



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 08/11/2016

Daily Cost _____

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			
830.020	Staking & Surveying			
830.030	Road, Locations			
830.035	Mobilization/Demobilization			
830.040	Daywork Contract			
830.050	Mouse/Rathole/Conduct Pipe			
830.055	Directional Drilling & Survey			
830.060	Bits, Tools, Stabalizers			
830.065	Fuel, Power			
830.070	Equipment Rental			\$500
830.071	Hot Shot Trucking			
830.075	Mud & Chemicals			\$3,658
830.080	Mud Logging			
830.090	Core Analysis			
830.095	Openhole Logging			
830.100	Cement Services			
830.110	Casing Crew & Equipment			\$2,002
830.120	Contract Labor			
830.160	Fishing Services			
830.165	Drill Water			\$1,000
830.175	Supervision			
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs			
840.100	Cement Services (4-1/2" Liner)			
Total Intangible				\$7,160

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"			
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible				
Total Costs				\$7,160



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 08/12/2016

Daily Cost \$300

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			
830.020	Staking & Surveying			
830.030	Road, Locations			
830.035	Mobilization/Demobilization			
830.040	Daywork Contract			
830.050	Mouse/Rathole/Conduct Pipe			
830.055	Directional Drilling & Survey			
830.060	Bits, Tools, Stabalizers			
830.065	Fuel, Power			
830.070	Equipment Rental			\$500
830.071	Hot Shot Trucking			
830.075	Mud & Chemicals			\$3,658
830.080	Mud Logging			
830.090	Core Analysis			
830.095	Openhole Logging			
830.100	Cement Services			
830.110	Casing Crew & Equipment			\$2,002
830.120	Contract Labor			
830.160	Fishing Services			
830.165	Drill Water		\$300	\$1,300
830.175	Supervision			
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs			
840.100	Cement Services (4-1/2" Liner)			
Total Intangible			\$300	\$7,460

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"			
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible				
Total Costs			\$300	\$7,460



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 08/13/2016

Daily Cost \$36,033

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			
830.020	Staking & Surveying			
830.030	Road, Locations			
830.035	Mobilization/Demobilization			
830.040	Daywork Contract			
830.050	Mouse/Rathole/Conduct Pipe			
830.055	Directional Drilling & Survey			
830.060	Bits, Tools, Stabalizers			
830.065	Fuel, Power			
830.070	Equipment Rental			\$500
830.071	Hot Shot Trucking			
830.075	Mud & Chemicals			\$3,658
830.080	Mud Logging			
830.090	Core Analysis			
830.095	Openhole Logging			
830.100	Cement Services		\$18,864	\$18,864
830.110	Casing Crew & Equipment			\$2,002
830.120	Contract Labor			
830.160	Fishing Services			
830.165	Drill Water			\$1,300
830.175	Supervision			
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs			
840.100	Cement Services (4-1/2" Liner)			
Total Intangible			\$18,864	\$26,324

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"		\$17,169	\$17,169
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible			\$17,169	\$17,169
Total Costs			\$36,033	\$43,493



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **08/25/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	6
Location		Supervisor 2		DFS	2
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	1,392	Daily Cost	\$29,039.50
Depth (MD)	3,757	TVD at Bit	3,757	Cum. Cost	\$462,628.13
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	BRINE / POLYMER
Weight	10
FV	27
PV	1
YP	
LCM (ppb)	
Chlorides	183000
% Solids	0.1
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
3,094'	4.60°	60.80°

Drilling Parameters

Max WOB	35
Max RPM	100
Max Torque	10
Max Pull	145
Bkgrnd Gas	
Max Gas	
Cnx Gas	
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	12.25
Motor	29.15'	2.75	8.00
Shock Sub	11.48'	2.75	8.00
Stabilizer	8.50'	2.75	8.25
Sub	3.80'	2.88	8.63
Monel Collar	59.05'	3.25	8.00
Drill Collar	86.10'	2.88	8.00
X-Over	3.55'	2.81	8.00
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	549.15'	2.94	6.50
Total Length:	1015.90		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			---I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'		2,812'	38.0	74.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	<p>DRILLED 12.25" VERTICAL SECTION F/ 2,365' T/ 2,725' - 360'</p> <p>- AROP: 90 FPH - WOB: 15 - 25 KLBS - STRING RPM: 60 - 100 - MOTOR RPM: 136 - FLOW: 850 GPM - DIFF: 200 - 400 PSI - ON-BTM PSI: 3,450 PSI - OFF-BTM PSI: 3,200 PSI - ON-BTM TRQ: 5.5 - 8.5 - OFF-BTM TRQ: 3.0 - 3.5 - M/W: IN - 10.0 / 27 - M/W OUT - 9.9+ / 26</p> <p>SURVEY AT: 2,329', INC - 4.3°, AZM - 58.2°, TVD - 2,327.94'</p> <p>- NOTE: HAD TO RECYCLE THE PUMPS A FEW TIMES TO GET SURVEYS. MWD STOPPED PUMPING UP SURVEYS AT 2,424' +/-</p> <p>- FORMATION DRILLED: YATES FORMATION</p>
10:00	14:45	4.75	Drilling	<p>DRILLED 12.25" VERTICAL SECTION F/ 2,725' T/ 3,093' - 368'</p> <p>- AROP: 78 FPH - WOB: 15 - 25 KLBS - STRING RPM: 40 - 120 - MOTOR RPM: 136 - FLOW: 850 GPM - DIFF: 225 - 350 PSI - ON-BTM PSI: 3,675 PSI - OFF-BTM PSI: 3,300 PSI - ON-BTM TRQ: 6.0 - 8.5 - OFF-BTM TRQ: 3.0 - 3.5 - M/W: IN - 10.0 / 26 - M/W OUT - 10.0 / 26</p> <p>- NOTE: NO SURVEY'S, MWD STOPPED WORKING.</p> <p>- FORMATION DRILLED: YATES AND SEVEN RIVER FORMATIONS</p> <p>- NOTE: CONDUCTED A DRILLING BOP DRILL WITH DAYLIGHT CREW.</p>
14:45	15:15	0.50	Planned	PERFORMED RIG AND TOP DRIVE SERVICE.
15:15	18:00	2.75	Drilling	<p>DRILLED 12.25" VERTICAL SECTION F/ 3,093' T/ 3,286' - 193'</p> <p>- AROP: 71 FPH - WOB: 20 - 30 KLBS - STRING RPM: 40 - 65 - MOTOR RPM: 134 - FLOW: 840 GPM - DIFF: 250 - 400 PSI - ON-BTM PSI: 3,825 PSI - OFF-BTM PSI: 3,350 PSI - ON-BTM TRQ: 6.0 - 8.5 - OFF-BTM TRQ: 3.0 - 3.5 - M/W: IN - 10.0 / 26 - M/W OUT - 10.0 / 26</p> <p>SURVEY AT: 3,094', INC - 4.6°, AZM - 60.8°, TVD - 3,090.53'</p> <p>- FORMATION DRILLED: SEVEN RIVER AND SALT SECTION FORMATIONS</p>
18:00	22:00	4.00	Drilling	<p>DRILLED 12.25" VERTICAL SECTION F/ 3,286' T/ 3,551' - 265'</p> <p>- AROP: 67 FPH - WOB: 20 - 35 KLBS - STRING RPM: 40 - 100 - MOTOR RPM: 132 - FLOW: 825 GPM - DIFF: 300 - 450 PSI - ON-BTM PSI: 3,725 PSI - OFF-BTM PSI: 3,350 PSI - ON-BTM TRQ: 6.5 - 8.5 - OFF-BTM TRQ: 2.0 - 2.5 - M/W: IN - 10.0 / 27 - M/W OUT - 10.0 / 27</p> <p>- NOTE: NO SURVEY'S, MWD STOPPED WORKING AGAIN.</p> <p>- FORMATION DRILLED: SALT SECTIONS</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **08/26/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	7
Location		Supervisor 2		DFS	3
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	1,043	Daily Cost	\$57,077.66
Depth (MD)	4,800	TVD at Bit	4,800	Cum. Cost	\$519,705.79
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	BRINE / POLYMER
Weight	10.1
FV	27
PV	1
YP	
LCM (ppb)	
Chlorides	183000
% Solids	0.1
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	35
Max RPM	100
Max Torque	11.5
Max Pull	160
Bkgrnd Gas	
Max Gas	
Cnx Gas	
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	12.25
Motor	29.15'	2.75	8.00
Shock Sub	11.48'	2.75	8.00
Stabilizer	8.50'	2.75	8.25
Sub	3.80'	2.88	8.63
Monel Collar	59.05'	3.25	8.00
Drill Collar	86.10'	2.88	8.00
X-Over	3.55'	2.81	8.00
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	549.15'	2.94	6.50
Total Length:	1015.90		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'		3,855'	53.0	73.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:30	4.50	UnPlanned	FINISHED CHANGING OUT B TRACTION MOTOR ON PUMP #2, WIRED IT UP, INSTALLED GUARDS AND CHECK ROTATION. TRIPPED BACKED TO BOTTOM. - NOTE: CONTINALLY WORKED THE DRILL STRING 90' WITH 410 GPM AND 20 RPM.
10:30	14:30	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 3,757' T/ 4,043' - 286' - AROP: 72 FPH - WOB: 20 - 35 KLBS - STRING RPM: 50 - 110 - MOTOR RPM: 132 - FLOW: 825 GPM - DIFF: 200 - 350 PSI - ON-BTM PSI: 4,050 PSI - OFF-BTM PSI: 3,700 PSI - ON-BTM TRQ: 7.5 - 10.5 - OFF-BTM TRQ: 2.0 - 2.5 - M/W: IN - 10.3 / 27 - M/W OUT - 10.3 / 27 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: SALADO AND CASTILE FORMATIONS. - NOTE: THE CASTILE FORMATION CAME IN AT 3,600' +/-
14:30	15:00	0.50	Planned	PERFORMED RIG AND TOP DRIVE SERVICE.
15:00	19:00	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 4,043' T/ 4,375' - 332' - AROP: 83 FPH - WOB: 20 - 35 KLBS - STRING RPM: 60 - 85 - MOTOR RPM: 133 - FLOW: 830 GPM - DIFF: 150 - 350 PSI - ON-BTM PSI: 4,150 PSI - OFF-BTM PSI: 3,725 PSI - ON-BTM TRQ: 8.5 - 11.5 - OFF-BTM TRQ: 2.0 - 2.5 - M/W: IN - 10.3 / 27 - M/W OUT - 10.3 / 27 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: CASTILE FORMATION.
19:00	23:00	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 4,375' T/ 4,649' - 274' - AROP: 69 FPH - WOB: 20 - 35 KLBS - STRING RPM: 40 - 80 - MOTOR RPM: 130 - FLOW: 810 GPM - DIFF: 200 - 400 PSI - ON-BTM PSI: 4,175 PSI - OFF-BTM PSI: 3,750 PSI - ON-BTM TRQ: 8.5 - 10.5 - OFF-BTM TRQ: 2.5 - 3.0 - M/W: IN - 10.3 / 27 - M/W OUT - 10.3 / 27 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: CASTILE FORMATION.
23:00	02:00	3.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 4,649' T/ 4,800' - 151' - AROP: 50 FPH - WOB: 20 - 35 KLBS - STRING RPM: 50 - 100 - MOTOR RPM: 130 - FLOW: 815 GPM - DIFF: 150 - 300 PSI - ON-BTM PSI: 4,300 PSI - OFF-BTM PSI: 4,150 PSI - ON-BTM TRQ: 8.5 - 10.5 - OFF-BTM TRQ: 2.5 - 3.0 - M/W: IN - 10.3 / 27 - M/W OUT - 10.3 / 27 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: CASTILE FORMATION. - NOTE: INSTALLED ROTATING HEAD AT 4,700'



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **08/27/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	8
Location		Supervisor 2		DFS	4
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	976	Daily Cost	\$50,811.88
Depth (MD)	5,776	TVD at Bit	5,776	Cum. Cost	\$573,985.04
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	8.9
FV	45
PV	10
YP	40
LCM (ppb)	
Chlorides	100
% Solids	4.19
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	38
Max RPM	120
Max Torque	12.5
Max Pull	185
Bkgrnd Gas	
Max Gas	
Cnx Gas	
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	12.25
Motor	29.15'	2.75	8.00
Shock Sub	11.48'	2.75	8.00
Stabilizer	8.50'	2.75	8.25
Sub	3.80'	2.88	8.63
Monel Collar	59.05'	3.25	8.00
Drill Collar	86.10'	2.88	8.00
X-Over	3.55'	2.81	8.00
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	549.15'	2.94	6.50
Total Length:	1015.90		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	930'			66.5	73.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	07:00	1.00	Planned	FINISHED DISPLACING THE WELL BORE WITH MMO MUD, CLOSED IN THE PIT SYSTEM AND MADE A CONNECTION, DRILLED 12.25" VERTICAL SECTION F/ 4,800' T/ 4,978' - 178'
				- AROP: 45 FPH - WOB: 20 - 38 KLBS - STRING RPM: 30 - 70 - MOTOR RPM: 120 - 132 - FLOW: 750 - 825 GPM - DIFF: 250 - 550 PSI - ON-BTM PSI: 3,150 PSI - OFF-BTM PSI: 2,825 PSI - ON-BTM TRQ: 8.5 - 10.5 - OFF-BTM TRQ: 2.5 - 3.0 - M/W: IN - 8.9 / 35 - M/W OUT - 8.9 / 37 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: CASTILE AND LAMAR FORMATIONS. - NOTE: THE LAMAR FORMATION CAME IN AT 4,937' - NOTE: STARTED MIXING LCM AT 5,000' - 5 FINE CAL., 5 MED CAL. AND 2 MICA EVER HOUR.
07:00	11:00	4.00	Drilling	WHILE DRILLING AHEAD THE DERRICK HAND WAS OVER BY THE SHAKERS AND HIS PERSONAL H2S MONITOR WENT OFF. HE INFORMED THE DRILLER, DRILLER PICKED UP AND SPACED OUT. THE LOCATION MUSTERED UP AND TOOK A HEAD COUNT. THE TOOL PUSHER AND DSM SWEEPED THE LOCATION WITH THE GAS DETECTORS AND FOUND H2S READINGS AT THE SHAKER. READINGS WERE SHOWING 20 TP 50 PPM AND SEEN A SPIKE OF 150 PPM. CALLS WERE MADE AND THE DECISION WAS TO SHUT THE WELL IN, MIX UP 50 BBL SWEEP WITH LIME AT 15 PH LEVEL AND BRING THE ACTIVE SYSTYEM UP TO 12 PH. ONCE THE SWEEP WAS BUILT WE LINED UP THROUGH THE CHOKE AND STARTED PUMPING THE SWEEP. WE HAD SAFETY ALERT SHOW UP AND MONITORED THE SHAKERS. ONCE THE H2S READINGS WERE BELOW THE 10 PPM HE CLEARED THE LOCATION AND GAVE THE ALL CLEAR. WE THEN OPENED THE WELL BACK UP AND CONTIUNED DRILLING AHEAD. - NOTE: THE SPRINT H2S MONITORS NEVER SHOWED ANY H2S AT ANY TIME.
11:00	14:30	3.50	UnPlanned	DRILLED 12.25" VERTICAL SECTION F/ 4,978' T/ 5,181' - 203'
				- AROP: 68 FPH - WOB: 20 - 35 KLBS - STRING RPM: 55 - 80 - MOTOR RPM: 120 - 132 - FLOW: 750 - 800 GPM - DIFF: 200 - 450 PSI - ON-BTM PSI: 3,675 PSI - OFF-BTM PSI: 3,500 PSI - ON-BTM TRQ: 8.5 - 11.0 - OFF-BTM TRQ: 2.5 - 3.0 - M/W: IN - 9.1 / 41 - PH: 11 - M/W OUT - 9.1 / 38 - PH: 12 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: LAMAR AND BELL CANYON FORMATIONS. - NOTE: THE BELL CANYON FORMATION CAME IN AT 5,028'
14:30	17:30	3.00	Drilling	WHILE DRILLING AHEAD THE DERRICK HAND WAS WORKING ON UNPLUGGING THE 10" CUTTINGS LINE TO THE PIT. HE ENDED UP CHURNING UP THE CUTTINGS IN THE LINE AND SETTING HIS H2S MONITOR OFF. HE REPORTED IT TO THE DRILLER, DRILLER PICKED UP, SPACED OUT AND MUSTERED UP. TOOL PUSHER, DSM AND SAFETY H2S REP SWEEPED THE LOCATION AND FOUND THE H2S READINGS IN THE CUTTING TROUGH. FINISHED CLEANING OUT AND JETTING THE LINE RESNIFFED THE AREA AND CLEARED THE ALARM.
17:30	18:30	1.00	UnPlanned	



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **08/28/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	9
Location		Supervisor 2		DFS	5
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	1,515	Daily Cost	\$35,197.14
Depth (MD)	7,291	TVD at Bit	7,291	Cum. Cost	\$609,182.18
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.4
FV	77
PV	7
YP	24
LCM (ppb)	0.5
Chlorides	78000
% Solids	3.47
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	38
Max RPM	120
Max Torque	13.5
Max Pull	200
Bkgrnd Gas	
Max Gas	
Cnx Gas	
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	12.25
Motor	29.15'	2.75	8.00
Shock Sub	11.48'	2.75	8.00
Stabilizer	8.50'	2.75	8.25
Sub	3.80'	2.88	8.63
Monel Collar	59.05'	3.25	8.00
Drill Collar	86.10'	2.88	8.00
X-Over	3.55'	2.81	8.00
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	549.15'	2.94	6.50
Total Length:	1015.90		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			---I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'		6,346'	90.0	71.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 5,776' T/ 6,112' - 336' - AROP: 84 FPH - WOB: 15 - 35 KLBS - STRING RPM: 40 - 75 - MOTOR RPM: 132 - FLOW: 830 GPM - DIFF: 150 - 500 PSI - ON-BTM PSI: 4,150 PSI - OFF-BTM PSI: 3,900 PSI - ON-BTM TRQ: 8.5 - 13.0 - OFF-BTM TRQ: 3.0 - 4.0 - M/W: IN - 9.6 / 42 - PH: 11 - M/W OUT - 9.6 / 41 - PH: 11 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: BELL CANYON AND CHERRY CANYON FORMATIONS. - NOTE: CHERRY CANYON FORMATION CAME IN AT 5,925' MD
10:00	14:00	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 6,112' T/ 6,411' - 299' - AROP: 75 FPH - WOB: 15 - 32 KLBS - STRING RPM: 40 - 110 - MOTOR RPM: 132 - FLOW: 820 GPM - DIFF: 150 - 425 PSI - ON-BTM PSI: 4,050 PSI - OFF-BTM PSI: 3,850 PSI - ON-BTM TRQ: 8.5 - 12.5 - OFF-BTM TRQ: 3.0 - 4.0 - M/W: IN - 8.9 / 56 - PH: 11 - M/W OUT - 9.6 / 44 - PH: 11 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: CHERRY CANYON FORMATION.
14:00	14:30	0.50	Planned	PERFORMED RIG, DRAW WORK AND TOP DRIVE SERVICE.
14:30	18:30	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 6,411' T/ 6,699' - 288' - AROP: 72 FPH - WOB: 25 - 35 KLBS - STRING RPM: 60 - 115 - MOTOR RPM: 132 - FLOW: 820 GPM - DIFF: 200 - 450 PSI - ON-BTM PSI: 4,275 PSI - OFF-BTM PSI: 4,050 PSI - ON-BTM TRQ: 8.0 - 13.0 - OFF-BTM TRQ: 3.0 - 4.0 - M/W: IN - 9.4 / 77 - PH: 12 - M/W OUT - 9.6 / 46 - PH: 11 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: CHERRY CANYON FORMATION.
18:30	22:30	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 6,699' T/ 6,959' - 260' - AROP: 65 FPH - WOB: 20 - 35 KLBS - STRING RPM: 75 - 120 - MOTOR RPM: 132 - FLOW: 820 GPM - DIFF: 150 - 350 PSI - ON-BTM PSI: 4,200 PSI - OFF-BTM PSI: 4,050 PSI - ON-BTM TRQ: 8.5 - 13.5 - OFF-BTM TRQ: 3.0 - 4.5 - M/W: IN - 9.3+ / 77 - PH: 12 - M/W OUT - 9.2+ / 46 - PH: 11 - NOTE: NO SURVEY'S, MWD STOPPED WORKING. - FORMATION DRILLED: CHERRY CANYON FORMATION.



