

Company: Petroleum Development Corp.

Well Name: McGlothlin Farms 4W-334

API: 05123400900

County/Parish: Weld

State: Colorado

Country: United States

Job number: 161-35

Field: Whiteclay

Field ID: Fieldg 161

Survey Company: Ensign Directional Services

Operator: Petroleum Development Corp.

Company Man: Brady Sharp, Joan Fallon

Daylight DD: Zach Gentry

Swim Shift DD: Chris Smalley

NIGHT DD: Tony Calbow

Daylight MWD: Justin Kert

MWD MWD: Ted Jacob

Log measurements Gamma, ROP

Log measured from: Start: 0 ft

Depth: 1473 ft

Depth measured from: Start: 0 ft

Date: 10-1-2017

Maximum temperature: 10-1-2017

Casing: Depth: Size: Mud Type: HCO

Surface: 9.56" Mud Type: HCO

Intermediate: Rep: Rmt: Rms: DP: 4539 ft

Run	Bit Size	Gamma	Survey	Start	Depth	End	Dates	End
1	12.25"	OT		1685 ft	10-5-2017			
2	8.5"	62.24 ft	57.24 ft	1685 ft	14475 ft	10-11-2017		
3								
4								
5								
6								
7								
8								
9								
10								

Ensign Directional Services uses its best efforts to provide its customers with accurate information and interpretations in conjunction with services performed but will not be held liable or responsible for the accuracy of such information or interpretation.

