YES ☐ NO

Setting depth tool (ft.):

Hrs. waiting on cement before drill-out:

Calculated top of cement (ft.):

Cementing date:

## SLURRY

Slurry No.	No. of Sacks	Class	Additives	Volume (cu. ft.)	Height (ft.)
1					
2					
3					
Total	0			0	0

CEMENTING TO SQUEEZE, PLUG BACK OR PLUG AND ABANDON							
	PLUG #1	PLUG #2	PLUG #3	PLUG #4	PLUG #5	PLUG #6	PLUG #7
Cementing Date							
Size of hole or pipe (in.)							
Depth to bottom of tubing or drill pipe (ft.)							
Cement retainer setting depth (ft.)							
CIBP setting depth (ft.)							
Amount of cement on top of CIBP (ft.)							
Sacks of cement used							
Slurry volume pumped (cu. ft.)							
Calculated top of plug (ft.)							
Measured top of plug, if tagged (ft.)							
Slurry weight (lbs/gal)							
Class/type of cement							
Perforate and squeeze (YES/NO)							

#### REMARKS

1ST SLURRY: 0.10% HR-601, 0.25% D-AIR 5000, 0.0750% SA-1015, 0.15% CFR-3, 0.60% HALAD(R)-23. 2ND SLURRY : 0.70% HR-601  
DID NOT CIRCULATE CEMENT TO SURFACE SALES ORDER # (0903902333)

**CEMENTER'S CERTIFICATE:** I declare under penalties prescribed in Sec. 91.143, Texas Natural Resources Code, that I am authorized to make this certification, that the cementing of casing and/or the placing of cement plugs in this well as shown in the report was performed by me or under my supervision, and that the cementing data and facts presented on both sides of this form are true, correct, and complete, to the best of my knowledge. This certification covers cementing data only.

**FRANCISCO SILVA SSIT**

**Halliburton**

Name and title of cementer's representative  
1301 W. Webb St.

Cementing Company  
Brownfield, Tx, 79316

Signature  
575-392-0700

04/02/2017

Address

City, State, Zip Code

Tel: Area Code

Number

Date: mo. day yr.

**OPERATOR'S CERTIFICATE:** I declare under penalties prescribed in Sec. 91.143, Texas Natural Resources Code, that I am authorized to make this certification, that I have knowledge of the well data and information presented in this report, and that data and facts presented on both sides of this form are true, correct, and complete, to the best of my knowledge. This certification covers all well data.

**Katie Biersmith**

**Regulatory Analyst**

Signature

Typed or printed name of operator's representative

Title

Signature

1050 17th Street Suite 800

Denver, CO 80265 (303) 672-6907

11/30/17

Address

City, State, Zip Code

Tel: Area Code

Number

Date: mo. day yr.

### Instructions for Form W-15, Cementing Report

**NOTICE:** The Form W-15 must be submitted as an attachment to a Form G-1 (Gas Well Back Pressure Test, Completion or Recompletion Report, and Log), Form W-2 (Oil Well Potential Test, Completion or Recompletion Report, and Log), Form W-3 (Plugging Record), or Form W-4 (Application for Multiple Completion), any time cement is pumped in a wellbore.