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **08/29/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	10
Location		Supervisor 2		DFS	6
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.AFE	AFE	
KB		Daily Footage	375	Daily Cost	\$80,158.06
Depth (MD)	7,666	TVD at Bit	7,666	Cum. Cost	\$690,885.24
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.45
FV	47
PV	5
YP	27
LCM (ppb)	0.5
Chlorides	70000
% Solids	4.38
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	38
Max RPM	120
Max Torque	11.5
Max Pull	205
Bkgrnd Gas	
Max Gas	
Cnx Gas	
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	12.25
Motor	29.13'	2.75	8.00
Shock Sub	12.25'	2.75	8.00
Stabilizer	7.93'	2.75	8.25
Drill Collar	86.10'	2.88	8.00
X-Over	3.55'	2.81	8.00
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	549.15'	2.94	6.50
Total Length:	953.23		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'		218'	6.5	34.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	<p>DRILLED 12.25" VERTICAL SECTION F/ 7,291' T/ 7,416' - 125'</p> <p>- AROP: 31 FPH - WOB: 25 - 40 KLBS - STRING RPM: 30 - 60 - MOTOR RPM: 112 - 131 - FLOW: 700 - 820 GPM - DIFF: 150 - 475 PSI - ON-BTM PSI: 4,075 PSI - OFF-BTM PSI: 3,000 PSI - ON-BTM TRQ: 8.5 - 11.5 - OFF-BTM TRQ: 3.5 - 5.0 - M/W: IN - 9.2+ / 41 - PH: 10 - M/W OUT - 9.5 / 42 - PH: 10</p> <p>- NOTE: NO SURVEY'S, MWD STOPPED WORKING.</p> <p>- FORMATION DRILLED: BRUSHY CANYON FORMATION.</p>
10:00	12:00	2.00	Drilling	<p>DRILLED 12.25" VERTICAL SECTION F/ 7,416' T/ 7,448' - 32'</p> <p>- AROP: 16 FPH - WOB: 20 - 40 KLBS - STRING RPM: 30 - 60 - MOTOR RPM: 104 - 128 - FLOW: 650 - 800 GPM - DIFF: 250 - 450 PSI - ON-BTM PSI: 3,350 PSI - OFF-BTM PSI: 2,950 PSI - ON-BTM TRQ: 8.0 - 10.5 - OFF-BTM TRQ: 3.5 - 5.0 - M/W: IN - 9.4 / 50 - PH: 11 - M/W OUT - 9.4 / 42 - PH: 11</p> <p>- NOTE: NO SURVEY'S, MWD STOPPED WORKING.</p> <p>- FORMATION DRILLED: BRUSHY CANYON FORMATION.</p>
12:00	13:00	1.00	Planned	<p>CIRCULATED AND MOVED THE PIPE WHILE BUILDING A PILL AND FILLING TRIP TANKS. FLOW CHECKED - WELL STATIC AND PUMPED A PILL.</p>
13:00	15:15	2.25	Planned	<p>TRIPPED OUT OF THE HOLE WITH 4.5" DRILL PIPE FROM 7,448' TO 2,525'</p> <p>MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 32.0 BBLS - ACTUAL FILL: 28 BBLS</p> <p>- AVERAGE TRIP SPEED: 2,175 FPH</p> <p>- HOLE CONDITIONS: GOOD, NO OVER PULL SEEN.</p> <p>NOTE: PULLED ROTATING HEAD AT 2,525', CONDUCTED FLOW CHECK - WELL STATIC AND SWITCHED OVER TO 5" HANDLING EQUIPMENT</p>
15:15	16:00	0.75	Planned	<p>TRIPPED OUT OF THE HOLE WITH 5" DRILL PIPE FROM 2,525' TO 1,015' - BHA</p> <p>MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 14.1 BBLS - ACTUAL FILL: 15 BBLS</p> <p>- AVERAGE TRIP SPEED: 2,025' FPH</p> <p>- HOLE CONDITIONS: GOOD, NO OVER PULL SEEN</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **08/30/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	11
Location		Supervisor 2		DFS	7
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	493	Daily Cost	\$26,407.10
Depth (MD)	8,159	TVD at Bit	8,159	Cum. Cost	\$717,292.34
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.4
FV	44
PV	5
YP	22
LCM (ppb)	0.25
Chlorides	68000
% Solids	4.5
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	45
Max RPM	100
Max Torque	11.5
Max Pull	210
Bkgrnd Gas	
Max Gas	
Cnx Gas	
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	12.25
Motor	29.13'	2.75	8.00
Shock Sub	12.25'	2.75	8.00
Stabilizer	7.93'	2.75	8.25
Drill Collar	86.10'	2.88	8.00
X-Over	3.55'	2.81	8.00
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	549.15'	2.94	6.50
Total Length:	953.23		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'		711'	26.5	27.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 7,666' T/ 7,761' - 95' - AROP: 24 FPH - WOB: 25 - 40 KLBS - STRING RPM: 35 - 60 - MOTOR RPM: 112 - 120 - FLOW: 700 - 750 GPM - DIFF: 200 - 300 PSI - ON-BTM PSI: 3,475 PSI - OFF-BTM PSI: 3,375 PSI - ON-BTM TRQ: 6.0 - 10.0 - OFF-BTM TRQ: 3.5 - 5.0 - M/W: IN - 9.4+ / 42 - PH: 11 - M/W OUT - 9.4+ / 44 - PH: 11 - FORMATION DRILLED: BRUSHY CANYON FORMATION.
10:00	13:30	3.50	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 7,761' T/ 7,857' - 96' - AROP: 28 FPH - WOB: 25 - 43 KLBS - STRING RPM: 50 - 60 - MOTOR RPM: 120 - FLOW: 750 GPM - DIFF: 150 - 350 PSI - ON-BTM PSI: 3,450 PSI - OFF-BTM PSI: 3,225 PSI - ON-BTM TRQ: 6.5 - 11.0 - OFF-BTM TRQ: 3.5 - 5.0 - M/W: IN - 9.4 / 42 - PH: 11 - M/W OUT - 9.4 / 44 - PH: 11 - FORMATION DRILLED: BRUSHY CANYON FORMATION. NOTE: CONDUCTED DRILLING BOP DRILL WITH RIG CREW - HELD FLOW PADDLE UP AND IT TOOK DRILLER 2 MIN. 45 SEC. TIME TO REACT.
13:30	14:00	0.50	Planned	PERFORMED RIG AND TOP DRIVE SERVICE. NOTE: TOOK SLOW PUMP RATES ON BOTH PUMPS.
14:00	18:00	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 7,857' T/ 7,966' - 109' - AROP: 28 FPH - WOB: 30 - 45 KLBS - STRING RPM: 45 - 60 - MOTOR RPM: 120 - FLOW: 750 GPM - DIFF: 100 - 350 PSI - ON-BTM PSI: 3,650 PSI - OFF-BTM PSI: 3,425 PSI - ON-BTM TRQ: 7.0 - 11.0 - OFF-BTM TRQ: 3.5 - 5.0 - M/W: IN - 9.4 / 42 - PH: 11 - M/W OUT - 9.4 / 43 - PH: 11 - FORMATION DRILLED: BRUSHY CANYON FORMATION.
18:00	22:00	4.00	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 7,966' T/ 8,048' - 101' - AROP: 25 FPH - WOB: 25 - 45 KLBS - STRING RPM: 45 - 80 - MOTOR RPM: 104 - 120 - FLOW: 650 - 750 GPM - DIFF: 150 - 300 PSI - ON-BTM PSI: 3,500 PSI - OFF-BTM PSI: 3,350 PSI - ON-BTM TRQ: 7.5 - 9.5 - OFF-BTM TRQ: 3.5 - 5.0 - M/W: IN - 9.4 / 75 - PH: 11 - M/W OUT - 9.4 / 41 - PH: 11 - FORMATION DRILLED: BRUSHY CANYON FORMATION.
22:00	00:30	2.50	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 8,048' T/ 8,117' - 69' - AROP: 28 FPH - WOB: 30 - 45 KLBS - STRING RPM: 45 - 80 - MOTOR RPM: 104 - 128 - FLOW: 650 - 800 GPM - DIFF: 100 - 300 PSI - ON-BTM PSI: 3,650 PSI - OFF-BTM PSI: 3,425 PSI - ON-BTM TRQ: 7.0 - 9.5 - OFF-BTM TRQ: 3.5 - 5.5 - M/W: IN - 9.4 / 53 - PH: 10.5 - M/W OUT - 9.4 / 43 - PH: 11 - FORMATION DRILLED: BRUSHY CANYON FORMATION.



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 08/30/2016

Daily Cost \$26,407

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			\$3,500
830.020	Staking & Surveying			\$3,000
830.030	Road, Locations			\$60,500
830.035	Mobilization/Demobilization			\$100,000
830.040	Daywork Contract	14 K A Day (\$583.33 Per H) Down 3.5 Hr.	\$11,958	\$143,042
830.050	Mouse/Rathole/Conduct Pipe			\$12,000
830.055	Directional Drilling & Survey			\$5,500
830.060	Bits, Tools, Stabalizers			\$15,000
830.065	Fuel, Power			\$50,473
830.070	Equipment Rental		\$1,577	\$34,824
830.071	Hot Shot Trucking			\$3,763
830.075	Mud & Chemicals		\$6,564	\$102,442
830.080	Mud Logging		\$1,800	\$9,000
830.090	Core Analysis			
830.095	Openhole Logging			
830.100	Cement Services			\$18,864
830.110	Casing Crew & Equipment			\$2,852
830.120	Contract Labor		\$708	\$14,176
830.160	Fishing Services			
830.165	Drill Water			\$36,300
830.175	Supervision		\$3,800	\$30,400
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs			\$4,489
840.100	Cement Services (4-1/2" Liner)			
Total Intangible			\$26,407	\$650,124

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"			\$17,169
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			\$50,000
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible				\$67,169
Total Costs			\$26,407	\$717,292



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **08/31/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	12
Location		Supervisor 2		DFS	8
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	201	Daily Cost	\$53,995.14
Depth (MD)	8,360	TVD at Bit	8,360	Cum. Cost	\$771,287.48
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.45
FV	46
PV	4
YP	19
LCM (ppb)	0.25
Chlorides	74000
% Solids	4.14
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
8,300'	1.70°	327.20°

Drilling Parameters

Max WOB	25
Max RPM	65
Max Torque	6320
Max Pull	197
Bkgrnd Gas	530
Max Gas	831
Cnx Gas	
Trip Gas	200

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	8.75
Motor	35.18'	2.75	7.00
Shock Sub	11.50'	2.50	6.38
Stabilizer	6.32'	2.56	6.56
Sub	3.67'	2.88	6.63
Monel Collar	27.96'	2.88	6.50
Monel Collar	28.29'	2.88	6.50
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	737.83'	2.94	6.50
Total Length:	1115.87		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'	8,220'	772'	29.8	26.0	2-4-BT-SH-I-X-CT-ROP
4	8.75	SMITH	Z713	JM0172	7X12	8,220'		135'	6.0	23.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	06:30	0.50	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 8,159' T/ 8,170' - 11' - AROP: 22 FPH - WOB: 35 - 40 KLBS - STRING RPM: 60 - 70 - MOTOR RPM: 128 - FLOW: 800 GPM - DIFF: 150 - 275 PSI - ON-BTM PSI: 3,875 PSI - OFF-BTM PSI: 3,625 PSI - ON-BTM TRQ: 6.0 - 9.5 - OFF-BTM TRQ: 2.5 - 4.0 - M/W: IN - 9.4+ / 42 - PH: 11 - M/W OUT - 9.4+ / 43 - PH: 11 - FORMATION DRILLED: BRUSHY CANYON FORMATION.
06:30	07:00	0.50	Planned	PERFORMED RIG AND TOP DRIVE SERVICE
07:00	09:45	2.75	Drilling	DRILLED 12.25" VERTICAL SECTION F/ 8,170' T/ 8,220' - 50' - AROP: 18 FPH - WOB: 35 - 40 KLBS - STRING RPM: 60 - 70 - MOTOR RPM: 112 - 128 - FLOW: 700 - 750 GPM - DIFF: 150 - 275 PSI - ON-BTM PSI: 3,475 PSI - OFF-BTM PSI: 3,300 PSI - ON-BTM TRQ: 7.0 - 9.5 - OFF-BTM TRQ: 2.5 - 4.0 - M/W: IN - 9.3 / 43 - PH: 11 - M/W OUT - 9.4+ / 42 - PH: 11 - FORMATION DRILLED: BRUSHY CANYON FORMATION.
09:45	10:15	0.50	Planned	CIRCULATED AND MOVED THE PIPE WHILE BUILDING A PILL AND FILLING TRIP TANKS. FLOW CHECKED - WELL STATIC AND PUMPED A PILL.
10:15	13:00	2.75	Planned	TRIPPED OUT OF THE HOLE WITH 4.5" DRILL PIPE FROM 8,120' TO 2,525' MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 36.3 BBLS - ACTUAL FILL: 31 BBLS - AVERAGE TRIP SPEED: 2,025 FPH - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN. NOTE: PULLED ROTATING HEAD AT 2,525', CONDUCTED FLOW CHECK - WELL STATIC AND SWITCHED OVER TO 5" HANDLING EQUIPMENT
13:00	13:30	0.50	Planned	TRIPPED OUT OF THE HOLE WITH 5" DRILL PIPE FROM 2,525' TO 953' - BHA MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 14.1 BBLS - ACTUAL FILL: 16 BBLS - AVERAGE TRIP SPEED: 3,150' FPH - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN
13:30	16:30	3.00	Planned	HELD PJSM WITH RIG CREW ON HANDLING AND CHANGING OUT BHA'S - STOOD BACK 6 STANDS OF 5" HWD, 3 STANDS OF 6.5" DRILL COLLARS AND 1 STAND OF 8" DRILL COLLARS - PICKED UP STAB, SHOCK SUB AND MOTOR, CHECKED THE BIT - BIT WAS NOT DBR. DRAINED MOTOR, BROKE THE BIT OFF AND LAID DOWN MOTOR, SHOCK SUB AND STAB. - RAN THE STAND OF 8" DRILL COLLARS BACK IN THE HOLE AND LAID THEM DOWN. MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 30.9 BBLS - ACTUAL FILL: 32 BBLS NOTE: FUNCTION TESTED BLIND RAMS.



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/01/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	13
Location		Supervisor 2	DENNY HOWARD	DFS	9
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	636	Daily Cost	\$45,540.90
Depth (MD)	8,996	TVD at Bit	8,996	Cum. Cost	\$821,628.38
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.4
FV	46
PV	8
YP	16
LCM (ppb)	0.25
Chlorides	85000
% Solids	3.46
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
8,886'	2.20°	356.40°

Drilling Parameters

Max WOB	35
Max RPM	65
Max Torque	9474
Max Pull	230
Bkgrnd Gas	225
Max Gas	300
Cnx Gas	300
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	8.75
Motor	35.18'	2.75	7.00
Shock Sub	11.50'	2.50	6.38
Stabilizer	6.32'	2.56	6.56
Sub	3.67'	2.88	6.63
Monel Collar	27.96'	2.88	6.50
Monel Collar	28.29'	2.88	6.50
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	737.83'	2.94	6.50
Total Length:	1115.87		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'	8,220'	772'	29.8	26.0	2-4-BT-SH-I-X-CT-ROP
4	8.75	SMITH	Z713	JM0172	7X12	8,220'		771'	29.5	26.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 8,360' T/ 8,467' - 107'</p> <p>- AROP: 27 FPH - WOB: 20 - 30 KLBS - STRING RPM: 55 - 70 - MOTOR RPM: 82 - 90 - FLOW: 550 - 600 GPM - DIFF: 150 - 250 PSI - ON-BTM PSI: 2,550 PSI - OFF-BTM PSI: 2,275 PSI - ON-BTM TRQ: 5.5 - 7.0 - OFF-BTM TRQ: 2.0 - 3.5 - M/W: IN - 9.4+ / 45 - PH: 10 - M/W OUT - 9.4+ / 43 - PH: 10 - BBG GAS: 100 - CONNECTION GAS: 115</p> <p>SURVEY AT: 8,320', INC - 1.6°, AZM - 338.20°, TVD - 8,318.75'</p> <p>- FORMATION DRILLED: BRUSHY CANYON FORMATION.</p> <p>NOTE: HAD TO RE-LOG FROM 8,301 TO 8,355'</p>
10:00	13:30	3.50	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 8,467' T/ 8,584' - 117'</p> <p>- AROP: 33 FPH - WOB: 20 - 32 KLBS - STRING RPM: 35 - 75 - MOTOR RPM: 82 - FLOW: 550 GPM - DIFF: 200 - 350 PSI - ON-BTM PSI: 2,600 PSI - OFF-BTM PSI: 2,450 PSI - ON-BTM TRQ: 5.5 - 7.5 - OFF-BTM TRQ: 2.5 - 3.5 - M/W: IN - 9.4+ / 44 - PH: 10 - M/W OUT - 9.4+ / 43 - PH: 10 - BBG GAS: 225 - CONNECTION GAS: 300</p> <p>SURVEY AT: 8,509', INC - 1.8°, AZM - 346.40°, TVD - 8,507.67'</p> <p>- FORMATION DRILLED: BRUSHY CANYON AND 1ST BONE SPRING LIME FORMATIONS.</p> <p>NOTE: 1ST BONE SPRINGS LIME FORMATION CAME IN AT 8,511'</p>
13:30	14:00	0.50	Planned	<p>PERFORMED RIG AND TOP DRIVE SERVICE.</p> <p>NOTE: GOT SPR'S FROM PUMPS #1 AND #2.</p>
14:00	18:00	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 8,584' T/ 8,740' - 156'</p> <p>- AROP: 39 FPH - WOB: 20 - 32 KLBS - STRING RPM: 35 - 75 - MOTOR RPM: 82 - FLOW: 550 GPM - DIFF: 150 - 350 PSI - ON-BTM PSI: 2,575 PSI - OFF-BTM PSI: 2,350 PSI - ON-BTM TRQ: 5.5 - 7.5 - OFF-BTM TRQ: 2.5 - 3.5 - M/W: IN - 9.4+ / 44 - PH: 10 - M/W OUT - 9.4+ / 43 - PH: 10 - BBG GAS: 225 - CONNECTION GAS: 300</p> <p>SURVEY AT: 8,665', INC - 1.8°, AZM - 346.40°, TVD - 8,738.67'</p> <p>- FORMATION DRILLED: 1ST BONE SPRING LIME FORMATION.</p> <p>NOTE: SAMPLE AT 8,690' SHOWS 70% LS AND 30% SH</p>

