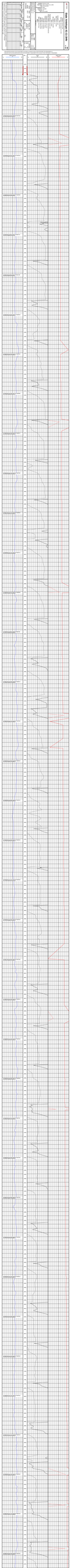

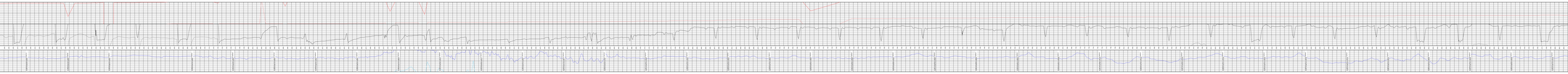

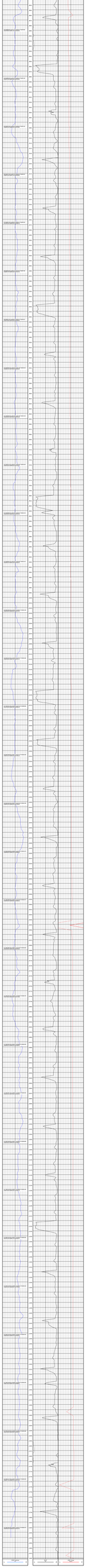

Total Directional

State Antelope 41-11-3HN

MD
5":100'

Company: Bonanza Creek
Well Name: State Antelope 41-11-3HN
API: 05-123-51725
County/Parish: Weld
State/Prov: Colorado
Country: US
Job #: Rm-221559

Company: Bonanza Creek
Well Name: State Antelope 41-11-3HN
API: 05-123-51725
County/Parish: Weld
State or Prov: Colorado
Country: US
Job number: Rm-221559
Field: DJ Basin
Rig Identification: Patterson 345
Survey Company: Total Directional Services
Company Man Frank Kinney
Company Man Josh Kliesen
DD Days Chris Apodaca
DD Nights Juan Chaparro
MWD Days Anthony DiFeo
MWD Nights Blake Stacey
MWD 3
VSD 280.02

Log measurements: 4670
Depth measured from: KB ft
Maximum temperature: 222

Depth	Date
Start: 1666 ft	11-09-2022
End: 11882 ft	11-10-2022

Casing	Depth	Size
Surface:	1666 ft	9 5/8"
Intermediate:		

Mud type: OBM
Density: 9.5
Viscosity: 50
Rm:
Rmf:
Rmc:

Elevations
KB: 4670
DF: 25
GL: 4645

Run	Bit Size	Gamma Factor	Offsets Gamma	Offsets Survey	Depths Start	Depths End	Dates Start	Dates End
1	8.5"	.565	43.00 ft	60.00 ft	1666 ft	11882 ft	11-09-2022	11-10-2022
2								
3								
4								
5								
6								
7								
8								
9								
10								

API# 05-123-51725 WELL: State Antelope 41-11-3HN Type of Log:Gamma Logging started at 10:30 AM on 11/09/2022 Ending at 12:30 on 11/10/2022 Depth Relative to Rig Floor at 4,670' Ft Elevation Logging Company: Total Directional Top of log: 1,666' Bottom of Log: 11,882'

Total 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.