- What to file:** An operator should file an original and one copy of the completed Form W-15 for each cementing company used on a well. The cementing of different casing strings on a well by one cementing company may be reported on one form.  
The Form W-15 should be filed with the Form W-3, Plugging Record, unless the Form W-3 is signed by the cementing company representative. When reporting dry holes, operators must complete Form W-15, in addition to Form W-3, to show any casing cemented in the hole.
- How to file:** An oil and gas completion report and Form W-15 may be filed online using the Commission's Online System (<https://webapps.trec.state.tx.us/security/login.do>) or a paper copy of the form may be mailed to the Commission at Austin (P.O. Box 12967, Austin, Texas 78711-2967).
- Surface casing:** An operator must set and cement sufficient surface casing to protect all usable-quality water strata, as defined by the Groundwater Advisory Unit in Austin. Sufficient cement shall be used to fill the annular space outside the casing from the shoe to the ground surface or to the bottom of the cellar. Before drilling a well, an operator must obtain a letter from the Groundwater Advisory Unit stating the protection depth. Surface casing should not be set deeper than 200 feet below the specified depth without prior approval from the Commission.  
To plug and abandon a well, operators must use only cementers approved by the Commission's Director of Field Operations in accordance with SWR 14 ([http://info.sos.state.tx.us/pls/pub/readtac\\$ext.TacPage?si=R&app=9&p\\_dir=&p\\_floc=&poloc=&p\\_plor=&pg=1&p\\_tac=&ti=16&dl=1&ch=3&ri=14](http://info.sos.state.tx.us/pls/pub/readtac$ext.TacPage?si=R&app=9&p_dir=&p_floc=&poloc=&p_plor=&pg=1&p_tac=&ti=16&dl=1&ch=3&ri=14)). Cementing companies, service companies, or operators can qualify as approved cementers by demonstrating that they are able to mix and pump cement in compliance with Commission rules and regulations.
- Estimated % wash-out:** If the estimated % wash-out is less than 70% (or 30% along the Gulf Coast), provide supporting documentation such as a caliper log to show how the estimated % wash-out was obtained.
- Multi-stage cement:** An operator must report the multi-stage cement shoe in the Casing Cementing Data section by selecting the type of casing and Multi-stage cement shoe. The operator must report the multi-stage cement tool in the Casing Cementing Data section by selecting the type of casing and Multi-stage cement/DV tool.
- Multiple parallel strings:** An operator should file the Form W-15 as an attachment to the Form W-4, Application for Multiple Completion. An operator may be required to submit multiple Form W-15s to show all data for multiple parallel strings.
- Slurry data:** If cement job exceeds three slurries, combine the list of slurries in the slurry table in the subsequent Casing Cementing Data box.



Tracking No.: 183463

This facsimile L-1 was generated electronically from data submitted to the RRC.

## Instructions

**When to File Form L-1:**

- with Forms G-1, W-2, and GT-1 for new and deepened gas, oil, and geothermal wells
- with Form W-3 for plugged dry holes
- when sending in a log which was held under a request for confidentiality and the period for confidentiality has not yet expired.

**When is Form L-1 NOT required:**

- with Forms W-2, G-1, and GT-1 filed for injection wells, disposal wells, water supply wells, service wells, re-test wells, re-classifications, and plugbacks of oil, gas or geothermal wells
- with Form W-3 for plugging of other than a dry hole

**Where to File Form L-1:**

- with the appropriate Commission district office

**Filling out Form L-1:**

- Section I and the signature section must be filled out for all wells
- complete only the appropriate part of Section II

**Type of log required:**

- any wireline survey run for the purpose of obtaining lithology, porosity, or resistivity information
- no more than one such log is required but it must be of the subject well
- if such log is NOT run on the subject well, do NOT substitute any other type of log; just select Section II, Part A below

## SECTION I. IDENTIFICATION

Operator Name: QEP ENERGY COMPANY	District No. 08	Completion Date: 06/19/2017
Field Name SPRABERRY (TREND AREA)	Drilling Permit No. 820023	
Lease Name UNIVERSITY 7-2730	Lease/ID No. 48980	Well No. S 08SC
County MARTIN	API No. 42- 317-40597	

## SECTION II. LOG STATUS (Complete either A or B)

☐ A. BASIC ELECTRIC LOG NOT RUN☒ B. BASIC ELECTRIC LOG RUN. (Select one)

- ☐ 1. Confidentiality is requested and a copy of the header for each log that has been run on the well is attached.
- ☐ 2. Confidentiality already granted on basic electric log covering this interval (applicable to deepened wells only).
- ☐ 3. Basic electric log covering this interval already on file with Commission (applicable to deepened wells only).
- ☒ 4. Log attached to (select one):

☒ (a) Form L-1 (this form). If the company/lease name on log is different from that shown in Section I, please enter name on log here: \_\_\_\_\_

Check here if attached log is being submitted after being held confidential. ☐

☐ (b) Form P-7, Application for Discovery Allowable and New Field Designation.