18:00	22:00	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 8,740' T/ 8,856' - 116'</p> <p>- AROP: 30 FPH - STRING RPM: 35 - 75 - FLOW: 550 GPM - ON-BTM PSI: 2,650 PSI - ON-BTM TRQ: 5.5 - 7.0 - M/W: IN - 9.5 / 47 - PH: 10 - BBG GAS: 125</p> <p>- WOB: 20 - 35 KLBS - MOTOR RPM: 82 - DIFF: 100 - 300 PSI - OFF-BTM PSI: 2,425 PSI - OFF-BTM TRQ: 2.5 - 3.5 - M/W OUT - 9.4+ / 42 - PH: 10 - CONNECTION GAS: 263</p> <p>SURVEY AT: 8,698', INC - 1.7°, AZM - 339.30°, TVD - 8,696.67'</p> <p>- FORMATION DRILLED: 1ST BONE SPRING LIME FORMATION.</p> <p>NOTE: SAMPLE AT 8,840' SHOWS 75% LS, 15% SH AND 10% CHRT</p>							
22:00	02:00	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 8,856' T/ 8,927' - 71'</p> <p>- AROP: 18 FPH - STRING RPM: 35 - 75 - FLOW: 550 GPM - ON-BTM PSI: 2,650 PSI - ON-BTM TRQ: 5.5 - 7.0 - M/W: IN - 9.5 / 47 - PH: 10 - BBG GAS: 125</p> <p>- WOB: 20 - 35 KLBS - MOTOR RPM: 82 - DIFF: 100 - 300 PSI - OFF-BTM PSI: 2,425 PSI - OFF-BTM TRQ: 2.5 - 3.5 - M/W OUT - 9.4+ / 42 - PH: 10 - CONNECTION GAS: 263</p> <p>SURVEY AT: 8,792', INC - 2.2°, AZM - 352.8°, TVD - 8,790.53'</p> <p>- FORMATION DRILLED: 1ST BONE SPRING LIME FORMATION.</p> <p>NOTE: SAMPLE AT 8,840' SHOWS 75% LS, 15% SH AND 10% CHRT</p>							
02:00	06:00	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 8,927' T/ 8,996' - 73'</p> <p>- AROP: 18 FPH - STRING RPM: 35 - 75 - FLOW: 550 - 600 GPM - ON-BTM PSI: 2,675 PSI - ON-BTM TRQ: 7.5 - 10.0 - M/W: IN - 9.5 / 56 - PH: 10.5 - BBG GAS: 75</p> <p>- WOB: 20 - 30 KLBS - MOTOR RPM: 82 - 90 - DIFF: 150 - 350 PSI - OFF-BTM PSI: 2,450 PSI - OFF-BTM TRQ: 3.0 - 4.5 - M/W OUT - 9.4+ / 48 - PH: 10 - CONNECTION GAS: 125</p> <p>SURVEY AT: 8,886', INC - 2.2°, AZM - 356.4 °, TVD - 8,884.46'</p> <p>- FORMATION DRILLED: 1ST BONE SPRING LIME FORMATION.</p> <p>NOTE: SAMPLE AT 8,960' SHOWS 80% LS, 5% SH AND 15% CHRT</p>							
Total Hours:		24									
24 Hour Activity Summary:											
DRILL AHEAD IN THE VERTICAL SECTION											
24 Hour Plan Forward:											
DRILL AHEAD IN THE VERTICAL SECTION											
Safety											
Last BOP Test	08/22/2016	Last BOP Drill	08/31/2016	Last Function Test	8/30/2016	Fuel					
						Diesel Used	2,213	Diesel Recvd	7,200	Diesel on Loc	12,752



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/02/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	14
Location		Supervisor 2		DFS	10
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	384	Daily Cost	\$55,666.72
Depth (MD)	9,380	TVD at Bit	9,380	Cum. Cost	\$877,895.10
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.5
FV	48
PV	8
YP	19
LCM (ppb)	0.5
Chlorides	85000
% Solids	4.19
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
9,170'	1.70°	15.40°

Drilling Parameters

Max WOB	30
Max RPM	50
Max Torque	9.5
Max Pull	230
Bkgrnd Gas	125
Max Gas	909
Cnx Gas	176
Trip Gas	1115

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	8.75
Motor	35.18'	2.75	7.00
Shock Sub	11.50'	2.50	6.38
Stabilizer	6.32'	2.56	6.56
Sub	3.67'	2.88	6.63
Monel Collar	27.96'	2.88	6.50
Monel Collar	28.29'	2.88	6.50
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	737.83'	2.94	6.50
Total Length:	1115.87		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			---I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'	8,220'	772'	29.8	26.0	2-4-BT-SH-I-X-CT-ROP
4	8.75	SMITH	Z713	JM0172	7X12	8,220'	9,018'	798'	31.0	26.0	2-2-CT-A-I-X-WT-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	07:30	1.50	Drilling	DRILLED 8.75" VERTICAL SECTION F/ 8,996' T/ 9,018' - 22' - AROP: 15 FPH - WOB: 20 - 25 KLBS - STRING RPM: 35 - 75 - MOTOR RPM: 82 - FLOW: 550 GPM - DIFF: 100 - 300 PSI - ON-BTM PSI: 2,725 PSI - OFF-BTM PSI: 2,475 PSI - ON-BTM TRQ: 6.5 - 10.0 - OFF-BTM TRQ: 3.0 - 4.5 - M/W: IN - 9.5 / 82 - PH: 11 - M/W OUT - 9.4+ / 52 - PH: 10.5 - BBG GAS: 100 - CONNECTION GAS: 140 SURVEY AT: 8,886', INC - 2.2°, AZM - 356.4°, TVD - 8,884.46' - FORMATION DRILLED: 1ST BONE SPRING LIME FORMATION. NOTE: SAMPLE AT 8,990' SHOWS 70% LS, 20% SH AND 10% CHRT
07:30	08:15	0.75	Planned	CIRCULATED AND MOVED THE PIPE WHILE BUILDING A PILL AND FILLING TRIP TANKS. FLOW CHECKED - WELL STATIC AND PUMPED A PILL.
08:15	10:45	2.50	Planned	TRIPPED OUT OF THE HOLE WITH 4.5" DRILL PIPE FROM 9,018' TO 2,625' MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 42.2 BBLS - ACTUAL FILL: 39 BBLS - AVERAGE TRIP SPEED: 2,600 FPH - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN. NOTE: PULLED ROTATING HEAD AT 2,525', CONDUCTED FLOW CHECK - WELL STATIC AND SWITCHED OVER TO 5" HANDLING EQUIPMENT
10:45	11:15	0.50	UnPlanned	HAD TO REPLACE THE CLAMP HYD. LINE TO THE ST-80
11:15	11:45	0.50	Planned	TRIPPED OUT OF THE HOLE WITH 5" DRILL PIPE FROM 2,625' TO 1,115' - BHA MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 14.1 BBLS - ACTUAL FILL: 17 BBLS - AVERAGE TRIP SPEED: 3,025' FPH - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN
11:45	13:45	2.00	Planned	HELD PJSM WITH RIG CREW ON HANDLING AND CHANGING OUT BHA'S - STOOD BACK 6 STANDS OF 5" HWDP AN3 STANDS OF 6.5" DRILL COLLARS - PICKED UP TO TOP MONEL, BROKE IT OFF, PULLED MWD TOOL AND LAID THE MONEL DOWN. PICKED UP LOWER MONEL, STAB, SHOCK SUB AND MOTOR, DRAINED AND CHECK THE MOTOR - MOTOR TESTED GOOD AND BROKE THE BIT OFF. MADE UP NEW BIT, INSTALLED MWD TOOL, PICKED UP TOP MONEL. MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 23.5 BBLS - ACTUAL FILL: 26 BBLS NOTE: FUNCTION TESTED BLIND RAMS.
13:45	14:30	0.75	UnPlanned	TOP DRIVE LINK TILT BLEW A HYD. LINE. REPLACED HYD. LINE AND CHANGED OUT ACTUATOR ON THE IBOP.
14:30	15:00	0.50	Planned	FINISHED TRIPPING IN THE HOLE WITH BHA F/ 114' T/ 1,115' MOMITORING DISPLACEMENT ON TRIP TANKS - CALCULATED DISPLACEMENT: 24 BBLS. - ACTUAL DISPLACEMENT: 27 BBLS.



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 09/02/2016

Daily Cost \$55,667

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			\$3,500
830.020	Staking & Surveying			\$3,000
830.030	Road, Locations			\$60,500
830.035	Mobilization/Demobilization			\$100,000
830.040	Daywork Contract	14 K A Day (\$583.33 Per H)	\$14,000	\$185,042
830.050	Mouse/Rathole/Conduct Pipe			\$12,000
830.055	Directional Drilling & Survey			\$7,700
830.060	Bits, Tools, Stabalizers		\$9,500	\$36,000
830.065	Fuel, Power		\$1,502	\$65,468
830.070	Equipment Rental		\$7,177	\$57,252
830.071	Hot Shot Trucking			\$3,763
830.075	Mud & Chemicals		\$17,887	\$143,466
830.080	Mud Logging		\$1,800	\$14,400
830.090	Core Analysis			
830.095	Openhole Logging			
830.100	Cement Services			\$18,864
830.110	Casing Crew & Equipment			\$2,852
830.120	Contract Labor			\$14,176
830.160	Fishing Services			
830.165	Drill Water			\$36,300
830.175	Supervision		\$3,800	\$41,800
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs			\$4,644
840.100	Cement Services (4-1/2" Liner)			
Total Intangible			\$55,667	\$810,726

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"			\$17,169
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			\$50,000
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible				\$67,169
Total Costs			\$55,667	\$877,895



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/03/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	15
Location		Supervisor 2		DFS	11
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.AFE		
KB		Daily Footage	893	Daily Cost	\$50,218.04
Depth (MD)	10,273	TVD at Bit	10,273	Cum. Cost	\$928,113.14
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.5
FV	42
PV	9
YP	15
LCM (ppb)	0.5
Chlorides	82000
% Solids	4.19
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
10,113'	4.13°	218.90°

Drilling Parameters

Max WOB	40
Max RPM	50
Max Torque	10.5
Max Pull	245
Bkgrnd Gas	250
Max Gas	925
Cnx Gas	650
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	8.75
Motor	35.18'	2.75	7.00
Shock Sub	11.50'	2.50	6.38
Stabilizer	6.32'	2.56	6.56
Sub	3.67'	2.88	6.63
Monel Collar	27.96'	2.88	6.50
Monel Collar	28.29'	2.88	6.50
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	737.83'	2.94	6.50
Total Length:	1115.87		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'	8,220'	772'	29.8	26.0	2-4-BT-SH-I-X-CT-ROP
4	8.75	SMITH	Z713	JM0172	7X12	8,220'	9,018'	798'	31.0	26.0	2-2-CT-A-I-X-WT-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 9,380' T/ 9,520' - 140'</p> <p>- AROP: 35 FPH - WOB: 25 - 38 KLBS - STRING RPM: 30 - 60 - MOTOR RPM: 97 - FLOW: 650 GPM - DIFF: 100 - 375 PSI - ON-BTM PSI: 3,750 PSI - OFF-BTM PSI: 3,550 PSI - ON-BTM TRQ: 7.0 - 9.5 - OFF-BTM TRQ: 2.5 - 3.5 - M/W: IN - 9.5 / 40 - PH: 11.0 - M/W OUT - 9.5 / 40 - PH: 11.0 - BBG GAS: 125 - CONNECTION GAS: 350</p> <p>SURVEY AT: 9,265', INC - 1.9°, AZM - 32.4 °, TVD - 9,263.25'</p> <p>- FORMATION DRILLED: 1ST BONE SPRING LIME AND BONE SPRINGS SAND FORMATION.</p> <p>NOTE: THE BONE SPRING SAND FORMATION CAME IN AT 9,400'</p> <p>NOTE: SAMPLE AT 9,470' SHOWS 90% LS AND 10% SH</p>
10:00	12:45	2.75	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 9,520' T/ 9,624' - 104'</p> <p>- AROP: 38 FPH - WOB: 30 - 35 KLBS - STRING RPM: 30 - 50 - MOTOR RPM: 97 - FLOW: 650 GPM - DIFF: 150 - 325 PSI - ON-BTM PSI: 3,950 PSI - OFF-BTM PSI: 3,725 PSI - ON-BTM TRQ: 7.5 - 10.5 - OFF-BTM TRQ: 3.5 - 4.5 - M/W: IN - 9.6 / 42 - PH: 11.0 - M/W OUT - 9.5+ / 42 - PH: 11.0 - BBG GAS: 225 - CONNECTION GAS: 300</p> <p>SURVEY AT: 9,453', INC - 1.5°, AZM - 38.9 °, TVD - 9,451.15'</p> <p>- FORMATION DRILLED: 1ST BONE SPRINGS SAND FORMATION.</p> <p>NOTE: SAMPLE AT 9,560' SHOWS 60% LS AND 40% SH</p>
12:45	13:15	0.50	Planned	PERFORMED RIG, TOP DRIVE AND DRAW WORK SERVICE.
13:15	17:15	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 9,624' T/ 9,801' - 177'</p> <p>- AROP: 44 FPH - WOB: 30 - 38 KLBS - STRING RPM: 35 - 50 - MOTOR RPM: 97 - FLOW: 650 GPM - DIFF: 150 - 500 PSI - ON-BTM PSI: 4,000 PSI - OFF-BTM PSI: 3,700 PSI - ON-BTM TRQ: 7.0 - 9.5 - OFF-BTM TRQ: 3.0 - 4.5 - M/W: IN - 9.4 / 47 - PH: 10.0 - M/W OUT - 9.5 / 42 - PH: 10.0 - BBG GAS: 225 - CONNECTION GAS: 300</p> <p>SURVEY AT: 9,641', INC - 0.5°, AZM - 126.62 °, TVD - 9,639.13'</p> <p>- FORMATION DRILLED: 1ST BONE SPRINGS SAND FORMATION.</p> <p>NOTE: SAMPLE AT 9,710' SHOWS 25% LS AND 75% SH</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/04/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	16
Location		Supervisor 2		DFS	12
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	327	Daily Cost	\$65,703.20
Depth (MD)	10,600	TVD at Bit	10,600	Cum. Cost	\$996,016.34
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.55
FV	51
PV	10
YP	15
LCM (ppb)	0.5
Chlorides	83000
% Solids	4.29
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
10,488'	4.60°	239.40°

Drilling Parameters

Max WOB	45
Max RPM	60
Max Torque	10.5
Max Pull	250
Bkgrnd Gas	1262
Max Gas	1873
Cnx Gas	1400
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	8.75
Motor	35.20'	2.75	7.00
Shock Sub	11.50'	2.50	6.38
Stabilizer	6.32'	2.56	6.56
Sub	3.67'	2.88	6.63
Monel Collar	27.96'	2.88	6.50
Monel Collar	28.29'	2.88	6.50
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	737.83'	2.94	6.50
Total Length:	1115.89		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'	8,220'	772'	29.8	26.0	2-4-BT-SH-I-X-CT-ROP
4	8.75	SMITH	Z713	JM0172	7X12	8,220'	9,018'	798'	31.0	26.0	2-2-CT-A-I-X-WT-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	08:30	2.50	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 10,273' T/ 10,376' - 103'</p> <p>- AROP: 41 FPH - WOB: 30 - 35 KLBS - STRING RPM: 45 - 50 - MOTOR RPM: 97 - FLOW: 650 GPM - DIFF: 125 - 275 PSI - ON-BTM PSI: 3,725 PSI - OFF-BTM PSI: 3,550 PSI - ON-BTM TRQ: 8.0 - 10.5 - OFF-BTM TRQ: 4.0 - 5.5 - M/W: IN - 9.3+ / 41 - PH: 11.0 - M/W OUT - 9.3+ / 43 - PH: 11.0 - BBG GAS: 625 - CONNECTION GAS: 675</p> <p>SURVEY AT: 10,207', INC - 5.1°, AZM - 223.2°, TVD - 10,204.61'</p> <p>- FORMATION DRILLED: 2ND BONE SPRINGS LM AND 2ND BONE SPRINGS SAND FORMATIONS.</p> <p>NOTE: THE 2ND BONE SPRINGS SAND TOP CAME IN AT 10,336'</p> <p>NOTE: SAMPLE AT 10,310' SHOWS 90% LS AND 10% SH</p>
08:30	09:00	0.50	Planned	PERFORMED RIG SERVICE - HAD TO TIGHTEN THE GOOSE NECK ON THE STAND PIPE IN THE DERRICK.
09:00	13:00	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 10,376' T/ 10,505' - 129'</p> <p>- AROP: 32 FPH - WOB: 30 - 35 KLBS - STRING RPM: 45 - 65 - MOTOR RPM: 97 - FLOW: 650 GPM - DIFF: 100 - 300 PSI - ON-BTM PSI: 3,900 PSI - OFF-BTM PSI: 3,650 PSI - ON-BTM TRQ: 8.5 - 10.0 - OFF-BTM TRQ: 4.5 - 6.0 - M/W: IN - 9.4+ / 41 - PH: 10.5 - M/W OUT - 9.5 / 43 - PH: 10.5 - BBG GAS: 675 - CONNECTION GAS: 935</p> <p>SURVEY AT: 10,394', INC - 4.7°, AZM - 228.6°, TVD - 10,390.91'</p> <p>- FORMATION DRILLED: 2ND BONE SPRING SD AND 3RD BONE SPRING LM FORMATIONS.</p> <p>NOTE: THE 3RD BONE SPRING LM TOP CAME IN AT 10,412'</p> <p>NOTE: SAMPLE AT 10,430' SHOWS 75% LS, 20% SH AND 5% DOL</p>
13:00	17:00	4.00	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 10,505' T/ 10,576' - 71'</p> <p>- AROP: 18 FPH - WOB: 30 - 45 KLBS - STRING RPM: 30 - 60 - MOTOR RPM: 97 - FLOW: 650 GPM - DIFF: 100 - 425 PSI - ON-BTM PSI: 3,925 PSI - OFF-BTM PSI: 3,675 PSI - ON-BTM TRQ: 7.5 - 9.5 - OFF-BTM TRQ: 4.0 - 5.0 - M/W: IN - 9.4+ / 48 - PH: 10.5 - M/W OUT - 9.4 / 45 - PH: 10.5 - BBG GAS: 475 - CONNECTION GAS: 650</p> <p>SURVEY AT: 10,488', INC - 4.6°, AZM - 239.4°, TVD - 10,484.61'</p> <p>- FORMATION DRILLED: 3RD BONE SPRING LM FORMATIONS.</p> <p>NOTE: SAMPLE AT 10,550' SHOWS 80% LS, 10% SH AND 10% DOL</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/05/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	17
Location		Supervisor 2		DFS	13
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	175	Daily Cost	\$29,616.52
Depth (MD)	10,775	TVD at Bit	10,775	Cum. Cost	\$1,056,878.92
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.6
FV	46
PV	11
YP	15
LCM (ppb)	0.25
Chlorides	104000
% Solids	3.25
Daily Losses	
Total Losses	0

Last Survey

Depth	Inc	Azi
10,677'	4.20°	245.60°

Drilling Parameters

Max WOB	50
Max RPM	135
Max Torque	10.5
Max Pull	255
Bkgrnd Gas	650
Max Gas	1320
Cnx Gas	1250
Trip Gas	6025

