

Miami County, KS
 Well: Windler A-40
 Lease Owner: AltaVista

Town Oilfield Service, Inc.
 (913) 294-2125

Commenced Spudding:
 11/7/2017

WELL LOG

Thickness of Strata	Formation	Total Depth
0-7	Soil-Clay	7
8	Lime	15
14	Shale	29
30	Lime	59
8	Shale	67
21	Lime	88
4	Shale	92
2	Lime	94
5	Shale	99
6	Lime	105
19	Shale	124
10	Sand	134
6	Sand	140
10	Sandy Shale	150
112	Shale	262
12	Limey Sand	274
40	Shale	314
3	Lime	317
10	Shale	327
4	Lime	331
6	Shale	337
8	Lime	345
16	Shale	361
4	Lime	365
12	Shale	377
25	Lime	402
5	Shale	407
3	Lime	410
12	Shale	422
5	Lime	427
39	Shale	466
4	Shale	470
4	Sandy Shale	474
1	Sand	475
18	Core	493
2	Sandy Shale	495
45	Shale	540-TD

Short Cuts

TANK CAPACITY

BBLS. (42 gal.) equals $D^2 \times .14 \times h$
 D equals diameter in feet.
 h equals height in feet.

BARRELS PER DAY

Multiply gals. per minute x 34.2

HP equals BPH x PSI x .0004

BPH - barrels per hour

PSI - pounds square inch

TO FIGURE PUMP DRIVES

- * D - Diameter of Pump Sheave
- * d - Diameter of Engine Sheave
- SPM - Strokes per minute
- RPM - Engine Speed
- R - Gear Box Ratio
- *C - Shaft Center Distance

D - $RPM \times d$ over $SPM \times R$

d - $SPM \times R \times D$ over RPM

SPM - $RPM \times D$ over $R \times d$

R - $RPM \times D$ over $SPM \times d$

BELT LENGTH - $2C + 1.57(D + d) + \frac{(D-d)^2}{4C}$

* Need these to figure belt length

TO FIGURE AMPS: $\frac{WATTS}{VOLTS} = AMPS$

746 WATTS equal 1 HP

Log Book

Well No. A-40

Farm Windler

KS Michigan
 (State) (County)

21 18 24
 (Section) (Township) (Range)

For Altavista Energy inc
 (Well Owner)

Town Oilfield Services, Inc.

1207 N. 1st East
 Louisburg, KS 66053
 913-710-5400

Winnell Farm: Miami County
KS State; Well No. A-40
 Elevation 934
 Commenced Spuding 11-7 20 17
 Finished Drilling 11-8 20 17
 Driller's Name Wesley Dollard
 Driller's Name Ryan Ward
 Driller's Name _____
 Tool Dresser's Name _____
 Tool Dresser's Name _____
 Tool Dresser's Name _____
 Contractor's Name TOS
21 KG 24

(Section) (Township) (Range)
 Distance from S line, 5110 ft.
 Distance from E line, 4215 ft.

3 sacks
 1 joint 20' 7" surface
 8 hrs
 5 7/8 borehole
 2 7/8 casing

CASING AND TUBING RECORD

10" Set _____ 10" Pulled _____
 8" Set _____ 8" Pulled _____
 7" Set 20 _____ 6 3/4" Pulled _____
 4" Set _____ 4" Pulled _____
 2" Set _____ 2" Pulled _____

CASING AND TUBING MEASUREMENTS

Feet	In.	Feet	In.	Feet	In.
470.	10	Seat nipple			
501.	15	Baffle			
533.	70	Float			
540	TD	2 7/8			

Thickness of Strata	Formation	Total Depth	Remarks
0-7	soil-clay	7	
8	Lime	15	
14	Shale	29	
30	Lime	59	
8	Shale	67	
21	Lime	88	
4	Shale	92	
2	Lime	94	
5	Shale	99	
6	Lime	105	Hertha
19	Shale	124	
10	sand	134	broken-good oil show
6	sand	140	no oil
10	sandy shale	150	
112	Shale	262	
12	limey sand	274	no oil
40	Shale	314	
3	Lime	317	
10	Shale	327	
4	Lime	331	
6	Shale	337	
8	Lime	345	
16	Shale	361	
4	Lime	365	
12	Shale	377	
25	Lime	402	
5	Shale	407	

407

Thickness of Strata	Formation	Total Depth	Remarks
3	Lime	410	
12	Shale	422	
5	Lime	427	
39	Shale	466	
4	Shale	470	
4	sandy shale	474	oil bleed
1	sand	475	
18	core	493	solid - good oil show
2	sandy shale	495	
45	shale	540	TD
	core		
		475	
10	sand	485	
1	sand & sandy shale	486	solid - great bleed
7	sandy shale	493	laminated - solid oil in sand