☐ (c) Form W-4, Application for Multiple Completion:

Lease or ID No(s). \_\_\_\_\_

Well No(s). \_\_\_\_\_

Katie Biersmith

Signature

QEP ENERGY COMPANY

Name (print)

Regulatory Analyst

Title

(303) 672-6907

Phone

01/11/2018

Date

-FOR RAILROAD COMMISSION USE ONLY-



# Radial Cement Bond Gamma Ray CCL Log

Company QEP Resources Well University 7-2730 08SC Field Spraberry (Trend Area) County Martin State Tx	Company <b>QEP Resources</b>								
	Well <b>University 7-2730 08SC</b>								
	Field <b>Spraberry (Trend Area)</b>								
	County <b>Martin</b> State <b>Tx</b>								
Location:		API # : 42-317-40597		Other Services					
		2582' FNL & 1604' FEL							
		Section 27, Block 7, A-U27							
		University Lands Survey							
SEC 27 TWP RGE									
Permanent Datum		Ground Level		Elevation 2916'					
Log Measured From		KB 21' APD		K.B. 2937'					
Drilling Measured From		Kelly Bushing		D.F. 2936'					
				G.L. 2916'					
Date		April 14, 2017							
Run Number		One							
Depth Driller		17196'							
Depth Logger		9742'							
Bottom Logged Interval		9739'							
Top Log Interval		Surface							
Open Hole Size		-							
Type Fluid		Fresh							
Density / Viscosity		-							
Max. Recorded Temp.		-							
Estimated Cement Top		6262'							
Time Well Ready		On Arrival							
Time Logger on Bottom		4:00 PM							
Equipment Number		W-007							
Location		Odessa, Tx							
Recorded By		A. De La Rosa		I. Donkin					
Witnessed By									
Borehole Record				Tubing Record					
Run Number	Bit	From	To	Size	Weight	From	To		
Casing Record		Size		Wgt/Ft		Top		Bottom	
Surface String		13 3/8"		68# J-55		Surface		501'	
Prot. String		9 5/8"		40# HCL-80		Surface		8240'	
Production String		5 1/2"		20# HCP-110		Surface		17189'	
Liner									
Short Joint		9017'+ to 9040'							

<<< Fold Here >>>

All interpretations are opinions based on inferences from electrical or other measurements and we cannot and do not guarantee the accuracy or correctness of any interpretation, and we shall not, except in the case of gross or willful negligence on our part, be liable or responsible for any loss, costs, damages, or expenses incurred or sustained by anyone resulting from any interpretation made by any of our officers, agents or employees. These interpretations are also subject to our general terms and conditions set out in our current Price Schedule.

Comments

This Is The Primary Log

\*\*\*Thanks For Using RTX Wireline, LLC.\*\*\*

Main Pass 5"=100'  
4000 PSI





# CERTIFICATE OF POOLING AUTHORITY

Revised 05/2001

# P-12

1. Field Name(s) <b>SPRABERRY (TREND AREA)</b>	2. Lease/ID Number (if assigned) <b>48980</b>	3. RRC District Number <b>08</b>
4. Operator Name <b>QEP Energy Company</b>	5. Operator P-5 Number <b>684474</b>	6. Well Number <b>S 08SC</b>
7. Pooled Unit Name <b>UNIVERSITY 7-2730</b>	8. API Number <b>42-317-40597</b>	9. Purpose of Filing <input type="checkbox"/> Drilling Permit (W-1) <input checked="" type="checkbox"/> Completion Report
10. County <b>MARTIN</b>	11. Total acres in pooled unit <b>963</b>	