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	8.75
Motor	35.20'	2.75	7.00
Shock Sub	11.50'	2.50	6.38
Stabilizer	6.32'	2.56	6.56
Sub	3.67'	2.88	6.63
Monel Collar	27.96'	2.88	6.50
Monel Collar	28.29'	2.88	6.50
Drill Collar	260.52'	2.50	6.50
X-Over	3.60'	2.50	6.38
Drill Pipe	737.83'	2.94	6.50
Total Length:	1115.89		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'	8,220'	772'	29.8	26.0	2-4-BT-SH-I-X-CT-ROP
4	8.75	SMITH	Z713	JM0172	7X12	8,220'	9,018'	798'	31.0	26.0	2-2-CT-A-I-X-WT-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	11:00	5.00	Planned	<p>TRIPPED IN THE HOLE WITH 5" AND 4.5" DRILL PIPE F/ 1,150' T/ 10,540' - 9,357'</p> <p>MOMITORING DISPLACEMENT ON TRIP TANKS - CALCULATED DISPLACMENT: 184 BBLs. - ACTUAL DISPLACEMENT: 191 BBLs.</p> <p>AVERAGE TRIP SPEED: 1,875' FPH - FILL PIPE EVERY 30 STANDS.</p> <p>NOTE: CHECKED MWD TOOL EVRY TIME WE FILL PIPE TO MAKE SURE IT WAS STILL PULSING.</p> <p>NOTE: INSTALLED THE ROTATING RUBBER AND CHANGE OVER TO 4.5" HANDLING TOOLS AT 2,625'</p> <p>NOTE: CONDUCTED A TRIP BOP DRILL WITH NIGHT CREW.</p>
11:00	11:45	0.75	Planned	<p>WASHED AND REAMED THE LAST 60' DOWN F/ 10,540' T/ 10,600'</p> <p>CIRCULATED TO CATCH THE HEAVY MUD.</p>
11:45	16:00	4.25	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 10,600' T/ 10,645' - 45'</p> <p>- AROP: 11 FPH - STRING RPM: 110 - 125 - FLOW: 550 - 600 GPM - ON-BTM PSI: 4,150 PSI - ON-BTM TRQ: 9.0 - 10.5 - M/W: IN - 9.6+ / 40 - PH: 10.5 - BBG GAS: 625</p> <p>- WOB: 25 - 35 KLBS - MOTOR RPM: 83 - 90 - DIFF: 50 - 250 PSI - OFF-BTM PSI: 3,925 PSI - OFF-BTM TRQ: 4.0 - 5.0 - M/W OUT - 9.6+ / 39 - PH: 10.5 - CONNECTION GAS: 0</p> <p>SURVEY AT: 10,488', INC - 4.6°, AZM - 239.4 °, TVD - 10,484.61'</p> <p>- FORMATION DRILLED: 3RD BONE SPRING LM FORMATIONS.</p> <p>NOTE: SAMPLE AT 10,610' SHOWS 60% LS, 20% SH AND 20% DOL</p>
16:00	17:15	1.25	Drilling	<p>DRILLED 8.75" VERTICAL SECTION F/ 10,645' T/ 10,659' - 14'</p> <p>- AROP: 12 FPH - STRING RPM: 125 - 135 - FLOW: 575 - 600 GPM - ON-BTM PSI: 4,200 PSI - ON-BTM TRQ: 9.5 - 10.5 - M/W: IN - 9.6+ / 50 - PH: 11.0 - BBG GAS: 625</p> <p>- WOB: 35 - 40 KLBS - MOTOR RPM: 83 - 90 - DIFF: 50 - 200 PSI - OFF-BTM PSI: 4,125 PSI - OFF-BTM TRQ: 4.0 - 5.0 - M/W OUT - 9.6+ / 42 - PH: 10.5 - CONNECTION GAS: 0</p> <p>- FORMATION DRILLED: 3RD BONE SPRING LM FORMATIONS.</p> <p>NOTE: SAMPLE AT 10,640' SHOWS 65% LS AND 20% DOL</p>
17:15	19:00	1.75	UnPlanned	<p>DURING A CONNECTION DRILLER KICK THE PUMPS ON AND FOUND A SWAB BLOWN IN #2 PUMP. WENT TO SHUT THE #2 PUMP IN AND FOUND THE 4" ISOLATION VALVE WAS WASHED. WE RACKED THE STAND BACK AND WORKED THE PIPE EVERY 5 MIN. WHILE REPAIRING THE 4" ISOLATION VALVE AND CHANGING OUT THE SWAB.</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/06/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	18
Location		Supervisor 2		DFS	14
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	519	Daily Cost	\$32,245.47
Depth (MD)	11,294	TVD at Bit	11,294	Cum. Cost	\$1,089,124.39
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.8
FV	48
PV	13
YP	11
LCM (ppb)	0.25
Chlorides	88000
% Solids	4.04
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
11,174'	24.40°	244.70°

Drilling Parameters

Max WOB	30
Max RPM	30
Max Torque	8.5
Max Pull	255
Bkgrnd Gas	1625
Max Gas	2230
Cnx Gas	1975
Trip Gas	2815

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	8.75
Motor	29.29'	2.75	6.78
Monel Collar	10.67'	2.08	6.36
Sub	3.67'	2.88	6.63
Monel Collar	27.96'	2.81	6.50
Monel Collar	28.29'	2.88	6.50
Sub	3.60'	2.75	6.50
Drill Pipe	941.34'	4.00	5.00
Drill Pipe	737.83'	3.00	5.00
Total Length:	1783.65		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			----I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'	8,220'	772'	29.8	26.0	2-4-BT-SH-I-X-CT-ROP
4	8.75	SMITH	Z713	JM0172	7X12	8,220'	9,018'	798'	31.0	26.0	2-2-CT-A-I-X-WT-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	07:00	1.00	Planned	TRIPPED OUT OF THE HOLE WITH 4.5" DRILL PIPE FROM 4,548' TO 2,625' MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 12.4 BBLS - ACTUAL FILL: 14 BBLS - AVERAGE TRIP SPEED: 1,925' FPH - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN. NOTE: PULLED ROTATING HEAD AT 2,625', CONDUCTED FLOW CHECK - WELL STATIC AND SWITCHED OVER TO 5" HANDLING EQUIPMENT
07:00	07:30	0.50	Planned	TRIPPED OUT OF THE HOLE WITH 5" DRILL PIPE FROM 2,625' TO 1,115' - BHA MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 14.1 BBLS - ACTUAL FILL: 15 BBLS - AVERAGE TRIP SPEED: 3,025' FPH - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN
07:30	10:00	2.50	Planned	HELD PJSM WITH RIG CREW ON HANDLING AND CHANGING OUT BHA'S - STOOD BACK 8 STANDS OF 5" HWDP AND LAID DOWN 9 JOINTS OF 6.5" DRILL COLLARS, MONEL - PULLED MWD TOOL AND LAID THE LOWER MONEL, STAB, SHOCK SUB AND MOTOR DOWN. MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 23.5 BBLS - ACTUAL FILL: 26 BBLS NOTE: FUNCTION TESTED BLIND RAMS.
10:00	11:30	1.50	Planned	PICKED UP AND MADE UP CURVE BHA AS FOLLOWS: - BIT (SMITH SDI 613, 6x18 = 1.491 TFA) - MOTOR (WRT 4/5, 8.3, 1.04 RPG, 2.12, BIT TO BEND 4.48') - NM PONY DRILL COLLAR - UBHO - 2 NMDC'S - X-O NOTE: SCRIBED AND INSTALLED MWD, SURFACE TESTED MWD TOOL - TESTED GOOD. PICKED UP AND MADE UP THE BIT.

24 Hour Plan Forward:

FINISH P.O.O.H., CHANGE BHA'S, T.I.H., START TO BUILD CURVE

Safety					Fuel						
Last BOP Test	08/22/2016	Last BOP Drill	09/05/2016	Last Function Test	9/5/2016	Diesel Used	1,592	Diesel Recvd		Diesel on Loc	9,463



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/07/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	19
Location		Supervisor 2	BILLY LALONDE	DFS	15
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	806	Daily Cost	\$38,781.28
Depth (MD)	12,100	TVD at Bit	11,586	Cum. Cost	\$1,144,371.38
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		930'	

Mud Properties

Type	MMO
Weight	9.8
FV	77
PV	15
YP	22
LCM (ppb)	0.25
Chlorides	104000
% Solids	3.25
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
11,645'	64.20°	249.40°

Drilling Parameters

Max WOB	30
Max RPM	30
Max Torque	4
Max Pull	255
Bkgrnd Gas	1800
Max Gas	1800
Cnx Gas	1800
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	1.00'	2.00	8.75
Motor	29.29'	2.75	6.78
Monel Collar	10.67'	2.08	6.36
Sub	3.67'	2.88	6.63
Monel Collar	27.96'	2.81	6.50
Monel Collar	28.29'	2.88	6.50
Sub	3.60'	2.75	6.50
Drill Pipe	941.34'	4.00	5.00
Drill Pipe	737.83'	3.00	5.00
Total Length:	1783.65		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
1	17.5	Smith	506		22, 22, 22	100'	929'	829'			---I-X--TD
2	12.25	SMITH	STING BLADE	JM2300	6X12	972'	7,448'	6,476'	96.0	67.0	2-7-BT-S-I-X-CR-ROP
3	12.25	SMITH	SDSI 616 MEPX	JM1328	6X12	7,448'	8,220'	772'	29.8	26.0	2-4-BT-SH-I-X-CT-ROP
4	8.75	SMITH	Z713	JM0172	7X12	8,220'	9,018'	798'	31.0	26.0	2-2-CT-A-I-X-WT-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	07:00	1.00	Drilling	DRILLED 8 3/4" CURVE SECTION F/ 11,294' T/ 11,330' MD - 36' - ROTATE FOOTAGE: 0' - AVERAGE ROP: 36' - STRING RPM: 0 RPM - FLOW: 450 - 500 GPM - ON-BTM PSI: 2,025 PSI - TORQUE ON BTM: 0 FT/LBS - MUD WEIGHT IN: 9.6 / 85 - SLIDE FOOTAGE: 36' - WOB: 20 - 25 KLBS - MOTOR RPM: 468 - 520 RPM - DIFF: 325 - 650 PSI - OFF-BTM PSI: 1,825 PSI - TORQUE OFF BTM: 0 - MUD WEIGHT OUT: 9.5+ / 75 - FORMATION DRILLED: 3RD BONE SPRINGS SD FORMATION. NOTE: SAMPLE AT 11,310' SHOWS 50% LS AND 50% SH
07:00	07:45	0.75	UnPlanned	WENT TO PUT THE BUSTER ON LINE AND FOUND THE ROTATING HEAD RUBBER WAS NOT SEALING. CHANGED OUT ROTATING HEADS.
07:45	12:00	4.25	Drilling	DRILLED 8 3/4" CURVE SECTION F/ 11,294' T/ 11,436' MD - 142' - ROTATE FOOTAGE: 0' - AVERAGE ROP: 33' - STRING RPM: 0 RPM - FLOW: 450 - 500 GPM - ON-BTM PSI: 1,850 PSI - TORQUE ON BTM: 0 FT/LBS - MUD WEIGHT IN: 9.9 / 59 - SLIDE FOOTAGE: 142' - WOB: 15 - 25 KLBS - MOTOR RPM: 468 - 520 RPM - DIFF: 200 - 450 PSI - OFF-BTM PSI: 1,425 PSI - TORQUE OFF BTM: 0 - MUD WEIGHT OUT: 9.9 / 62 - FORMATION DRILLED: 3RD BONE SPRINGS SD FORMATION. NOTE: SAMPLE AT 11,300' SHOWS 80% LS AND 20% SH - SURVEY DEPTH: 11,362' INC: 40.50° AZM: 244.70° TVD: 11,309.80 - MOTOR YIELD: 9.63° / 100' FT - BUR NEEDED TO LAND: 7.64° / 100' FT - ABOVE / BELOW TARGET LINE: 86' BELOW - RIGHT / LEFT OF TARGET LINE: 30' RIGHT NOTE: SURVEY EVERY 90' WHILE BUILDING THE CURVE SECTION.
12:00	16:00	4.00	Drilling	DRILLED 8 3/4" CURVE SECTION F/ 11,436' T/ 11,521' MD - 85' - ROTATE FOOTAGE: 0' - AVERAGE ROP: 22' - STRING RPM: 0 RPM - FLOW: 450 - 500 GPM - ON-BTM PSI: 1,775 PSI - TORQUE ON BTM: 0 FT/LBS - MUD WEIGHT IN: 9.9 / 58 - SLIDE FOOTAGE: 85' - WOB: 15 - 25 KLBS - MOTOR RPM: 468 - 520 RPM - DIFF: 200 - 350 PSI - OFF-BTM PSI: 1,325 PSI - TORQUE OFF BTM: 0 - MUD WEIGHT OUT: 9.9 / 58 - FORMATION DRILLED: 3RD BONE SPRINGS SD FORMATION. NOTE: SAMPLE AT 11,450' SHOWS 5% LS AND 95% SH - SURVEY DEPTH: 11,457' INC: 48.50° AZM: 247.80° TVD: 11,377.51 - MOTOR YIELD: 8.72° / 100' FT - BUR NEEDED TO LAND: 7.53° / 100' FT - ABOVE / BELOW TARGET LINE: 64' BELOW - RIGHT / LEFT OF TARGET LINE: 36' RIGHT NOTE: SURVEY EVERY 90' WHILE BUILDING THE CURVE SECTION.

Total Hours:	24			
24 Hour Activity Summary:				
Drilled T/12,331', Circulate sweep around, P.O.O.H, Lay down 5" drill pipe, B/O bit and lay down BHA,R/U casing crew,				
24 Hour Plan Forward:				
P.O.O.H, Run casing, Cement casing				
Safety				
Last BOP Test	08/22/2016	Last BOP Drill	09/06/2016	Last Function Test 9/8/2016
		Fuel		
Diesel Used	1,900	Diesel Recvd	7,200	Diesel on Loc 14,763



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 09/09/2016

Daily Cost \$52,200

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			\$3,500
830.020	Staking & Surveying			\$3,000
830.030	Road, Locations			\$60,500
830.035	Mobilization/Demobilization			\$100,000
830.040	Daywork Contract	14 K A Day (\$583.33 Per H)	\$14,000	\$280,708
830.050	Mouse/Rathole/Conduct Pipe			\$12,000
830.055	Directional Drilling & Survey			\$31,496
830.060	Bits, Tools, Stabalizers	2 -8.75 bits	\$19,000	\$74,000
830.065	Fuel, Power			\$89,338
830.070	Equipment Rental		\$12,857	\$104,711
830.071	Hot Shot Trucking			\$3,763
830.075	Mud & Chemicals		\$68	\$197,422
830.080	Mud Logging		\$1,800	\$27,000
830.090	Core Analysis			
830.095	Openhole Logging			\$3,250
830.100	Cement Services			\$18,864
830.110	Casing Crew & Equipment			\$2,852
830.120	Contract Labor		\$675	\$57,910
830.160	Fishing Services			
830.165	Drill Water			\$36,300
830.175	Supervision		\$3,800	\$68,400
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs			\$7,088
840.100	Cement Services (4-1/2" Liner)			
Total Intangible			\$52,200	\$1,182,101

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"			\$17,169
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			\$50,000
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible				\$67,169
Total Costs			\$52,200	\$1,249,269



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/12/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	24
Location		Supervisor 2	PAUL STERNADEL	DFS	20
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	1,529	Daily Cost	\$56,230.05
Depth (MD)	13,860	TVD at Bit	11,566	Cum. Cost	\$1,527,421.32
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	10.4
FV	33
PV	8
YP	7
LCM (ppb)	
Chlorides	83000
% Solids	7
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	28000
Max RPM	90
Max Torque	14000
Max Pull	240000
Bkgrnd Gas	555
Max Gas	3233
Cnx Gas	3233
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.21'		4.87
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Shock Sub	16.88'	2.50	4.76
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.27'		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
8	6	SMITH	MDI611	JK5202	14,13,12	12,331'	13,860'	1,529'	24.0	64.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	07:00	1.00	Planned	DRILLED CEMENT, PLUG, FLOAT SHOE F/ 12,315' T/ 12,331' NOTE: SHOE @ 12,317'
07:00	11:00	4.00	Drilling	DRILLED 6" LATERAL F/ 12,331' T/ 12,523' - 192' - AROP: 48.0 FPH - WOB: 10-12 KLBS - STRING RPM: 50 - MOTOR RPM: 125 - FLOW: 240 GPM - DIFF: 400 - 600 PSI - ON-BTM PSI: 2850PSI - OFF-BTM PSI: 2260 PSI - ON-BTM TRQ: 12 - 13 - OFF-BTM TRQ: 7.0 - 8.0 - M/W: IN - 10.4 / 33 - M/W OUT - 10.3 / 33 - BBG: 598 UNITS - CONN GAS: 3233 UNITS SURVEY AT: 12,489', INC - 91.86, AZM - 254.82°, TVD - 11,577.0 - 38.0 ABOVE AND 48.0' RIGHT OF TARGET LINE LAST SAMPLE AT 12,450' SHOWED 50% SHALE, 50% LIME ST
11:00	16:00	5.00	Drilling	DRILLED 6" LATERAL F/ 12,523' T/ 12,897' - 374' - AROP: 74.8 FPH - WOB: 10-12 KLBS - STRING RPM: 70 - MOTOR RPM: 125 - FLOW: 240 GPM - DIFF: 400 - 600 PSI - ON-BTM PSI: 2850PSI - OFF-BTM PSI: 2260 PSI - ON-BTM TRQ: 11 - 12 - OFF-BTM TRQ: 7.0 - 8.0 - M/W: IN - 10.4 / 33 - M/W OUT - 10.3 / 33 - BBG: 653 UNITS - CONN GAS: 2700 UNITS MD: 12860 / INC: 90.62 / AZ: 253.23 / TVD: 11572.73 / VS: 1432.29 / N-S: 383.77 / S / E-W: 1381.05 / W / DLS: 1.58 / TEMP: 155.2 / HIGH-LOW: 39A / LEFT-RIGHT: 56R LAST SAMPLE AT 12,450' SHOWED 50% SHALE, 50% LIME ST
16:00	16:30	0.50	Planned	SERVICE RIG / TOP DRIVE & SWIVEL PACKING
16:30	20:00	3.50	Drilling	DRILLED 6" LATERAL F/ 12,897 TO 13,080' - 183' - AROP: 45.75 FPH - WOB: 12-15 KLBS - STRING RPM: 80 - MOTOR RPM: 135 - FLOW: 240 GPM - DIFF: 400 - 600 PSI - ON-BTM PSI: 2850PSI - OFF-BTM PSI: 2260 PSI - ON-BTM TRQ: 9 - 11 - OFF-BTM TRQ: 7.0 - 8.0 - M/W: IN - 10.2 / 33 - M/W OUT - 10.2 / 33 - BBG: 555 UNITS - CONN GAS: 2700 UNITS MD: 13046 / INC: 90.78 / AZ: 251.31 / TVD: 11570.53 / VS: 1618.27 / N-S: 439.94 / S / E-W: 1558.34 / W / DLS: 1.36 / TEMP: 159.0 / HIGH-LOW: 40A / LEFT-RIGHT: 57R LAST SAMPLE AT 12,450' SHOWED 30% SHALE, 70% LIME ST