REMIT TO
 QES Pressure Pumping LLC
 Dept:970
 P.O.Box 4346
 Houston, TX 77210-4346

MAIN OFFICE
 P.O.Box884
 Chanute,KS 66720
 620/431-9210,1-800/467-8676
 Fax 620/431-0012

Invoice

Invoice#

811710

Invoice Date: 11/13/17

Terms: Net 30

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ALTAVISTA ENERGY INC
 PO BOX 128
 WELLSVILLE KS 66092
 USA
 7858834057

WINDLER #A-40

Part No	Description	Quantity	Unit Price	Discount(%)	Total
CE0450	Cement Pump Charge 0 - 1500'	1.000	1,500.0000	50.000	750.00
CE0002	Equipment Mileage Charge - Heavy Equipment	30.000	7.1500	50.000	107.25
CE0711	Minimum Cement Delivery Charge	1.000	660.0000	50.000	330.00
WE0853	80 BBL Vacuum Truck (Cement Services)	2.000	100.0000	50.000	100.00
CC5840	Poz-Blend I A (50:50)	68.000	13.5000	50.000	459.00
CC5965	Bentonite	214.000	0.3000	50.000	32.10
CC5326	Sodium Chloride, Salt	143.000	1.0000	50.000	71.50
CC6077	Kolseal	340.000	0.5000	50.000	85.00
CP8176	2 7/8" Top Rubber Plug	1.000	45.0000	50.000	22.50

Subtotal 3,914.70
 Discounted Amount 1,957.35
 SubTotal After Discount 1,957.35

Amount Due 4,021.92 If paid after 12/13/17

Tax: 53.61

Total: 2,010.96



PRESSURE PUMPING LLC
PO Box 884, Chanute, KS 66720
620-431-9210 or 800-467-8676

9/24/18

TICKET NUMBER 53909

LOCATION Ottawa KS

FOREMAN Fred Madra

FIELD TICKET & TREATMENT REPORT
CEMENT

Invoice #811710

DATE	CUSTOMER #	WELL NAME & NUMBER	SECTION	TOWNSHIP	RANGE	COUNTY
11-8-17	3244	Windler # A-40	NW 21	18	24	MI
CUSTOMER <u>Altavista Energy Inc.</u>			TRUCK #	DRIVER	TRUCK #	DRIVER
MAILING ADDRESS <u>P.O. Box 128</u>			712	<u>Fred Madra</u>		
CITY <u>Wellsville</u>			495	<u>Nor Bee</u>		
STATE <u>KS</u>			675	<u>Ki Det</u>		
ZIP CODE <u>66092</u>			558	<u>Mik Han</u>		

JOB TYPE Log string HOLE SIZE 5 7/8 HOLE DEPTH 540' CASING SIZE & WEIGHT 2 7/8 EUE
 CASING DEPTH 530' DRILL PIPE Bubble M TUBING @ 50' OTHER _____
 SLURRY WEIGHT _____ SLURRY VOL _____ WATER gal/sk _____ CEMENT LEFT in CASING 29' + Plug
 DISPLACEMENT 2.91 BB DISPLACEMENT PSI _____ MIX PSI _____ RATE 3 1/2 BPM

REMARKS: Hold safety meeting. Establish circulation. Mix + Pump 100% Gel Flush. Mix + Pump 68 sks Por Blend I A Cement 2% Gel 5% salt 5" Kol Seal / sk. Cement to surface. Flush pump + lines clean. Displace 2 1/2" Rubber plug to baffle in casing. Pressure to 700 PSI. Release pressure to set float valve. Shut in casing.

TDS Drilling

Fred Madra

ACCOUNT CODE	QUANTITY or UNITS	DESCRIPTION of SERVICES or PRODUCT	UNIT PRICE	TOTAL
CE0450	1	PUMP CHARGE	495	1500.00
CE0002	30 mi	MILEAGE	495	214.50
CE0711	Mini record	Ten Miles Delivery	558	660.00
WE0853	2 hrs	80 BBL Vac Truck	670	200.00
		Sub Total		2574.50
		less 50%		1287.25
CC5840	68 sks	Por Blend I A Cement	918.00	918.00
CC5965	214#	Bentonite Gel	64.20	64.20
CC5326	143#	Salt	143.00	143.00
CC6077	340#	Kol Seal	170.00	170.00
CP8176	1	2 1/2" Rubber Plug	45.00	45.00
		Sub Total		1340.20
		less 50%		670.10
			870	SALES TAX
				ESTIMATED TOTAL
				53.51
				2010.96
				(4021.23)

Ravin 3737

AUTHORIZATION _____ TITLE _____ DATE _____

I acknowledge that the payment terms, unless specifically amended in writing on the front of the form or in the customer's account records, at our office, and conditions of service on the back of this form are in effect for services identified on this form.