XEM Gamma
API
0
200
200
400
MD
ROP
ft/hr
0
800
800
1600
XEM Temp
degrees
0
135
135
270
#19 MD(1765.00) Inc(10.57) Azm(27.56) TVD(1737.81) VS(-76.59) N/-S(243.26) E/-W(120.75)
#20 MD(1860.00) Inc(10.57) Azm(27.04) TVD(1831.20) VS(-81.76) N/-S(258.74) E/-W(128.75)
#21 MD(1954.00) Inc(10.02) Azm(26.31) TVD(1923.69) VS(-86.58) N/-S(273.75) E/-W(136.29)
#22 MD(2049.00) Inc(9.82) Azm(25.12) TVD(2017.27) VS(-91.01) N/-S(288.50) E/-W(143.39)
#23 MD(2145.00) Inc(9.65) Azm(24.73) TVD(2111.89) VS(-95.19) N/-S(303.22) E/-W(150.23)
#24 MD(2240.00) Inc(10.53) Azm(29.71) TVD(2205.42) VS(-100.13) N/-S(317.99) E/-W(157.87)
#25 MD(2334.00) Inc(10.29) Azm(29.77) TVD(2297.87) VS(-105.86) N/-S(332.74) E/-W(166.29)
#26 MD(2428.00) Inc(12.69) Azm(27.78) TVD(2389.98) VS(-111.85) N/-S(349.16) E/-W(175.27)
#27 MD(2523.00) Inc(12.40) Azm(27.63) TVD(2482.71) VS(-118.12) N/-S(367.43) E/-W(184.87)
#28 MD(2618.00) Inc(11.81) Azm(27.04) TVD(2575.60) VS(-124.05) N/-S(385.13) E/-W(194.02)
#29 MD(2713.00) Inc(11.47) Azm(26.35) TVD(2668.64) VS(-129.55) N/-S(402.25) E/-W(202.63)
#30 MD(2808.00) Inc(11.31) Azm(25.79) TVD(2761.77) VS(-134.74) N/-S(419.10) E/-W(210.88)
#31 MD(2903.00) Inc(10.47) Azm(25.73) TVD(2855.06) VS(-139.61) N/-S(435.27) E/-W(218.68)
#32 MD(2997.00) Inc(9.80) Azm(25.58) TVD(2947.59) VS(-144.07) N/-S(450.18) E/-W(225.84)
#33 MD(3116.00) Inc(10.59) Azm(26.50) TVD(3064.71) VS(-149.89) N/-S(469.10) E/-W(235.09)
#34 MD(3210.00) Inc(11.57) Azm(24.32) TVD(3156.96) VS(-154.66) N/-S(485.42) E/-W(242.83)
#35 MD(3305.00) Inc(10.84) Azm(23.88) TVD(3250.15) VS(-159.16) N/-S(502.27) E/-W(250.37)
#36 MD(3399.00) Inc(10.86) Azm(23.82) TVD(3342.47) VS(-163.39) N/-S(518.45) E/-W(257.52)
#37 MD(3494.00) Inc(10.94) Azm(23.27) TVD(3435.76) VS(-167.59) N/-S(534.92) E/-W(264.70)
#38 MD(3589.00) Inc(11.01) Azm(24.09) TVD(3529.02) VS(-171.86) N/-S(551.48) E/-W(271.96)
#39 MD(3684.00) Inc(10.90) Azm(23.28) TVD(3622.29) VS(-176.13) N/-S(568.01) E/-W(279.21)
#40 MD(3779.00) Inc(10.54) Azm(23.34) TVD(3715.63) VS(-180.19) N/-S(584.24) E/-W(286.21)
#41 MD(3874.00) Inc(12.40) Azm(22.52) TVD(3808.73) VS(-184.40) N/-S(601.64) E/-W(293.56)
#42 MD(3969.00) Inc(11.63) Azm(22.05) TVD(3901.65) VS(-188.60) N/-S(619.94) E/-W(301.06)
#43 MD(4063.00) Inc(10.38) Azm(21.75) TVD(3993.92) VS(-192.30) N/-S(636.59) E/-W(307.75)
#44 MD(4158.00) Inc(9.10) Azm(25.66) TVD(4087.55) VS(-196.06) N/-S(651.31) E/-W(314.18)
#45 MD(4252.00) Inc(12.06) Azm(26.64) TVD(4179.94) VS(-200.88) N/-S(666.79) E/-W(321.80)
#46 MD(4347.00) Inc(10.98) Azm(26.32) TVD(4273.02) VS(-206.25) N/-S(683.77) E/-W(330.26)
#47 MD(4442.00) Inc(12.36) Azm(26.24) TVD(4366.06) VS(-211.63) N/-S(701.00) E/-W(338.77)
#48 MD(4536.00) Inc(11.02) Azm(22.93) TVD(4458.11) VS(-216.45) N/-S(718.30) E/-W(346.72)
#49 MD(4631.00) Inc(13.80) Azm(23.83) TVD(4550.88) VS(-221.19) N/-S(737.03) E/-W(354.84)
#50 MD(4726.00) Inc(12.79) Azm(22.97) TVD(4643.33) VS(-226.25) N/-S(757.08) E/-W(363.52)
#51 MD(4820.00) Inc(11.91) Azm(22.61) TVD(4735.15) VS(-230.69) N/-S(775.61) E/-W(371.31)
#52 MD(4914.00) Inc(11.27) Azm(26.68) TVD(4827.24) VS(-235.44) N/-S(792.78) E/-W(379.16)
#53 MD(5008.00) Inc(11.30) Azm(30.37) TVD(4919.42) VS(-241.28) N/-S(808.93) E/-W(387.94)
#54 MD(5102.00) Inc(11.73) Azm(40.46) TVD(5011.54) VS(-249.32) N/-S(824.15) E/-W(398.80)
#55 MD(5197.00) Inc(11.84) Azm(35.08) TVD(5104.54) VS(-258.34) N/-S(839.47) E/-W(410.67)