20:00	00:00	4.00	Drilling	<p>DRILLED 6" LATERAL F/ 13,080' TO 13,375'- 295'</p> <p>- AROP: 73.75 FPH - WOB: 18-22 KLBS - STRING RPM: 90 - MOTOR RPM: 145 - FLOW: 240 GPM - DIFF: 400 - 650 PSI - ON-BTM PSI: 3025PSI - OFF-BTM PSI: 2260 PSI - ON-BTM TRQ: 9 - 12 - OFF-BTM TRQ: 7.0 - 8.0 - M/W: IN - 10.2 / 33 - M/W OUT - 10.1 / 33 - BBG: 502 UNITS - CONN GAS: 2700 UNITS</p> <p>MD: 13330 / INC: 90.78 / AZ: 251.87 / TVD: 11567.18 / VS: 1902.19 / N-S: 532.12 S / E-W: 1826.94 W / DLS: 1.29 / TEMP: 0.0 / HIGH-LOW: 40A / LEFT-RIGHT: 51R</p> <p>LAST SAMPLE AT 13,300' SHOWED 90% SHALE, 10% LIME ST</p>							
00:00	01:00	1.00	Drilling	<p>DRILLED 6" LATERAL F/ 13,375' TO 13,470'- 95'</p> <p>- AROP: 95 FPH - WOB: 18-22 KLBS - STRING RPM: 90 - MOTOR RPM: 145 - FLOW: 240 GPM - DIFF: 400 - 650 PSI - ON-BTM PSI: 3377PSI - OFF-BTM PSI: 2750 PSI - ON-BTM TRQ: 9 - 12 - OFF-BTM TRQ: 7.0 - 8.0 - M/W: IN - 10.2 / 33 - M/W OUT - 10.1 / 33 - BBG: 1300 UNITS - CONN GAS: 2030 UNITS</p> <p>MD: 13425 / INC: 89.95 / AZ: 250.88 / TVD: 11566.57 / VS: 1997.17 / N-S: 562.46 S / E-W: 1916.96 W / DLS: 1.36 / TEMP: 162.5 / HIGH-LOW: 40A / LEFT-RIGHT: 50R</p> <p>LAST SAMPLE AT 13,300' SHOWED 90% SHALE, 10% LIME ST</p>							
01:00	01:30	0.50	Drilling	<p>PROBLEM GETTING SURVEY, RECYCLED #2 PUMP 3 TIMES, AND RECYCLED #1 PUMP 3 TIMES TO GET SURVEY</p>							
01:30	06:00	4.50	Drilling	<p>DRILLED 6" LATERAL F/ 13,470' TO 13,860'- 390'</p> <p>- AROP: 86.6 FPH - WOB: 18-22 KLBS - STRING RPM: 90 - MOTOR RPM: 145 - FLOW: 240 GPM - DIFF: 400 - 650 PSI - ON-BTM PSI: 3542PSI - OFF-BTM PSI: 2892 PSI - ON-BTM TRQ: 9 - 12 - OFF-BTM TRQ: 7.0 - 8.0 - M/W: IN - 10.2 / 33 - M/W OUT - 10.2 / 33 - BBG: 1365 UNITS - CONN GAS: 2183 UNITS</p> <p>MD: 13709 / INC: 91.00 / AZ: 251.62 / TVD: 11566.43 / VS: 2281.08 / N-S: 655.66 S / E-W: 2185.22 W / DLS: 1.50 / TEMP: 169.7 / HIGH-LOW: 37A / LEFT-RIGHT: 43R</p> <p>LAST SAMPLE AT 13,800' SHOWED 80% SHALE, 20% LIME ST</p>							
Total Hours:		24									
24 Hour Activity Summary:											
DRILLED CEMENT, PLUG, FLOAT SHOE F/ 12,315' T/ 12,331' ,DRILLING 6" LATERAL											
24 Hour Plan Forward:											
DRILLING AHEAD TO A PLANED TD OF 22,196											
Safety				Fuel							
Last BOP Test	09/11/2016	Last BOP Drill	09/06/2016	Last Function Test	9/11/2016	Diesel Used	1,857	Diesel Recvd	6,389	Diesel on Loc	15,104



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/13/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	25
Location		Supervisor 2	PAUL STERNADEL	DFS	21
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	1,320	Daily Cost	\$44,673.41
Depth (MD)	15,180	TVD at Bit	11,571	Cum. Cost	\$1,572,094.73
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	10.4
FV	36
PV	11
YP	15
LCM (ppb)	
Chlorides	77000
% Solids	7.92
Daily Losses	
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	28000
Max RPM	90
Max Torque	11150
Max Pull	240000
Bkgrnd Gas	4250
Max Gas	5443
Cnx Gas	4675
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.21'		4.87
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Shock Sub	16.88'	2.50	4.76
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.27		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
8	6	SMITH	MDI611	JK5202	14,13,12	12,331'	15,180'	2,849'	36.0	79.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	13:30	7.50	Drilling	DRILLED 6" LATERAL F/ 13,860' TO 14,210'- 350' - AROP: 46.66 FPH - WOB: 18-25 KLBS - STRING RPM: 90 - MOTOR RPM: 145 - FLOW: 240 GPM - DIFF: 500 - 800 PSI - ON-BTM PSI: 3150PSI - OFF-BTM PSI: 2641 PSI - ON-BTM TRQ: 9 - 12 - OFF-BTM TRQ: 5.0 - 7.0 - M/W: IN - 10.4 / 39 - M/W OUT - 10.4 / 37 - BBG: 697 UNITS - CONN GAS: 1936 UNITS SURVEY AT: 14,087', INC - 89.88 , AZM - 251.52°, TVD - 11565.91' 33.0 ABOVE AND 36.0' RIGHT OF TARGET LINE LAST SAMPLE AT 14,100' SHOWED 40% SHALE, 60% LIME ST NOTE: HAND DRILLING DUE TO AUTO DRILLER GOING DOWN
13:30	14:00	0.50	Planned	PERFORMED RIG SERVICE
14:00	18:00	4.00	Drilling	DRILLED 6" LATERAL F/ 14,210' TO 14,404'- 194' - AROP: 48.5 FPH - WOB: 18-25 KLBS - STRING RPM: 90 - MOTOR RPM: 145 - FLOW: 240 GPM - DIFF: 500 - 800 PSI - ON-BTM PSI: 3400PSI - OFF-BTM PSI: 2900 PSI - ON-BTM TRQ: 9 - 12 - OFF-BTM TRQ: 5.0 - 7.0 - M/W: IN - 10.4 / 39 - M/W OUT - 10.4 / 37 - BBG: 697 UNITS - CONN GAS: 1936 UNITS SURVEY AT: 14,275', INC - 90.23 , AZM - 251.03°, TVD - 11565.32' 33.0 ABOVE AND 36.0' RIGHT OF TARGET LINE LAST SAMPLE AT 14,300' SHOWED 30% SHALE, 70% LIME ST NOTE: HAND DRILLING DUE TO AUTO DRILLER GOING DOWN
18:00	18:30	0.50	Planned	REPLACED CRAWLER WHEEL AND GEAR ASSEMBLY FOR AUTO DRILLER
18:30	00:00	5.50	Drilling	DRILLED 6" LATERAL F/ 14,404' TO 14,750'- 346' - AROP: 62.9 FPH - WOB: 18-25 KLBS - STRING RPM: 90 - MOTOR RPM: 145 - FLOW: 250 GPM - DIFF: 500 - 800 PSI - ON-BTM PSI: 3500 PSI - OFF-BTM PSI: 3100 PSI - ON-BTM TRQ: 9 - 12 - OFF-BTM TRQ: 5.0 - 7.0 - M/W: IN - 10.4 / 41 - M/W OUT - 10.4 / 39 - BBG: 4200 UNITS - CONN GAS: 4660 UNITS Survey @ MD: 14654 / INC: 89.81 / AZ: 250.4 / TVD: 11567.67 26.0 ABOVE AND 24.0' RIGHT OF TARGET LINE LAST SAMPLE AT 14,600' SHOWED 30% SHALE, 70% LIME ST



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/14/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	26
Location		Supervisor 2	PAUL STERNADEL	DFS	22
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	664	Daily Cost	\$37,482.00
Depth (MD)	15,844	TVD at Bit	11,566	Cum. Cost	\$1,609,576.73
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	10.6
FV	49
PV	16
YP	33
LCM (ppb)	
Chlorides	77000
% Solids	7.92
Daily Losses	
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	30000
Max RPM	115
Max Torque	18000
Max Pull	220
Bkgrnd Gas	3282
Max Gas	5750
Cnx Gas	5750
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.21'		4.87
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Shock Sub	16.88'	2.50	4.76
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.27		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
8	6	SMITH	MDI611	JK5202	14,13,12	12,331'	15,844'	3,513'	36.5	96.2	-----PR, DIFF,

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:30	4.50	Drilling	<p>DRILLED 6" LATERAL F/ 15,180' to 15,400' - 220'</p> <p>- AROP: 48.8 FPH - WOB: 12-22 KLBS - STRING RPM: 20 - 100 - MOTOR RPM: 215 - FLOW: 250 GPM - DIFF: 500 - 700 PSI - ON-BTM PSI: 3850 PSI - OFF-BTM PSI: 3100 PSI - ON-BTM TRQ: 10 - 12 - OFF-BTM TRQ: 5.0 - 7.0 - M/W: IN - 10.4 / 42 - M/W OUT - 10.4 / 42 - BBG: 5025 UNITS - CONN GAS: 5705 UNITS</p> <p>survey - MD: 15408 / INC: 89.84 / AZ: 253.02 / TVD: 11569.26 17.0 ABOVE AND 20.0' RIGHT OF TARGET LINE</p> <p>pumped 2 40 bbl high vis sweeps</p> <p>LAST SAMPLE AT 15,200' SHOWED 90% SHALE, 10% LIME ST</p>
10:30	14:00	3.50	Drilling	<p>DRILLED 6" LATERAL F/ 15,400' to 15,595' - 195'</p> <p>- AROP: 43.3 FPH - WOB: 12-22 KLBS - STRING RPM: 20 - 115 - MOTOR RPM: 245 - FLOW: 250 GPM - DIFF: 500 - 650 PSI - ON-BTM PSI: 4150 PSI - OFF-BTM PSI: 3550 PSI - ON-BTM TRQ: 10 - 12 - OFF-BTM TRQ: 5.0 - 7.0 - M/W: IN - 10.6 / 48 - M/W OUT - 10.6 / 428 - BBG: 3282 UNITS - CONN GAS: 5668 UNITS</p> <p>Survey @ MD: 15597 / INC: 90.34 / AZ: 252.86 / TVD: 11569.46 14.0 ABOVE AND 22.0' RIGHT OF TARGET LINE</p> <p>PUMPED 2 40 BBL HIGH VIS SWEEPS TO CLEAN HOLE</p> <p>LAST SAMPLE AT 15,595' SHOWED 50% SHALE, 50% LIME ST</p>
14:00	18:00	4.00	Drilling	<p>DRILLED 6" LATERAL F/ 15,595' TO 15,832' - 237'</p> <p>- AROP: 59.25 FPH - WOB: 20 - 30 KLBS - STRING RPM: 20 - 110 - MOTOR RPM: 245 - FLOW: 250 GPM - DIFF: 500 - 700 PSI - ON-BTM PSI: 4400 PSI - OFF-BTM PSI: 3700 PSI - ON-BTM TRQ: 10 - 12 - OFF-BTM TRQ: 5.0 - 7.0 - M/W: IN - 10.6 / 48 - M/W OUT - 10.6 / 428 - BBG: 3700 UNITS - CONN GAS: 5350 UNITS</p> <p>Survey @ MD: 15691 / INC: 91.20 / AZ: 253.65 / TVD: 11568.20 14.0 ABOVE AND 22.0' RIGHT OF TARGET LINE</p> <p>PUMPED 1 40 BBL HIGH VIS SWEEP TO CLEAN HOLE</p> <p>LAST SAMPLE AT 15,595' SHOWED 70% SHALE, 30% LIME ST</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/15/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	27
Location		Supervisor 2	PAUL STERNADEL	DFS	23
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	193	Daily Cost	\$45,921.00
Depth (MD)	16,037	TVD at Bit	11,566	Cum. Cost	\$1,655,497.73
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	10.8
FV	55
PV	16
YP	34
LCM (ppb)	
Chlorides	77000
% Solids	7.92
Daily Losses	
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	25000
Max RPM	81
Max Torque	9985
Max Pull	220
Bkgrnd Gas	1090
Max Gas	5650
Cnx Gas	3355
Trip Gas	3558

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.58'		4.81
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Shock Sub	16.88'	2.50	4.76
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.64		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
8	6	SMITH	MDI611	JK5202	14,13,12	12,331'	15,844'	3,513'	36.5	96.2	ED OUT-DBR-OUTER, SHO
9	6	SMITH	MDI611	JK5201	12,12,13	15,844'	16,037'	193'	3.5	55.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
				TRIPPED OUT OF THE HOLE F/ 2,200' TO BHA'
				MONITOR HOLE ON TRIP TANK: HOLE IS TAKING PROPER FILL
				- AVERAGE TRIP SPEED: 1,000' FPH
				- HOLE CONDITIONS: GOOD, NO OVER PULL SEEN
06:00	08:00	2.00	UnPlanned	
08:00	09:00	1.00	UnPlanned	HELD PRE JOB MEETING WITH DIRECTIONAL CREW AND RIG CREW, LAY DOWN BHA & BIT
				HELD PRE JOB MEETING WITH CREWS ON PICKING UP NEW BHA
09:00	11:30	2.50	UnPlanned	PICK UP NEW BHA & BIT SURFACE TEST MOTOR & MWD
				HELD SAFETY MEETING WITH CREW ON TRIPPING, TRIP IN HOLE F/ BHA TO 10,829' AVERAGE TRIP SPEED: 2,360' FPH
				SECURE WELL
11:30	16:00	4.50	UnPlanned	FILLING PIPE EVERY 30 STANDS
				HELD SAFETY STAND DOWN WITH EVERYONE ON LOCATION
16:00	17:30	1.50	UnPlanned	WELL WAS MONITORED ON TRIP TANK
				SAFETY MEETING WITH CREW ON SLIP AND CUTTING OF DRILLING LINE, SLIP AND CUT DRILLING LINE
17:30	19:30	2.00	UnPlanned	MONITORED WELL ON TRIP TANK
19:30	20:00	0.50	UnPlanned	SAFETY MEETING, INSTALL ROTATING HEAD ASSY, CALIBRATE BLOCK HEIGHT
				HELD SAFETY MEETING WITH CREW ON TRIPPING, TRIP IN HOLE F/ 10,829' TO 12,665'
				AVERAGE TRIP SPEED: 918' FPH
				FILL PIPE & TEST MWD
20:00	22:00	2.00	UnPlanned	FILLING PIPE EVERY 30 STANDS
				CONTINUE TRIP IN HOLE F/ 12,665' TO 15,305'
				AVERAGE TRIP SPEED: 2,638' FPH
22:00	23:30	1.50	UnPlanned	FILLING PIPE EVERY 30 STANDS
				FILL PIPE, ATTEMPT TO GET A SURVEY, PRESSURE SPIKED TO 4,540 PSI, WORKED DRILL STRING, PRESSURE CAME DOWN, RAISE GPM TO 180 TO 190, PRESSURE WENT TO 4,250 WORKING DRILL STRING EASING PRESSURE DOWN, BROUGHT GPM BACK ON TO 230, PRESSURE WENT TO 5,600 PSI KEPT WORKING DRILL STRING TO EASE THE PRESSURE AND CLEAN WELL BORE, BOTTOMS UP FLOW METER WAS FROM 0 TO 95% GOING THROUGH GAS BUSTER WELL CLEANED UP AND GAS OUT OF ANNULUS.
23:30	01:00	1.50	UnPlanned	
				CONTINUE TRIP IN HOLE F/ 15,305' TO 15,819'
				AVERAGE TRIP SPEED: 1,028' FPH
01:00	01:30	0.50	UnPlanned	
				ESTABLISH CIRC FLOW RATES, PUMP UP MWD SURVEY DOWN LINK RSS TOOL & RELOG LAST 25' @ 150 FT/HR PUMP SWEEP SO TO BE GOING AROUND BIT WHEN TAG UP FAN BOTTOM TO CLEAN ANY BROKEN CUTTERS OUT FROM LAST RUN
01:30	02:30	1.00	UnPlanned	



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/16/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	28
Location		Supervisor 2	PAUL STERNADEL	DFS	24
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	1,033	Daily Cost	\$37,482.00
Depth (MD)	17,070	TVD at Bit	11,567	Cum. Cost	\$1,709,243.00
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	11.5
FV	55
PV	16
YP	34
LCM (ppb)	
Chlorides	77000
% Solids	7.92
Daily Losses	
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	25000
Max RPM	100.00
Max Torque	11865
Max Pull	225000
Bkgrnd Gas	3648
Max Gas	5797
Cnx Gas	5797
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.58'		4.81
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Shock Sub	16.88'	2.50	4.76
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.64		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
8	6	SMITH	MDI611	JK5202	14,13,12	12,331'	15,844'	3,513'	36.5	96.2	ED OUT-DBR-OUTER, SHO
9	6	SMITH	MDI611	JK5201	12,12,13	15,844'	17,070'	1,226'	27.0	45.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	12:00	6.00	Drilling	<p>DRILLED 6" LATERAL F/ 16,037 TO 16,386' - 349'</p> <p>- AROP: 58.16 FPH - WOB: 20 - 25 KLBS - STRING RPM: 80 TO 100 - MOTOR RPM: 212 - FLOW: 231 GPM - DIFF: 500 TO 700 PSI - ON-BTM PSI: 5100 PSI - OFF-BTM PSI: 4857 PSI - ON-BTM TRQ: 7500 - 8500 - OFF-BTM TRQ: 5-7 - M/W: IN - 11.0 / 57 - M/W OUT - 11.0 / 53 - BBG: 792 UNITS - CONN GAS: 3355 UNITS</p> <p>Survey @ MD: 16350' / INC: 90.23' / AZ: 252.46' / TVD: 11566.63 9.0 ABOVE AND 26.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 16,300' SHOWED 90% SHALE, 10% LIME ST</p>
12:00	15:00	3.00	Drilling	<p>DRILLED 6" LATERAL F/ 16,386 TO 16,571' - 185'</p> <p>- AROP: 61.66 FPH - WOB: 15 - 25 KLBS - STRING RPM: 80 TO 100 - MOTOR RPM: 212 - FLOW: 250 GPM - DIFF: 500 TO 700 PSI - ON-BTM PSI: 5100 PSI - OFF-BTM PSI: 4857 PSI - ON-BTM TRQ: 7 - 8 - OFF-BTM TRQ: 5-7 - M/W: IN - 11.0 / 57 - M/W OUT - 11.0 / 53 - BBG: 792 UNITS - CONN GAS: 3355 UNITS</p> <p>Survey @ MD: 16538' / INC: 90.19' / AZ: 252.56' / TVD: 11565.94 8.0 ABOVE AND 26.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 16,500' SHOWED 65% SHALE, 35% LIME ST</p>
15:00	15:30	0.50	Planned	PERFORMED RIG SERVICE
15:30	18:00	2.50	Drilling	<p>DRILLED 6" LATERAL F/ 16,571 TO 16,667' - 96'</p> <p>- AROP: 38.4 FPH - WOB: 18 - 20 KLBS - STRING RPM: 80 TO 100 - MOTOR RPM: 125 - FLOW: 250 GPM - DIFF: 500 TO 700 PSI - ON-BTM PSI: 5400 PSI - OFF-BTM PSI: 4700 PSI - ON-BTM TRQ: 8 - 10 - OFF-BTM TRQ: 5-7 - M/W: IN - 11.0 / 59 - M/W OUT - 10.9 / 57 - BBG: 3648 UNITS - CONN GAS: 5797 UNITS</p> <p>Survey @ MD: 16633' / INC: 90.25' / AZ: 252.24' / TVD: 11565.58 9.0 ABOVE AND 27.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 16,500' SHOWED 65% SHALE, 35% LIME ST</p>
18:00	22:00	4.00	Drilling	<p>DRILLED 6" LATERAL F/ 16,667' TO 16,815' - 148'</p> <p>- AROP: 37 FPH - WOB: 18 - 20 KLBS - STRING RPM: 80 TO 100 - MOTOR RPM: 125 - FLOW: 250 GPM - DIFF: 500 TO 700 PSI - ON-BTM PSI: 5400 PSI - OFF-BTM PSI: 4700 PSI - ON-BTM TRQ: 8 - 10 - OFF-BTM TRQ: 5-7 - M/W: IN - 11.4 / 58 - M/W OUT - 11.3 / 57 - BBG: 2569 UNITS - CONN GAS: 3285 UNITS</p> <p>Survey @ MD: 16823' / INC: 88.91' / AZ: 252.31' / TVD: 11565.78 9.0 ABOVE AND 27.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 16,500' SHOWED 50% SHALE, 50% LIME ST</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/17/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	29
Location		Supervisor 2	PAUL STERNADEL	DFS	25
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	855	Daily Cost	\$38,390.20
Depth (MD)	17,925	TVD at Bit	11,567	Cum. Cost	\$1,748,958.20
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	11.4
FV	45
PV	17
YP	23
LCM (ppb)	
Chlorides	115000
% Solids	7.92
Daily Losses	150
Total Losses	150