## DESCRIPTION OF INDIVIDUAL TRACTS CONTAINED WITHIN THE POOLED UNIT

TRACT/PLAT IDENTIFIER	TRACT NAME	ACRES IN TRACT (See inst. #7 below)	INDICATE UNDIVIDED INTERESTS	
			UNLEASED	NON-POOLED
TRACT 1	UNIVERSITY 7-2730	160	<input type="checkbox"/>	<input type="checkbox"/>
TRACT 2	UNIVERSITY 7-2730	160	<input type="checkbox"/>	<input type="checkbox"/>
TRACT 3	UNIVERSITY 7-2730	643	<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>

### CERTIFICATION:

I declare under penalties prescribed pursuant to the Sec. 91.143, Texas Natural Resources Code, that I am authorized to make the foregoing statements and that the information provided by me or under my direction on this Certificate of Pooling Authority is true, correct, and complete to the best of my knowledge.



Katie Biersmith

Signature

Print Name

Regulatory Analyst

katie.biersmith@qepres.com

01/11/2018

(303) 672-6907

Title

E-mail (if available)

Date

Phone

### INSTRUCTIONS — Reference: Statewide Rules 31, 38 and 40

- When two or more tracts are pooled to form a unit to obtain a drilling permit, file completion paperwork, or reform a pooled unit pursuant to Rule 38(d)(3) the operator must file an original Certificate of Pooling Authority and certified plat.
- The certified plat shall designate each tract with an outline and a tract identifier. The tract identifier on the plat shall correspond to the tract identifier and associated information listed on the Certificate.
- If within an individual tract, a non-pooled and/or unleased interest exists, indicate by checking the appropriate box.
- If the Purpose of Filing is to obtain a drilling permit, in box #1 list all applicable fields separately or enter "All Fields" if the Certificate pertains to all fields requested on Form W-1.
- If the Purpose of Filing is to file completion paperwork, enter the applicable field name in box #1 for the completion.
- Identify the drill site tract with an \* to the left of the tract identifier.
- The total number of acres in the pooled unit in #11 should equal the total of all acres in the individual tracts listed.

Clear Form





1701 N. Congress  
P.O. Box 12967  
Austin, Texas 78701-2967

## Acreage Designation Attachment

SECTION III (CONTINUED). LISTING OF ALL WELLS IN THE APPLIED-FOR FIELD ON THE SAME ACREAGE AS THE LEASE, POOLED UNIT, OR UNITIZED TRACT DESIGNATED IN SECTION II ABOVE BY FILER

[illegible]

## GROUNDWATER PROTECTION DETERMINATION

Form GW-2



## Groundwater Advisory Unit

**Date Issued:** 29 August 2016**GAU Number:** 159200**Attention:** QEP ENERGY COMPANY  
ATTN SOUTHERN DIV  
DENVER, CO 80265**API Number:** 31740531  
**County:** MARTIN  
**Lease Name:** UNIVERSITY 7-2730**Operator No.:** 684474**Lease Number:**  
**Well Number:** S 02LD  
**Total Vertical Depth:** 8100  
**Latitude:** 32.394210  
**Longitude:** -102.173814  
**Datum:** NAD27**Purpose:** New Drill**Location:** Survey-UL; Block-7; Section-27

To protect usable-quality groundwater at this location, the Groundwater Advisory Unit of the Railroad Commission of Texas recommends:

The interval from the land surface to a depth of 350 feet must be protected.

This recommendation is applicable for all wells drilled in this University 7-2730 Lease in Sections 27 and 30.

Note: Unless stated otherwise, this recommendation is intended to apply only to the subject well and not for area-wide use. This recommendation is for normal drilling, production, and plugging operations only. It does not apply to saltwater disposal operation into a nonproductive zone (RRC Form W-14).

This determination is based on information provided when the application was submitted on 08/26/2016. If the location information has changed, you must contact the Groundwater Advisory Unit, and submit a new application if necessary. If you have questions, please contact us at 512-463-2741 or [gau@rrc.texas.gov](mailto:gau@rrc.texas.gov).

Groundwater Advisory Unit, Oil and Gas Division

Form GW-2      P.O. Box 12967   Austin, Texas   78771-2967      512-463-2741      Internet address: [www.rrc.texas.gov](http://www.rrc.texas.gov)  
Rev. 02/2014