#25 MD(2353.00) Inc(15.2) Azm(33.6) TVD(2321.87) VS(-132.91) N-S(252.73) E-W(143.78)	#26 MD(2447.00) Inc(14.5) Azm(34.3) TVD(2413.63) VS(-122.04) N-S(273.13) E-W(157.51)	#27 MD(2543.00) Inc(14.2) Azm(33.6) TVD(2506.55) VS(-132.86) N-S(292.13) E-W(170.98)	#28 MD(2638.00) Inc(13.8) Azm(32.9) TVD(2598.71) VS(-142.86) N-S(273.21) E-W(183.48)	#29 MD(2733.00) Inc(15.4) Azm(31.8) TVD(2690.64) VS(-142.87) N-S(323.84) E-W(196.13)	#30 MD(2828.00) Inc(14.5) Azm(30.4) TVD(2783.30) VS(-150.53) N-S(375.53) E-W(230.59)	#31 MD(2923.00) Inc(14.5) Azm(28.5) TVD(2876.16) VS(-172.28) N-S(375.53) E-W(221.07)	#32 MD(3020.00) Inc(13.5) Azm(27.4) TVD(2968.26) VS(-160.52) N-S(398.11) E-W(230.20)	#33 MD(3116.00) Inc(13.1) Azm(25.8) TVD(3061.60) VS(-167.81) N-S(416.14) E-W(242.04)	#34 MD(3212.00) Inc(13.5) Azm(27.6) TVD(3155.03) VS(-166.35) N-S(436.87) E-W(272.97)	#35 MD(3308.00) Inc(14.6) Azm(26.7) TVD(3248.16) VS(-203.30) N-S(456.61) E-W(262.59)	#36 MD(3404.00) Inc(13.0) Azm(26.2) TVD(3341.38) VS(-210.89) N-S(477.11) E-W(272.80)	#37 MD(3499.00) Inc(13.5) Azm(33.9) TVD(3433.86) VS(-219.18) N-S(498.00) E-W(283.56)	#38 MD(3596.00) Inc(13.3) Azm(32.7) TVD(3527.24) VS(-228.79) N-S(520.89) E-W(295.62)	#39 MD(3691.00) Inc(15.6) Azm(31.8) TVD(3620.20) VS(-238.81) N-S(534.86) E-W(308.36)	#40 MD(3787.00) Inc(15.6) Azm(32.3) TVD(3712.86) VS(-248.78) N-S(556.63) E-W(345.04)	#41 MD(3883.00) Inc(15.7) Azm(31.6) TVD(3805.11) VS(-260.61) N-S(575.61) E-W(353.80)	#42 MD(3978.00) Inc(14.5) Azm(32.2) TVD(3896.74) VS(-277.08) N-S(590.09) E-W(364.04)	#43 MD(4074.00) Inc(13.7) Azm(31.3) TVD(3988.76) VS(-280.94) N-S(620.25) E-W(361.52)	#44 MD(4170.00) Inc(13.0) Azm(32.7) TVD(4083.17) VS(-280.23) N-S(639.06) E-W(373.26)	#45 MD(4265.00) Inc(12.6) Azm(34.8) TVD(4175.81) VS(-296.63) N-S(659.55) E-W(384.95)	#46 MD(4361.00) Inc(14.5) Azm(33.7) TVD(4269.13) VS(-308.84) N-S(675.15) E-W(397.60)	#47 MD(4457.00) Inc(14.0) Azm(31.8) TVD(4362.18) VS(-320.04) N-S(695.02) E-W(410.38)	#48 MD(4553.00) Inc(13.3) Azm(34.4) TVD(4455.47) VS(-328.92) N-S(714.00) E-W(422.74)	#49 MD(4648.00) Inc(14.5) Azm(31.6) TVD(4547.68) VS(-338.83) N-S(733.14) E-W(435.15)	#50 MD(4744.00) Inc(14.3) Azm(29.7) TVD(4640.67) VS(-348.33) N-S(755.68) E-W(447.32)	#51 MD(4840.00) Inc(13.3) Azm(29.3) TVD(4733.90) VS(-358.02) N-S(773.61) E-W(458.60)	#52 MD(4936.00) Inc(14.6) Azm(30.6) TVD(4827.06) VS(-368.98) N-S(793.61) E-W(470.16)	#53 MD(5032.00) Inc(14.3) Azm(30.2) TVD(4920.03) VS(-376.42) N-S(814.21) E-W(482.28)	#54 MD(5128.00) Inc(13.4) Azm(30.4) TVD(5013.23) VS(-385.43) N-S(834.15) E-W(493.88)	#55 MD(5223.00) Inc(11.8) Azm(29.9) TVD(5105.94) VS(-393.52) N-S(852.07) E-W(504.29)	#56 MD(5319.00) Inc(10.9) Azm(30.4) TVD(5200.06) VS(-401.88) N-S(869.41) E-W(513.76)	#57 MD(5415.00) Inc(9.6) Azm(26.2) TVD(5294.53) VS(-407.01) N-S(894.61) E-W(521.50)	#58 MD(5511.00) Inc(7.5) Azm(26.7) TVD(5389.46) VS(-411.76) N-S(896.20) E-W(528.25)	#59 MD(5607.00) Inc(6.9) Azm(19.5) TVD(5484.70) VS(-415.06) N-S(897.24) E-W(530.99)	#60 MD(5703.00) Inc(4.4) Azm(28.3) TVD(5580.23) VS(-421.67) N-S(915.32) E-W(536.67)	#61 MD(5798.00) Inc(11.8) Azm(27.6) TVD(5675.08) VS(-431.76) N-S(925.44) E-W(539.09)	#62 MD(5894.00) Inc(11.1) Azm(24.8) TVD(5771.05) VS(-430.43) N-S(935.74) E-W(543.52)	#63 MD(5990.00) Inc(11.6) Azm(40.6) TVD(5867.03) VS(-423.60) N-S(924.31) E-W(541.72)	#64 MD(6086.00) Inc(12.1) Azm(61.2) TVD(5963.00) VS(-423.16) N-S(925.41) E-W(543.48)	#65 MD(6181.00) Inc(2.6) Azm(264.7) TVD(6057.97) VS(-421.86) N-S(920.99) E-W(542.20)	#66 MD(6277.00) Inc(11.5) Azm(275.8) TVD(6153.15) VS(-410.14) N-S(928.85) E-W(530.49)	#67 MD(6401.00) Inc(115.2) Azm(283.0) TVD(6273.78) VS(-381.60) N-S(931.76) E-W(502.34)	#68 MD(6497.00) Inc(20.5) Azm(272.1) TVD(6365.16) VS(-352.31) N-S(935.21) E-W(547.25)	#69 MD(6593.00) Inc(51.9) Azm(289.9) TVD(6451.20) VS(-310.54) N-S(935.74) E-W(541.02)	#70 MD(6688.00) Inc(40.9) Azm(268.1) TVD(6529.44) VS(-254.11) N-S(934.61) E-W(543.20)	#71 MD(6784.00) Inc(48.0) Azm(265.8) TVD(6596.22) VS(-188.71) N-S(934.09) E-W(530.82)	#72 MD(6880.00) Inc(69.2) Azm(270.3) TVD(6683.10) VS(-112.69) N-S(922.57) E-W(530.76)	#73 MD(6976.00) Inc(71.8) Azm(270.2) TVD(6762.83) VS(-74.28) N-S(922.57) E-W(530.76)	#74 MD(7072.00) Inc(79.5) Azm(267.1) TVD(6716.61) VS(66.06) N-S(928.09) E-W(516.66)	#51 MD(4415.00) Inc(130.9) Azm(269.9) TVD(6735.40) VS(247.34) N-S(938.49) E-W(527.66)
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