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	25000
Max RPM	100.00
Max Torque	11950
Max Pull	265
Bkgrnd Gas	1850
Max Gas	5980
Cnx Gas	5550
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.58'		4.81
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Shock Sub	16.88'	2.50	4.76
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.64		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
8	6	SMITH	MDI611	JK5202	14,13,12	12,331'	15,844'	3,513'	36.5	96.2	ED OUT-DBR-OUTER, SHO
9	6	SMITH	MDI611	JK5201	12,12,13	15,844'	17,925'	2,081'	50.0	42.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	12:00	6.00	Drilling	<p>DRILLED 6" LATERAL F/ 17,070 - 17,280 - 210'</p> <p>- AROP: 35.0 FPH - WOB: 20 - 25 KLBS - STRING RPM: 80 TO 100 - MOTOR RPM: 125 - FLOW: 250 GPM - DIFF: 400 TO 600 PSI - ON-BTM PSI: 5120 PSI - OFF-BTM PSI: 4750 PSI - ON-BTM TRQ: 9 - 10 - OFF-BTM TRQ: 5-7 - M/W: IN - 11.6 / 45 - M/W OUT - 11.5 / 51 - BBG: 2912 UNITS - CONN GAS: 4852 UNITS</p> <p>Survey @ MD: 17294' / INC: 90.19' / AZ: 252.84' / TVD: 11570.62' 4.0 ABOVE AND 31.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 17,200' SHOWED 65% SHALE, 35% LIME ST</p>
12:00	16:30	4.50	Drilling	<p>DRILLED 6" LATERAL F/ 17,280 - 17,515 - 235'</p> <p>- AROP: 52.22 FPH - WOB: 15 - 25 KLBS - STRING RPM: 80 TO 100 - MOTOR RPM: 125 - FLOW: 230-250 GPM - DIFF: 400 TO 600 PSI - ON-BTM PSI: 5136 PSI - OFF-BTM PSI: 4762 PSI - ON-BTM TRQ: 9 - 10 - OFF-BTM TRQ: 5-7 - M/W: IN - 11.6 / 45 - M/W OUT - 11.5 / 51 - BBG: 2912 UNITS - CONN GAS: 4852 UNITS</p> <p>Survey @ MD: 17389' / INC: 90.82' / AZ: 252.73' / TVD: 11569.74' 5.0 ABOVE AND 32.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 17,400' SHOWED 15% SHALE, 85% LIME ST</p>
16:30	17:00	0.50	Planned	PERFORMED RIG SERVICE
17:00	21:00	4.00	Drilling	<p>DRILLED 6" LATERAL F/ 17,515 - 17,700 - 185'</p> <p>- AROP: 46.25 FPH - WOB: 15 - 20 KLBS - STRING RPM: 80 TO 100 - MOTOR RPM: 125 - FLOW: 230-250 GPM - DIFF: 400 TO 600 PSI - ON-BTM PSI: 4550 PSI - OFF-BTM PSI: 4050 PSI - ON-BTM TRQ: 9 - 10 - OFF-BTM TRQ: 5-7 - M/W: IN - 11.4 / 43 - M/W OUT - 11.3 / 45 - BBG: 3434 UNITS - CONN GAS: 5425 UNITS</p> <p>Survey @ MD: 17673' / INC: 89.44' / AZ: 253.18' / TVD: 11568.18' 7.0 ABOVE AND 34.0' RIGHT OF TARGET LINE</p> <p>START LOOSING 30 TO 40 BPH @ 17,500, MIXING LCM ON THE FLY RUNNING 20 BPH BW</p> <p>LAST SAMPLE AT 17,700' SHOWED 30% SHALE, 70% LIME ST</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/19/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	31
Location		Supervisor 2	PAUL STERNADEL	DFS	27
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	423	Daily Cost	\$57,692.25
Depth (MD)	18,353	TVD at Bit	11,562	Cum. Cost	\$1,879,395.45
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	11.6
FV	42
PV	16
YP	18
LCM (ppb)	
Chlorides	92000
% Solids	9.47
Daily Losses	
Total Losses	150

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	20
Max RPM	90
Max Torque	9000
Max Pull	270
Bkgrnd Gas	350
Max Gas	3334
Cnx Gas	2550
Trip Gas	3334

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.58'		4.81
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Shock Sub			
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.39'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	127.02		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
8	6	SMITH	MDI611	JK5202	14,13,12	12,331'	15,844'	3,513'	36.5	96.2	ED OUT-DBR-OUTER, SHO
9	6	SMITH	MDI611	JK5201	12,12,13	15,844'	17,930'	2,086'	51.0	41.0	ED OFF-5-HEEL-OUT 1/16"-
10	6	SMITH	MDI611	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	07:30	1.50	UnPlanned	CONTINUE WORKING TO PULL DUTCHMAN OUT OF COUNTER BALANCE STAND JUMP BOLT WAS BROKE OFF IN SOCKET COULD NOT GET OUT WITHOUT WELDER REMOVED STAND JUMP FROM TOP DRIVE AND SADDLE OUT OF BLOCKS
07:30	08:00	0.50	Planned	EQUIPMENT SERVICE TO TOP DRIVE AND BLOCKS
08:00	11:30	3.50	Planned	HELD SAFETY MEETING WITH CREW ON TRIPPING, -TRIP IN HOLE F/ 10,807' TO 15,142' - AVERAGE TRIP SPEED: 1,238' FPH -TAKING RETURNS TO TRIP TANK, GETTING PROPER DISPLACEMENT -TIGHT SPOT AT 14,000' FILL PIPE & TESR MWD -FILLING PIPE EVERY 30 STANDS
11:30	12:00	0.50	Planned	HELD PRE JOB SCOPE MEETING WITH CREW / INSTALL ROTATING HEAD
12:00	14:00	2.00	Planned	CONTINUE TRIP IN HOLE F/ 15,142' TO 17,189' - AVERAGE TRIP SPEED: 1,023' FPH -TAKING RETURNS TO TRIP TANK, GETTING PROPER DISPLACEMENT -TIGHT SPOT AT 17,189' -FILLING PIPE EVERY 30 STANDS
14:00	17:00	3.00	Planned	WASH AND REAM F/ 17,189' TO 17,930'
17:00	22:00	5.00	Drilling	DRILLED 6" LATERAL F/ 17,930' TO 18,165' - 235 FT/HR' - AROP: 47.0' FPH - STRING RPM: 60 TO 80 - FLOW: 230-250 GPM - ON-BTM PSI: 4490 PSI - ON-BTM TRQ: 8 - 10 - M/W: IN - 11.7 / 38 - BBG: 820 UNITS - WOB: 13 - 18 KLBS - MOTOR RPM: 125 - DIFF: 350 TO 550 PSI - OFF-BTM PSI: 4150 PSI - OFF-BTM TRQ: 5-7 - M/W OUT - 11.5 / 38 - CONN GAS - 1485 UNITS Survey @ MD: 17941 / INC: 91.09 / AZ: 251.72 / TVD: 11566.04 7.0 ABOVE AND 38.0' RIGHT OF TARGET LINE LAST SAMPLE AT 18,000' SHOWED 90% SHALE, 10% LIME ST
22:00	23:30	1.50	Drilling	DRILLED 6" LATERAL F/ 18,165' TO 18,217- 52 FT - AROP: 34.6' FPH - STRING RPM: 55 TO 65 - FLOW: 230-240 GPM - ON-BTM PSI: 4490 PSI - ON-BTM TRQ: 8 - 10 - M/W: IN - 11.8 / 40 - BBG: 390 UNITS - WOB: 15 - 19 KLBS - MOTOR RPM: 125 - DIFF: 350 TO 550 PSI - OFF-BTM PSI: 4150 PSI - OFF-BTM TRQ: 5-7 - M/W OUT - 11.7 / 40 - CONN GAS - 2760 UNITS Survey @ MD: 18130 / INC: 90.80 / AZ: 253.01 / TVD: 11566.61 7.0 ABOVE AND 39.0' RIGHT OF TARGET LINE LAST SAMPLE AT 18,200' SHOWED 70% SHALE, 30% LIME ST
23:30	00:00	0.50	UnPlanned	LOST COMMUNICATION WITH MWD TOOLS. WORKING TO ESTABLISH COMMUNICATION AND SYNC WITH TOOLS EMPLOYEE WAS WASHING OFF SHAKER SCREENS WHEN HIS PERSONAL MONITOR WENT OFF EVACUATED RIG, DSM AND RIG MANAGER MASKED UP CHECKED AREA, 1.0 TO 2.0 PPM H2S AT SHAKERS AREA WAS CLEARED TO RESUME WORK



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/20/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	32
Location		Supervisor 2	PAUL STERNADEL	DFS	28
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage		Daily Cost	\$44,932.00
Depth (MD)	18,353	TVD at Bit	11,562	Cum. Cost	\$1,953,712.51
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	11.6
FV	44
PV	16
YP	18
LCM (ppb)	
Chlorides	92000
% Solids	9.47
Daily Losses	0
Total Losses	150

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	
Max RPM	
Max Torque	
Max Pull	
Bkgrnd Gas	
Max Gas	
Cnx Gas	
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.58'		4.81
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Shock Sub			
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.39'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	127.02		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI611	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK469	13,13,12	18,353'					-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	08:00	2.00	UnPlanned	TRIPPED OUT OF THE HOLE F/ 16,250' T/ 13,120' MONITOR HOLE ON TRIP TANK: HOLE IS TAKING PROPER FILL - AVERAGE TRIP SPEED: 1,565' FPH - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN
08:00	08:30	0.50	UnPlanned	PULL ROT. HEAD NOTE: HELD SCOPE MEETING PRIOR TO PULLING HEAD PERFORMED FLOW CHECK NO FLOW
08:30	14:00	5.50	UnPlanned	TRIPPED OUT OF THE HOLE F/ 13,120' T/ BHA MONITOR HOLE ON TRIP TANK: HOLE IS TAKING PROPER FILL - AVERAGE TRIP SPEED: 1,565' FPH - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN NOTE: PERFORMED FLOW CHECK @ 12,015 NO FLOW
14:00	15:00	1.00	UnPlanned	LAY DOWN BHA / BREAK BIT OFF / PULL RESTICTOR OUT OF RSS CHANGE OUT MWD
15:00	16:00	1.00	UnPlanned	SURFACE TEST MWD AND RSS GOOD TEST
16:00	17:00	1.00	UnPlanned	INSTALL RISTRICTOR/ MAKE UP BIT/ AND TOMAX
17:00	22:00	5.00	UnPlanned	TRIPPED IN THE HOLE F/ BHA T/10,085 MONITOR HOLE ON TRIP TANK: HOLE IS DISPLACING PROPERLY - HOLE CONDITIONS: GOOD, NO OVER PULL SEEN
22:00	23:30	1.50	UnPlanned	CUT AND SLIP 100 FOOT OF DRILLING LINE= 13 WRAPS NOTE: RESET C.O.M. AND RECALIBRATE BLOCK HEIGHT
23:30	00:00	0.50	UnPlanned	PERFORMED RIG SERVICE & ADJUST DRUM BRAKES
00:00	00:30	0.50	UnPlanned	TRIPPED IN THE HOLE F/ 10,085' T/10,919' MONITOR HOLE ON TRIP TANK: HOLE IS DISPLACING PROPERLY - HOLE CONDITIONS: GOOD,
00:30	01:00	0.50	UnPlanned	INSTALL ROT. HEAD NOTE: HELD SCOPE MEETING PRIOR TO PULLING HEAD PERFORMED FLOW CHECK NO FLOW
01:00	02:00	1.00	UnPlanned	TRIPPED IN THE HOLE F/ 10,919' T/12,600' MONITOR HOLE ON TRIP TANK: HOLE IS DISPLACING PROPERLY - HOLE CONDITIONS: GOOD, TIH @ 80 FPM
02:00	02:30	0.50	UnPlanned	FILL PIPE & TEST MWD TOOL OUT SIDE OF CSG @ 12,600' (GOOD TEST)

02:30	06:00	3.50	UnPlanned	TRIPPED IN THE HOLE F/ 12,600' T/17,136' MONITOR HOLE ON TRIP TANK: HOLE IS DISPLACING PROPERLY - HOLE CONDITIONS: GOOD, TIH @ 80 FPM							
Total Hours:		24									
24 Hour Activity Summary:											
TOOH, CHANGE OUT MWD, TIH											
24 Hour Plan Forward:											
FINISH TIH , DRLG TO A TD OF 22,196+-											
Safety				Fuel							
Last BOP Test	09/11/2016	Last BOP Drill	09/19/2016	Last Function Test	9/19/2016	Diesel Used	928	Diesel Recvd		Diesel on Loc	5,454



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 09/20/2016

Daily Cost \$44,932

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			\$3,500
830.020	Staking & Surveying			\$3,000
830.030	Road, Locations			\$60,500
830.035	Mobilization/Demobilization			\$100,000
830.040	Daywork Contract	14 K A Day (\$583.33 Per H)	\$14,000	\$434,708
830.050	Mouse/Rathole/Conduct Pipe			\$12,000
830.055	Directional Drilling & Survey	PICKED UP NEW MWD	\$17,650	\$239,646
830.060	Bits, Tools, Stabalizers		\$6,000	\$98,000
830.065	Fuel, Power			\$100,994
830.070	Equipment Rental		\$1,632	\$127,013
830.071	Hot Shot Trucking			\$4,671
830.075	Mud & Chemicals			\$263,753
830.080	Mud Logging		\$1,850	\$50,950
830.090	Core Analysis			
830.095	Openhole Logging			\$3,250
830.100	Cement Services			\$127,587
830.110	Casing Crew & Equipment			\$20,318
830.120	Contract Labor			\$76,812
830.160	Fishing Services			
830.165	Drill Water			\$37,210
830.175	Supervision		\$3,800	\$110,200
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs			\$8,152
840.100	Cement Services (4-1/2" Liner)			
Total Intangible			\$44,932	\$1,882,264

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"			\$17,169
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			\$54,280
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible				\$71,449
Total Costs			\$44,932	\$1,953,713



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/21/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	BILLY LALONDE	Report No.	33
Location		Supervisor 2		DFS	29
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	646	Daily Cost	\$51,752.24
Depth (MD)	18,999	TVD at Bit	11,556	Cum. Cost	\$2,011,364.41
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	11.8
FV	40
PV	18
YP	18
LCM (ppb)	
Chlorides	112000
% Solids	4.75
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	20
Max RPM	80
Max Torque	13
Max Pull	245
Bkgrnd Gas	325
Max Gas	2500
Cnx Gas	2175
Trip Gas	4800

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.54'		4.81
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.39'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.83		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'		646'	18.5	35.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	07:00	1.00	UnPlanned	TRIPPED IN THE HOLE F/ 17,136' T/18,023' MONITOR HOLE ON TRIP TANK: HOLE IS DISPLACING PROPERLY - HOLE CONDITIONS: GOOD, TIH @ 80 FPM
07:00	08:30	1.50	UnPlanned	RELOG GAMMA F/ 18,023' T/ 18,100' @ 100 FPM TRIPPED IN THE HOLE F/ 18,100' T/18,353' MONITOR HOLE ON TRIP TANK: HOLE IS DISPLACING PROPERLY - HOLE CONDITIONS: GOOD, TIH @ 80 FPM DOWN LINK RSS TO INC. AND AZI HOLD ON LAST STAND
08:30	09:30	1.00	UnPlanned	DRILLED 6" LATERAL F/ 18,353' TO 18,557'- 204 FT - AROP: 40.8' FPH - STRING RPM: 55 TO 70 - FLOW: 230-250 GPM - ON-BTM PSI: 4526 PSI - ON-BTM TRQ: 9 - 11 - M/W: IN - 11.8 / 40 - BBG: 926 UNITS - WOB: 15 - 19 KLBS - MOTOR RPM: 130 - DIFF: 350 TO 650 PSI - OFF-BTM PSI: 4117 PSI - OFF-BTM TRQ: 4-6 - M/W OUT - 11.8 / 40 - CONN GAS - 1553 UNITS Survey @ MD: 18,432' / INC: 90.39 / AZ: 250.2 / TVD: 11559.00 15.0 ABOVE AND 36.0' RIGHT OF TARGET LINE LAST SAMPLE AT 18,400' SHOWED 20% SHALE, 80% LIME ST
09:30	14:30	5.00	Drilling	
14:30	15:30	1.00	Planned	PERFORMED RIG SERVICE DRILLED 6" LATERAL F/ 18,557' TO 18,655'- 98 FT - AROP: 49' FPH - STRING RPM: 55 TO 70 - FLOW: 230-250 GPM - ON-BTM PSI: 4390 PSI - ON-BTM TRQ: 12 - 14 - M/W: IN - 11.8 / 40 - BBG: 926 UNITS - WOB: 15 - 19 KLBS - MOTOR RPM: 130 - DIFF: 350 TO 650 PSI - OFF-BTM PSI: 3658 PSI - OFF-BTM TRQ: 4-6 - M/W OUT - 11.8 / 40 - CONN GAS - 1553 UNITS Survey @ MD: 18,620' / INC: 90.96 / AZ: 250.63 / TVD: 11557.61 15.0 ABOVE AND 36.0' RIGHT OF TARGET LINE LAST SAMPLE AT 18,400' SHOWED 20% SHALE, 80% LIME ST
15:30	18:00	2.50	Drilling	
18:00	22:00	4.00	Drilling	DRILLED 6" LATERAL F/ 18,655' TO 18,776'- 121 FT - AROP: 30.25' FPH - STRING RPM: 55 TO 70 - FLOW: 230-250 GPM - ON-BTM PSI: 4177 PSI - ON-BTM TRQ: 10 - 12 - M/W: IN - 11.8 / 40 - BBG: 511 UNITS - WOB: 15 - 19 KLBS - MOTOR RPM: 130 - DIFF: 350 TO 650 PSI - OFF-BTM PSI: 3658 PSI - OFF-BTM TRQ: 4-6 - M/W OUT - 11.8 / 40 - CONN GAS - 4052 UNITS Survey @ MD: 18,714' / INC: 91.13 / AZ: 250.38 / TVD: 11555.90 19.0 ABOVE AND 27.0' RIGHT OF TARGET LINE LAST SAMPLE AT 18,700' SHOWED 60% SHALE, 40% LIME ST



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/22/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	34
Location		Supervisor 2		DFS	30
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	501	Daily Cost	\$72,748.99
Depth (MD)	19,500	TVD at Bit	11,547	Cum. Cost	\$2,084,113.40
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	11.8
FV	43
PV	17
YP	19
LCM (ppb)	
Chlorides	109000
% Solids	4.83
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	22
Max RPM	115
Max Torque	16.5
Max Pull	277
Bkgrnd Gas	778
Max Gas	3758
Cnx Gas	3726
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.54'		4.81
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.39'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.83		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'		1,147'	37.5	31.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	DRILLED 6" LATERAL F/ 18,999' TO 19,139'- 140 FT - AROP: 35' FPH - WOB: 15 - 20 KLBS - STRING RPM: 90 - 115 RPM - MOTOR RPM: 125 - 130 - FLOW: 240 - 250 GPM - DIFF: 250 TO 525 PSI - ON-BTM PSI: 3,850 PSI - OFF-BTM PSI: 3,300 PSI - ON-BTM TRQ: 12.0 - 15.0 - OFF-BTM TRQ: 7.5 - 9.0 - M/W: IN - 11.4 / 36 - M/W OUT - 11.1+ / 34 - BBG: 1,950 UNITS - CONN GAS - 2,300 UNITS - SURVEY AT 19,195' MD, INC: 90.27°, AZM: 250.35°, TVD AT 11,550.65' □ - 24.0' ABOVE AND 13.0' RIGHT OF TARGET LINE LAST SAMPLE AT 19,100' SHOWED 70% SHALE, 30% LIME ST
10:00	12:00	2.00	Drilling	DRILLED 6" LATERAL F/ 19,139' TO 19,218'- 79 FT - AROP: 40' FPH - WOB: 15 - 20 KLBS - STRING RPM: 85 - 100 RPM - MOTOR RPM: 130 - FLOW: 250 GPM - DIFF: 300 - 700 PSI - ON-BTM PSI: 4,150 PSI - OFF-BTM PSI: 3,850 PSI - ON-BTM TRQ: 11.0 - 16.0 - OFF-BTM TRQ: 8.0 - 9.0 - M/W: IN - 11.6 / 39 - M/W OUT - 11.4 / 37 - BBG: 2,150 UNITS - CONN GAS - 2,750 UNITS LAST SAMPLE AT 19,100' SHOWED 70% SHALE, 30% LIME ST
12:00	12:30	0.50	Planned	PERFORMED RIG AND TOP DRIVE SERVICE
12:30	16:15	3.75	Drilling	DRILLED 6" LATERAL F/ 19,218' TO 19,309'- 91 FT - AROP: 25' FPH - WOB: 10 - 20 KLBS - STRING RPM: 80 - 120 RPM - MOTOR RPM: 120 - 130 - FLOW: 230 - 250 GPM - DIFF: 450 - 800 PSI - ON-BTM PSI: 4,125 PSI - OFF-BTM PSI: 3,750 PSI - ON-BTM TRQ: 12.0 - 16.0 - OFF-BTM TRQ: 8.0 - 9.0 - M/W: IN - 11.8+ / 42 - M/W OUT - 11.5 / 37 - BBG: 1,175 UNITS - CONN GAS - 2,625 UNITS LAST SAMPLE AT 19,200' SHOWED 70% SHALE, 30% LIME ST
16:15	20:45	4.50	Planned	WHILE DRILLING IN THE LATERAL SECTION THE DRILLING GOT RATTY, TORQUE STARTED TO GET HIGH AND HAD A HARD TIME GETTING WEIGHT TO THE BIT. CALLS WERE MADE AND THE DECISION WAS MADE TO PERFORM A CLEAN UP CYCLE. - WORKED THE DRILL STRING 90' WHILE ROTATING AT 115 RPM. - BUILT AND PUMPED 2 HIGH VIS SWEEPS WHILE WORKING THE DRILL STRING. NOTE: BEFORE THE CLEAN UP CYCLE THE OFF BOTTOM TORQUE WAS 8,300 TO 8,500, P/U WAS 275, S/O WAS 180 AND ROT WAS 230. AFTER THE CLEAN UP CYCLE THE OFF BOTTOM TORQUE WAS 7,800 TO 8,100, P/U WAS 274, S/O WAS 191 AND ROT WAS 226.



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/23/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	35
Location		Supervisor 2		DFS	31
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	407	Daily Cost	\$56,259.00
Depth (MD)	19,907	TVD at Bit	11,543	Cum. Cost	\$2,141,844.90
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	12
FV	46
PV	25
YP	18
LCM (ppb)	0.2
Chlorides	110000
% Solids	3.26
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
19,844'	90.52°	252.53°

Drilling Parameters

Max WOB	25
Max RPM	115
Max Torque	18.5
Max Pull	280
Bkgrnd Gas	385
Max Gas	2846
Cnx Gas	2798
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.54'		4.81
Sub	5.31'	2.62	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.39'		4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.83		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'	19,907'	1,554'	53.0	29.0	-----X--ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	DRILLED 6" LATERAL F/ 19,500' TO 19,610' - 110 FT - AROP: 28' FPH - WOB: 15 - 20 KLBS - STRING RPM: 100 - 115 RPM - MOTOR RPM: 130 - FLOW: 250 GPM - DIFF: 200 - 400 PSI - ON-BTM PSI: 4,950 PSI - OFF-BTM PSI: 4,500 PSI - ON-BTM TRQ: 14.0 - 16.0 - OFF-BTM TRQ: 9.5 - 10.0 - M/W: IN - 12.2+ / 46 - M/W OUT - 12.1+ / 47 - BBG: 700 UNITS - CONN GAS - 1375 UNITS - SURVEY AT 19,561' MD, INC: 90.54°, AZM: 252.34°, TVD AT 11,546.09' □ - 29.0' ABOVE AND 13.0' RIGHT OF TARGET LINE LAST SAMPLE AT 19,500' SHOWED 50% SHALE, 50% LIME ST NOTE: HAD TO CYCLE THE PUMPS 3 TIMES TO GET A SURVEY ON THE CONNECTION AT 19,595'
10:00	12:00	2.00	Drilling	DRILLED 6" LATERAL F/ 19,610' TO 19,688' - 78 FT - AROP: 39' FPH - WOB: 15 - 20 KLBS - STRING RPM: 115 RPM - MOTOR RPM: 130 - FLOW: 250 GPM - DIFF: 200 - 400 PSI - ON-BTM PSI: 4,950 PSI - OFF-BTM PSI: 4,625 PSI - ON-BTM TRQ: 15.0 - 18.5 - OFF-BTM TRQ: 10.0 - 11.0 - M/W: IN - 12.1+ / 45 - M/W OUT - 12.2 / 44 - BBG: 850 UNITS - CONN GAS - 1050 UNITS LAST SAMPLE AT 19,600' SHOWED 30% SHALE, 70% LIME ST NOTE: HAD TO CYCLE THE PUMPS 2 TIMES TO GET A SURVEY ON THE CONNECTION AT 19,690'
12:00	12:30	0.50	Planned	RIG AND TOP DRIVE SERVICE
12:30	16:30	4.00	Drilling	DRILLED 6" LATERAL F/ 19,688' TO 19,797' - 109 FT - AROP: 31' FPH - WOB: 10 - 22 KLBS - STRING RPM: 105 - 115 RPM - MOTOR RPM: 130 - FLOW: 250 GPM - DIFF: 200 - 350 PSI - ON-BTM PSI: 5,025 PSI - OFF-BTM PSI: 4,750 PSI - ON-BTM TRQ: 12.0 - 18.5 - OFF-BTM TRQ: 9.5 - 10.5 - M/W: IN - 12.1 / 44 - M/W OUT - 12.0 / 48 - BBG: 850 UNITS - CONN GAS - 1950 UNITS - SURVEY AT 19,750' MD, INC: 90.67°, AZM: 252.44°, TVD AT 11,543.05' □ - 29.0' ABOVE AND 13.0' RIGHT OF TARGET LINE LAST SAMPLE AT 19,700' SHOWED 70% SHALE, 30% LIME ST



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/24/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	36
Location		Supervisor 2		DFS	32
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	349	Daily Cost	\$58,717.23
Depth (MD)	20,256	TVD at Bit	11,540	Cum. Cost	\$2,200,562.13
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	12.1
FV	44
PV	20
YP	22
LCM (ppb)	0.2
Chlorides	110000
% Solids	2.54
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
20,127'	90.43°	252.84°

Drilling Parameters

Max WOB	25
Max RPM	115
Max Torque	16.5
Max Pull	288
Bkgrnd Gas	498
Max Gas	2336
Cnx Gas	1754
Trip Gas	1465

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.54'		4.81
Sub	5.31'	2.63	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'	1.25	4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.57'		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'	19,907'	1,554'	53.0	29.0	5-8-RO-S-1/16-X-BT-ROP
12	6	SMITH	MDI611	4740	3X13'S	19,907'		349'	6.3	56.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	09:45	3.75	Planned	<p>TRIPPED OUT OF THE HOLE WITH 4.5" DRILL PIPE AND 4" DRILL PIPE F/ 10,344' T/ 147'</p> <p>MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 58.3 BBLS - ACTUAL FILL: 55 BBLS</p> <p>- AVERAGE TRIP SPEED: 2,725' FPH</p> <p>- HOLE CONDITIONS: GOOD, NO PROBLEMS IN CASING.</p> <p>NOTE: PULLED ROTATING HEAD AT 6,175' AND FLOW CHECKED - WELL STATIC</p>
09:45	12:00	2.25	Planned	<p>HELD PJSM WITH RIG CREW ON HANDLING BHA.</p> <p>WORKED BHA AS FOLLOWS:</p> <p>- PICKED UP TO FILTER SUB LOOKED GOOD, PULLED MWD TOOL. WE PULLED THE SLEAVE OUT OF THE UBHO AND FOUND NO PROBLEM, PICKED UP TO THE TOMAX AND FOUND NO VISUAL DAMAGE OR OIL LEAKING, PICKED AND BROKE BIT OFF, CHECKED MOTOR AND THE RSS - MOTOR SELF DRAINED AND THE RSS HAD NO VISUAL DAMAGE, NO SEALS SHOWING AND PADS WHERE TIGHT.</p> <p>- PICKED UP NEW MOTOR AND BIT, MADE UP DRILLING ASSEMBLY, INSTALLED MWD TOOLS AND TESTED - TESTED GOOD.</p> <p>- NOTE: FUNCTION TESTED BLIND RAMS WHILE OUT OF THE HOLE.</p>
12:00	16:00	4.00	Planned	<p>TRIPPED IN THE HOLE WITH 4" DRILL PIPE, 4.5" DRILL PIPE AND 4.5" HWDP F/ 147' - T/ 10,727' - KOP</p> <p>MONITOR DISPLACEMENTS ON TRIP TANK: - CALCULATED DIS.: 184.3 BBLS - ACTUAL DIS.: 187 BBLS</p> <p>- AVERAGE TRIP SPEED: 2,650 FPH</p> <p>- FILL PIPE AND CHECK MWD TOOLS EVERY 30 STANDS.</p> <p>- HOLE CONDITIONS: CASSED HOLE.</p> <p>- INSTALLED ROTATING HEAD AT 10,672'</p>
16:00	17:30	1.50	Planned	<p>HUNG THE BLOCKS OFF AND SLIPPED AND CUT 64' OF DRILLING LINE.</p> <p>NOTE: RESET AND TESTED THE CROWN-O-MATIC</p>
17:30	23:15	5.75	Planned	<p>TRIPPED IN THE HOLE WITH 4.5" DRILL PIPE AND 4.5" HWDP F/ 10,727' - T/ 19,875'</p> <p>MONITOR DISPLACEMENTS ON TRIP TANK: - CALCULATED DIS.: 179.3 BBLS - ACTUAL DIS.: 184 BBLS</p> <p>- AVERAGE TRIP SPEED: 1,830 FPH</p> <p>- FILL PIPE AND CHECK MWD TOOL EVERY 30 STANDS.</p> <p>- HOLE CONDITIONS: NO HOLE PROBLEMS NOTICED WHILE TRIPPING IN OPEN HOLE.</p> <p>NOTE: HAD TO RELOG FROM 19,590' TO 19,670'</p>
23:15	23:45	0.50	Planned	<p>FILLED THE PIPE, UP LINKED THE RSS TOOL, WASHED AND REAMED F/ 19,875' - T/ 19,907'</p>



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 09/24/2016

Daily Cost \$58,717

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			\$3,500
830.020	Staking & Surveying			\$3,000
830.030	Road, Locations			\$60,500
830.035	Mobilization/Demobilization			\$100,000
830.040	Daywork Contract	14 K A Day (\$583.33 Per H)	\$14,000	\$490,708
830.050	Mouse/Rathole/Conduct Pipe			\$12,000
830.055	Directional Drilling & Survey	PICKED UP NEW MWD	\$17,650	\$310,246
830.060	Bits, Tools, Stabalizers	6" Bit - Ser.# JK5396	\$6,000	\$90,648
830.065	Fuel, Power			\$112,686
830.070	Equipment Rental		\$12,247	\$152,715
830.071	Hot Shot Trucking			\$4,671
830.075	Mud & Chemicals		\$2,845	\$307,688
830.080	Mud Logging		\$1,850	\$58,350
830.090	Core Analysis			
830.095	Openhole Logging			\$3,250
830.100	Cement Services			\$127,587
830.110	Casing Crew & Equipment			\$20,318
830.120	Contract Labor			\$88,550
830.160	Fishing Services			
830.165	Drill Water			\$37,210
830.175	Supervision		\$3,800	\$125,400
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs		\$325	\$20,086
840.100	Cement Services (4-1/2" Liner)			
Total Intangible			\$58,717	\$2,129,114

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"			\$17,169
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			\$54,280
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible				\$71,449
Total Costs			\$58,717	\$2,200,562



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/25/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	37
Location		Supervisor 2		DFS	33
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	765	Daily Cost	\$46,478.11
Depth (MD)	21,021	TVD at Bit	11,532	Cum. Cost	\$2,248,490.24
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	12.3
FV	42
PV	20
YP	21
LCM (ppb)	
Chlorides	135000
% Solids	1.86
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
20,978'	90.36°	252.67°

Drilling Parameters

Max WOB	20
Max RPM	115
Max Torque	18.5
Max Pull	285
Bkgrnd Gas	1013
Max Gas	2738
Cnx Gas	2735
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.54'		4.81
Sub	5.31'	2.63	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'	1.25	4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.57'		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'	19,907'	1,554'	53.0	29.0	5-8-RO-S-1/16-X-BT-ROP
12	6	SMITH	MDI611	4740	3X13'S	19,907'	21,021'	1,114'	25.0	45.0	-----X--DTF

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	09:00	3.00	Drilling	DRILLED 6" LATERAL F/ 20,256' - T/ 20,419' - 163 FT - AROP: 65' FPH - WOB: 10 - 20 KLBS - STRING RPM: 100 - 115RPM - MOTOR RPM: 125 - FLOW: 240 GPM - DIFF: 350 - 600 PSI - ON-BTM PSI: 5025 PSI - OFF-BTM PSI: 4,325 PSI - ON-BTM TRQ: 14.0 - 17.0 - OFF-BTM TRQ: 9.5 - 11.5 - M/W: IN - 12.2 / 41 - M/W OUT - 12.2 / 42 - BBG: 1125 UNITS - CONN GAS - 2425 UNITS - SURVEY AT 20,316' MD, INC: 90.41°, AZM: 252.37°, TVD AT 11,539.03'□ - 36.0' ABOVE AND 16.0' RIGHT OF TARGET LINE LAST SAMPLE AT 20,300' SHOWED 80% SHALE, 20% LIME ST
09:00	12:00	3.00	Drilling	DRILLED 6" LATERAL F/ 20,419' - T/ 20,539' - 120 FT - AROP: 48' FPH - WOB: 15 - 20 KLBS - STRING RPM: 95 - 115RPM - MOTOR RPM: 125 - FLOW: 240 GPM - DIFF: 300 - 650 PSI - ON-BTM PSI: 5,100 PSI - OFF-BTM PSI: 4,350 PSI - ON-BTM TRQ: 13.0 - 16.5 - OFF-BTM TRQ: 9.0 - 11.5 - M/W: IN - 12.2 / 41 - M/W OUT - 12.1+ / 42 - BBG: 830 UNITS - CONN GAS - 2150 UNITS - SURVEY AT 20,410' MD, INC: 90.27°, AZM: 252.49°, TVD AT 11,538.45'□ - 36.0' ABOVE AND 16.0' RIGHT OF TARGET LINE LAST SAMPLE AT 20,400' SHOWED 70% SHALE, 30% LIME ST
12:00	12:45	0.75	Planned	RIG SERVICE - CHANGED OUT DRILLER'S SIDE TUGGER LINE SHIVE IN THE DERRICK .
12:45	17:00	4.25	Drilling	DRILLED 6" LATERAL F/ 20,539' - T/ 20,738' - 199 FT - AROP: 53' FPH - WOB: 10 - 18 KLBS - STRING RPM: 115 RPM - MOTOR RPM: 120 - 125 - FLOW: 230 - 240 GPM - DIFF: 150 - 750 PSI - ON-BTM PSI: 4,925 PSI - OFF-BTM PSI: 4,175 PSI - ON-BTM TRQ: 14.0 - 18.0 - OFF-BTM TRQ: 9.0 - 10.5 - M/W: IN - 12.2+ / 42 - M/W OUT - 12.2 / 40 - BBG: 900 UNITS - CONN GAS - 2400 UNITS - SURVEY AT 20,694' MD, INC: 90.56°, AZM: 252.72°, TVD AT 11,534.00'□ - 39.0' ABOVE AND 18.0' RIGHT OF TARGET LINE LAST SAMPLE AT 20,600' SHOWED 85% SHALE, 15% LIME ST NOTE: PERFORMED A DRILLING BOP DRILL WITH DAYLIGHT RIG CREW.



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/26/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	38
Location		Supervisor 2		DFS	34
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	22	Daily Cost	\$82,636.43
Depth (MD)	21,043	TVD at Bit	11,532	Cum. Cost	\$2,331,126.67
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	12.2
FV	42
PV	23
YP	19
LCM (ppb)	0.1
Chlorides	115000
% Solids	3.67
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi

Drilling Parameters

Max WOB	20
Max RPM	115
Max Torque	13.5
Max Pull	285
Bkgrnd Gas	1013
Max Gas	2738
Cnx Gas	2735
Trip Gas	1925

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.25'		4.81
Sub	5.31'	2.63	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'	1.25	4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.28		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'	19,907'	1,554'	53.0	29.0	5-8-RO-S-1/16-X-BT-ROP
12	6	SMITH	MDI611	4740	3X13'S	19,907'	21,021'	1,114'	25.0	45.0	2-8-LT-S-I-X-BT-PR
13	6	SMITH	MDI611	JK7491	3X13'S	21,021'		22'	1.0	22.0	-----

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	11:30	5.50	UnPlanned	<p>TRIPPED OUT OF THE HOLE WITH 4.5" DRILL PIPE, 4.5" HWDP AND 4" DRILL PIPE F/ 14,770' T/ 147'</p> <p>MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 100.7BBLS - ACTUAL FILL: 94 BBLS</p> <p>- AVERAGE TRIP SPEED: 2,650' FPH</p> <p>- HOLE CONDITIONS: GOOD, NO PROBLEMS OPEN HOLE OR IN CASING.</p> <p>NOTE: PULLED ROTATING HEAD AT 10,925' AND FLOW CHECKED - WELL STATIC</p>
11:30	14:15	2.75	UnPlanned	<p>HELD PJSM WITH RIG CREW ON HANDLING BHA.</p> <p>WORKED BHA AS FOLLOWS:</p> <p>- PICKED UP TO FILLTER SUB LOOKED GOOD, PULLED MWD TOOL, PICKED UP TO THE TOMAX AND FOUND NO VISUAL DAMAGE OR OIL LEAKING FROM IT, PICKED AND BROKE BIT OFF, CHECKED MOTOR AND THE RSS - MOTOR LOOKED GOOD AND FELT TIGHT BUT SELF DRAINED AND THE RSS HAD NO VISUAL DAMAGE, NO SEALS SHOWING BUT HAD 1 PAD PUSHED OUT.</p> <p>- PICKED UP NEW MOTOR, RSS AND BIT, MADE UP DRILLING ASSEMBLY, INSTALLED MWD TOOLS AND TESTED - TESTED GOOD.</p> <p>- NOTE: FUNCTION TESTED BLIND RAMS WHILE OUT OF THE HOLE.</p>
14:15	18:15	4.00	UnPlanned	<p>TRIPPED IN THE HOLE WITH 4" DRILL PIPE, 4.5" DRILL PIPE AND 4.5" HWDP F/ 147' - T/ 10,775'</p> <p>MONITOR DISPLACEMENTS ON TRIP TANK: - CALCULATED DISPLACEMENT: 184.3 BBLS - ACTUAL DISPLACEMENT: 187 BBLS</p> <p>- AVERAGE TRIP SPEED: 2,630 FPH</p> <p>- FILL PIPE AND CHECK MWD TOOLS EVERY 30 STANDS.</p> <p>- HOLE CONDITIONS: GOOD THROUGH THE CASSED HOLE.</p> <p>- INSTALLED ROTATING HEAD AT 10,658'</p>
18:15	19:45	1.50	UnPlanned	<p>HUNG THE BLOCKS OFF AND SLIPPED AND CUT 61' OF DRILLING LINE.</p> <p>NOTE: RESET AND TESTED THE CROWN-O-MATIC</p>
19:45	20:15	0.50	UnPlanned	<p>PERFORMED RIG AND TOP DRIVE SERVICE</p>
20:15	05:00	8.75	UnPlanned	<p>TRIPPED IN THE HOLE WITH 4.5" DRILL PIPE AND 4.5" HWDP F/ 10,775' - T/ 20,989'</p> <p>MONITOR DISPLACEMENTS ON TRIP TANK: - CALCULATED DISPLACEMENT: 176.5 BBLS - ACTUAL DISPLACEMENT: 183 BBLS</p> <p>- AVERAGE TRIP SPEED: 1,550 FPH</p> <p>- FILL PIPE AND CHECK MWD TOOLS EVERY 30 STANDS.</p> <p>- HOLE CONDITIONS: GOOD THROUGH THE CASSED HOLE AND HAD TO REAM TO GET BACK TO BOTTOM - REAM FROM 17,423' TO 17,518' - 95', FROM 19,030' TO 19,124' - 94' AND FROM 20,759' TO 21,021' - 262' BOTTOM</p> <p>NOTE: FILLED PIPE AND PUMPED UP A SURVEY AT 12,615' - HAD TO REPROGRAM MWD TOOL TO OBTAIN A SURVEY.</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/27/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	39
Location		Supervisor 2		DFS	35
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLO	AFE	
KB		Daily Footage	250	Daily Cost	\$63,984.75
Depth (MD)	21,293	TVD at Bit	11,532	Cum. Cost	\$2,384,541.42
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	12.6
FV	40
PV	20
YP	22
LCM (ppb)	
Chlorides	123000
% Solids	3.42
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
21,167'	90.03°	251.85°

Drilling Parameters

Max WOB	20
Max RPM	140
Max Torque	18.5
Max Pull	285
Bkgrnd Gas	1138
Max Gas	2649
Cnx Gas	1259
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.25'		4.81
Sub	5.31'	2.63	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'	1.25	4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.28		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'	19,907'	1,554'	53.0	29.0	5-8-RO-S-1/16-X-BT-ROP
12	6	SMITH	MDI611	4740	3X13'S	19,907'	21,021'	1,114'	25.0	45.0	2-8-LT-S-1/8-X-BT-PR
13	6	SMITH	MDI611	JK7491	3X13'S	21,021'	21,293'	272'	8.0	34.0	1-8-RO-S--X-NR-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	11:00	5.00	Drilling	<p>DRILLED 6" LATERAL F/ 21,043' - T/ 21,275' - 232 FT</p> <p>- AROP: 51' FPH - WOB: 15 - 20 KLBS - STRING RPM: 115 RPM - MOTOR RPM: 125 - 130 - FLOW: 240 - 250 GPM - DIFF: 250 - 600 PSI - ON-BTM PSI: 5,150 PSI - OFF-BTM PSI: 4,600 PSI - ON-BTM TRQ: 13.5 - 16.5 - OFF-BTM TRQ: 10.0 - 11.0 - M/W: IN - 12.6 / 40 - M/W OUT - 12.4 / 43 - BBG: 875 UNITS - CONN GAS - 2100 UNITS</p> <p>- SURVEY AT 21,167' MD, INC: 90.03°, AZM: 251.85°, TVD AT 11,529.86' □ - 45.0' ABOVE AND 20.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 21,200' SHOWED 60% SHALE, 40% LIME ST</p>
11:00	12:15	1.25	UnPlanned	<p>WHILE DRILLING AHEAD, THE # 1PUMP WASHED A VALVE AND SEAT AT 21,201', SWITCHED TO #2 PUMP WHILE WORKING ON #1 PUMP, AT 21,275' THEY WASHED A SUCTION VALVE ON #2 PUMP WHILE THE #1 PUMP WAS STILL TORE DOWN.</p> <p>NOTE: MOVED THE DRILL STRING WHILE WORKING ON THE PUMPS.</p>
12:15	14:15	2.00	Drilling	<p>DRILLED 6" LATERAL F/ 21,275' - T/ 21,293' - 18 FT</p> <p>- AROP: 9' FPH - WOB: 15 - 20 KLBS - STRING RPM: 100 - 115 RPM - MOTOR RPM: 125 - 130 - FLOW: 240 - 250 GPM - DIFF: 200 - 500 PSI - ON-BTM PSI: 5,450 PSI - OFF-BTM PSI: 5,000 PSI - ON-BTM TRQ: 12.0 - 18.5 - OFF-BTM TRQ: 9.0 - 11.0 - M/W: IN - 12.5 / 40 - M/W OUT - 12.3+ / 42 - BBG: 925 UNITS - CONN GAS - 2650 UNITS</p> <p>- SURVEY AT 21,167' MD, INC: 90.03°, AZM: 251.85°, TVD AT 11,529.86' □ - 45.0' ABOVE AND 20.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 21,200' SHOWED 60% SHALE, 40% LIME ST</p>
14:15	17:00	2.75	UnPlanned	<p>WHILE DRILLING AHEAD AT 21,293' HAD A LITTLE TORQUE SPIKE. WENT FROM 40 TO 50 FPH DOWN TO 10 TO 20 FPH. TRIED TO RESTART A FEW TIMES WITH DIFFRENT PARAMETERS WITH NO RESULTS. DRILLED AHEAD TO SEE IF THE GAMMA CHANGED BUT IT DID'NT, DRILLING SAMPLES SHOW 70% SHALE AND 30% LS. CALLS WHERE MADE AND THE DECISION WAS MADE TO P.O.O.H.</p> <p>- FINISHED CIRCULATING A LUBE SWEEP OUT OF THE HOLE WHILE WORKING THE DRILL STRING AND PREPARING TO P.O.O.H.</p> <p>- WHILE CIRCULATING WE DOWN LINKED THE RSS TOOL, BUILT A DRY JOB, FILLED TRIP TANKS AND PREPARED FLOOR TO TRIP. ONCE THE SWEEP WAS OUT OF THE HOLE, FLOW CHECKED - WELL WAS STATIC, PUMPED DRY JOB.</p>
17:00	01:30	8.50	UnPlanned	<p>TRIPPED OUT OF THE HOLE WITH 4.5" DRILL PIPE AND 4.5" HWDP F/ 21,293' T/ 146'</p> <p>MONITOR HOLE ON TRIP TANK: - CALCULATED FILL: 140.1 BBLS - ACTUAL FILL: 135 BBLS</p> <p>- AVERAGE TRIP SPEED: 2,475' FPH</p> <p>- HOLE CONDITIONS: GOOD - HAD TO WORK A TIGHT SPOT FROM 20,193' TO 20,160'. NO PROBLEMS IN THE CASED HOLE SECTION.</p> <p>NOTE: PULLED ROTATING HEAD AT 11,325', FLOW CHECKED - WELL STATIC.</p>



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/28/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	40
Location		Supervisor 2		DFS	36
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	475	Daily Cost	\$63,815.79
Depth (MD)	21,768	TVD at Bit	11,530	Cum. Cost	\$2,454,357.21
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	12.6
FV	42
PV	20
YP	21
LCM (ppb)	
Chlorides	110000
% Solids	2.86
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
21,734'	89.78°	252.45°

Drilling Parameters

Max WOB	20
Max RPM	100
Max Torque	18.5
Max Pull	288
Bkgrnd Gas	729
Max Gas	2977
Cnx Gas	934
Trip Gas	3761

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.25'		4.81
Sub	5.31'	2.63	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'	1.25	4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.28		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'	19,907'	1,554'	53.0	29.0	5-8-RO-S-1/16-X-BT-ROP
12	6	SMITH	MDI611	4740	3X13'S	19,907'	21,021'	1,114'	25.0	45.0	2-8-LT-S-1/8-X-BT-PR
13	6	SMITH	MDI611	JK7491	3X13'S	21,021'	21,293'	272'	8.0	34.0	1-8-RO-S-X-NR-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	11:45	5.75	UnPlanned	TRIPPED IN THE HOLE WITH 4.5" DRILL PIPE AND 4.5" HWDP F/ 7,620' - T/ 21,258' MONITOR DISPLACEMENTS ON TRIP TANK: - CALCULATED DISPLACEMENT: 267.3 BBLS - ACTUAL DISPLACEMENT: 273 BBLS - AVERAGE TRIP SPEED: 2,475 FPH - FILLED PIPE AND CHECKED MWD TOOLS EVERY 30 STANDS. - INSTALLED ROTATING HEAD AT 10,088' - HOLE CONDITIONS: GOOD THROUGH THE CASED HOLE AND THROUGH THE OPEN HOLE SECTION NOTE: FILLED PIPE AND PUMPED UP A SURVEY AT 12,616' - GOOD SURVEY.
11:45	12:00	0.25	UnPlanned	FILLED PIPE, SYNCED UP MWD TOOLS AND WASHED FROM 21,258' TO 21,293'
12:00	16:45	4.75	Drilling	DRILLED A FEW FEET WITH THE RSS IN THE NEUTRAL POSITION THEN UP LINKED THE RSS TOOL AND DRILLED 6" LATERAL F/ 21,293' - T/ 21,389' - 96 FT - AROP: 25' FPH - STRING RPM: 75 - 100 RPM - FLOW: 235 - 240 GPM - ON-BTM PSI: 5,600 PSI - ON-BTM TRQ: 13.0 - 14.5 - M/W: IN - 12.5 / 42 - BBG: 550 UNITS - WOB: 10 - 18 KLBS - MOTOR RPM: 122 - 125 - DIFF: 250 - 550 PSI - OFF-BTM PSI: 5,000 PSI - OFF-BTM TRQ: 9.0 - 10.5 - M/W OUT - 12.6 / 42 - CONN GAS - 1250 UNITS - SURVEY AT 21,356' MD, INC: 90.30°, AZM: 252.08°, TVD AT 11,529.09'□ - 45.0' ABOVE AND 20.0' RIGHT OF TARGET LINE LAST SAMPLE AT 21,000' SHOWED 80% SHALE, 20% LIME ST
16:45	17:15	0.50	Planned	PERFORMED RIG AND TOP DRIVE SERVICE.
17:15	21:15	4.00	Drilling	DRILLED 6" LATERAL F/ 21,389' - T/ 21,539' - 150 FT - AROP: 43' FPH - STRING RPM: 75 - 100 RPM - FLOW: 245 - 250 GPM - ON-BTM PSI: 5,650 PSI - ON-BTM TRQ: 14.5 - 16.0 - M/W: IN - 12.4 / 40 - BBG: 1450 UNITS - WOB: 12 - 18 KLBS - MOTOR RPM: 128 - 130 - DIFF: 275 - 550 PSI - OFF-BTM PSI: 5,200 PSI - OFF-BTM TRQ: 10.5 - 11.5 - M/W OUT - 12.4+ / 40 - CONN GAS - 2375 UNITS - SURVEY AT 21,451' MD, INC: 89.64°, AZM: 252.06°, TVD AT 11,529.14'□ - 45.0' ABOVE AND 20.0' RIGHT OF TARGET LINE LAST SAMPLE AT 21,400' SHOWED 90% SHALE, 10% LIME ST



Daily Drilling Report

Well Name **RK-UTL 3031B-17-1H**

Report Date **09/29/2016**

API _____

Field	Phantom Wolfcamp	Supervisor	JERRED BAXTER	Report No.	41
Location		Supervisor 2		DFS	37
County	Ward	Rig Phone	1-432-653-1264	Spud Date	08/23/2016
Rig Name	Star	Rig Email	JAGGEDPEAK ENERGY101@OUTLOOK.COM	AFE	
KB		Daily Footage	474	Daily Cost	\$71,145.24
Depth (MD)	22,242	TVD at Bit	11,531	Cum. Cost	\$2,525,502.45
Estimated TD	22,000				

Casing Data

Type	Size	Weight	Grade	Connection	Top	Bottom	Shoe Test
Surface	13-3/8	48.0	J-55	STC		929'	
Intermediate	7	32.0	P-110	LTC		12,327'	

Mud Properties

Type	CUT BRINE
Weight	12.5
FV	43
PV	21
YP	24
LCM (ppb)	
Chlorides	110000
% Solids	1.61
Daily Losses	0
Total Losses	0

Last Survey

Depth	Inc	Azi
22,241'	90.60°	252.38°

Drilling Parameters

Max WOB	25
Max RPM	115
Max Torque	19
Max Pull	285
Bkgrnd Gas	760
Max Gas	1906
Cnx Gas	1615
Trip Gas	

BHA

Component	Length	ID	OD
Drill Bit	0.70'		6.00
Steerable Assembly	14.25'		4.81
Sub	5.31'	2.63	4.82
Monel Collar	28.09'	2.75	4.76
Stabilizer	5.23'	2.38	4.83
Sub	1.17'	2.50	4.80
Monel Collar	28.30'	3.50	4.70
Sub	16.85'	2.50	4.74
Stabilizer	5.52'	2.25	4.81
Sub	5.98'	2.25	4.77
Motor	27.13'	1.25	4.72
Stabilizer	4.75'	2.25	4.78
Total Length:	143.28		

Bit Info

Bit #	Size	Make	Type	S/N	Jets	In	Out	Footage	Hrs	ROP	Grade
10	6	SMITH	MDI613	JK4694	13,13,12	17,930'	18,353'	423'	9.0	47.0	CT-SH-IN GAUGE-X-NA-MV
11	6	SMITH	MDI611	JK5396	13,13,12	18,353'	19,907'	1,554'	53.0	29.0	5-8-RO-S-1/16-X-BT-ROP
12	6	SMITH	MDI611	4740	3X13'S	19,907'	21,021'	1,114'	25.0	45.0	2-8-LT-S-1/8-X-BT-PR
13	6	SMITH	MDI611	JK7491	3X13'S	21,021'	21,293'	272'	8.0	34.0	1-8-RO-S--X-NR-ROP

Activity Summary (6:00am - 6:00am)

From	To	Hours	P / U	Summary
06:00	10:00	4.00	Drilling	<p>DRILLED 6" LATERAL F/ 21,768' - T/ 21,863' - 95 FT</p> <p>- AROP: 27' FPH - WOB: 18 - 22 KLBS - STRING RPM: 100 RPM - MOTOR RPM: 130 - FLOW: 250 GPM - DIFF: 200 - 625 PSI - ON-BTM PSI: 5,325 PSI - OFF-BTM PSI: 5,050 PSI - ON-BTM TRQ: 14.0 - 18.0 - OFF-BTM TRQ: 10.5 - 12.0 - M/W: IN - 12.7 / 42 - M/W OUT - 12.6 / 41 - BBG: 600 UNITS - CONN GAS - 1350 UNITS</p> <p>- SURVEY AT 21,829' MD, INC: 89.92°, AZM: 252.35°, TVD AT 11,530.30' □ - 44.0' ABOVE AND 19.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 21,800' SHOWED 40% SHALE, 60% LIME ST</p>
10:00	10:30	0.50	Planned	<p>PERFORMED RIG, DRAW WORKS AND TOP DRIVE SERVICE.</p> <p>NOTE: GOT SPR'S FROM BOTH PUMPS WHILE PERFORMING SERVICE.</p>
10:30	14:30	4.00	Drilling	<p>DRILLED 6" LATERAL F/ 21,863' - T/ 21,963' - 100 FT</p> <p>- AROP: 29' FPH - WOB: 15 - 23 KLBS - STRING RPM: 100 RPM - MOTOR RPM: 130 - FLOW: 250 GPM - DIFF: 200 - 625 PSI - ON-BTM PSI: 5,650 PSI - OFF-BTM PSI: 5,075 PSI - ON-BTM TRQ: 15.0 - 18.5 - OFF-BTM TRQ: 11.0 - 12.5 - M/W: IN - 12.6+ / 42 - M/W OUT - 12.6 / 41 - BBG: 460 UNITS - CONN GAS - 1450 UNITS</p> <p>- SURVEY AT 21,924' MD, INC: 90.27°, AZM: 252.40°, TVD AT 11,530.19' □ - 45.0' ABOVE AND 20.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 21,800' SHOWED 40% SHALE, 60% LIME ST</p>
14:30	18:30	4.00	Drilling	<p>DRILLED 6" LATERAL F/ 21,963' - T/ 22,055' - 92' FT</p> <p>- AROP: 23' FPH - WOB: 15 - 23 KLBS - STRING RPM: 100 RPM - MOTOR RPM: 130 - FLOW: 250 GPM - DIFF: 200 - 625 PSI - ON-BTM PSI: 5,650 PSI - OFF-BTM PSI: 5,075 PSI - ON-BTM TRQ: 15.0 - 18.5 - OFF-BTM TRQ: 11.0 - 12.5 - M/W: IN - 12.6+ / 42 - M/W OUT - 12.6 / 41 - BBG: 460 UNITS - CONN GAS - 1450 UNITS</p> <p>- SURVEY AT 21,924' MD, INC: 90.27°, AZM: 252.40°, TVD AT 11,530.19' □ - 45.0' ABOVE AND 20.0' RIGHT OF TARGET LINE</p> <p>LAST SAMPLE AT 22000' SHOWED 70% SHALE, 30% LIME ST</p>



Daily Cost Report

Well Name: RK-UTL 3031B-17-1H

Report Date: 09/29/2016

Daily Cost \$71,145

Intangible Costs

Code	Description	Comments	Daily	Cum
830.010	Permits, Licenses, ect			\$3,500
830.020	Staking & Surveying			\$3,000
830.030	Road, Locations			\$60,500
830.035	Mobilization/Demobilization			\$100,000
830.040	Daywork Contract	14 K A Day (\$583.33 Per H)	\$14,000	\$560,708
830.050	Mouse/Rathole/Conduct Pipe			\$12,000
830.055	Directional Drilling & Survey	PICKED UP NEW MWD	\$37,150	\$477,946
830.060	Bits, Tools, Stabalizers			\$102,648
830.065	Fuel, Power			\$124,665
830.070	Equipment Rental		\$1,677	\$150,530
830.071	Hot Shot Trucking			\$4,671
830.075	Mud & Chemicals		\$12,668	\$343,091
830.080	Mud Logging		\$1,850	\$67,600
830.090	Core Analysis			
830.095	Openhole Logging			\$3,250
830.100	Cement Services			\$127,587
830.110	Casing Crew & Equipment			\$20,318
830.120	Contract Labor			\$89,139
830.160	Fishing Services			
830.165	Drill Water			\$37,210
830.175	Supervision		\$3,800	\$144,400
830.185	Insurance			
830.190	Legal			
830.195	P&A/TA Costs			\$21,291
840.100	Cement Services (4-1/2" Liner)			
Total Intangible			\$71,145	\$2,454,054

Tangible Costs

Code	Description	Comments	Daily	Cum
850.010	Conductor Casing - 13-3/8"			\$17,169
850.015	Surface Casing - 9-5/8"			
850.120	Intermediate Casing - 7"			
850.145	Wellhead Equipment			\$54,280
850.150	Float equipment, Centralizers & DVT			
850.275	Tangible Contingency			
860.030	Production Casing - 4-1/2"			
860.035	Liner Hanger - 4-1/2"			
Total Tangible				\$71,449
Total Costs			\$71,145	\$2,525,502