#56 MD(5292.00) Inc(10.58) Azm(31.80) TVD(5197.73)
VS(-265.71) N/-S(854.86) E/-W(420.86)
#57 MD(5387.00) Inc(11.55) Azm(32.89) TVD(5290.96)
VS(-272.64) N/-S(870.26) E/-W(430.63)
#58 MD(5482.00) Inc(13.45) Azm(27.87) TVD(5383.71)
VS(-279.72) N/-S(888.01) E/-W(440.96)
#59 MD(5672.00) Inc(13.15) Azm(23.62) TVD(5568.61)
VS(-291.58) N/-S(927.35) E/-W(459.95)
#60 MD(5766.00) Inc(10.66) Azm(355.56) TVD(5660.66)
VS(-291.92) N/-S(945.83) E/-W(463.56)
#61 MD(5861.00) Inc(12.04) Azm(319.19) TVD(5753.92)
VS(-282.03) N/-S(962.11) E/-W(456.39)
#62 MD(5956.00) Inc(18.87) Azm(315.14) TVD(5845.43)
VS(-261.76) N/-S(980.52) E/-W(439.06)
#63 MD(6051.00) Inc(26.16) Azm(291.77) TVD(5933.30)
VS(-228.58) N/-S(999.24) E/-W(408.68)
#64 MD(6146.00) Inc(31.30) Azm(282.03) TVD(6016.63)
VS(-183.36) N/-S(1012.17) E/-W(365.04)
#65 MD(6241.00) Inc(39.79) Azm(275.75) TVD(6093.88)
VS(-128.27) N/-S(1020.38) E/-W(310.54)
#66 MD(6336.00) Inc(49.31) Azm(271.04) TVD(6161.52)
VS(-62.21) N/-S(1024.08) E/-W(244.11)
#67 MD(6431.00) Inc(61.22) Azm(269.35) TVD(6215.55)
VS(14.56) N/-S(1024.27) E/-W(166.19)
#68 MD(6525.00) Inc(73.52) Azm(269.93) TVD(6251.65)
VS(99.74) N/-S(1023.74) E/-W(79.59)
#69 MD(6619.00) Inc(81.96) Azm(269.87) TVD(6271.60)
VS(190.09) N/-S(1023.58) E/-W(-12.18)
#70 MD(6714.00) Inc(89.81) Azm(270.00) TVD(6278.41)
VS(283.31) N/-S(1023.47) E/-W(-106.86)
#71 MD(6809.00) Inc(88.93) Azm(269.62) TVD(6279.45)
VS(376.80) N/-S(1023.16) E/-W(-201.85)
#72 MD(6903.00) Inc(89.42) Azm(269.64) TVD(6280.81)
VS(469.24) N/-S(1022.55) E/-W(-295.84)
#73 MD(6998.00) Inc(89.45) Azm(269.40) TVD(6281.74)
VS(562.65) N/-S(1021.76) E/-W(-390.83)
#74 MD(7092.00) Inc(89.21) Azm(269.60) TVD(6282.84)
VS(655.06) N/-S(1020.94) E/-W(-484.82)
#75 MD(7187.00) Inc(89.91) Azm(269.88) TVD(6283.57)
VS(748.53) N/-S(1020.50) E/-W(-579.82)
#76 MD(7282.00) Inc(89.66) Azm(270.24) TVD(6283.93)
VS(842.10) N/-S(1020.60) E/-W(-674.82)
#77 MD(7377.00) Inc(89.53) Azm(269.92) TVD(6284.60)
VS(935.67) N/-S(1020.74) E/-W(-769.82)
#78 MD(7472.00) Inc(89.66) Azm(269.81) TVD(6285.27)
VS(1029.18) N/-S(1020.51) E/-W(-864.81)
#79 MD(7567.00) Inc(90.17) Azm(269.77) TVD(6285.41)
VS(1122.67) N/-S(1020.16) E/-W(-959.81)
#80 MD(7661.00) Inc(89.47) Azm(268.34) TVD(6285.71)
VS(1214.95) N/-S(1018.61) E/-W(-1053.80)
#81 MD(7756.00) Inc(88.66) Azm(267.76) TVD(6287.26)
VS(1307.87) N/-S(1015.38) E/-W(-1148.73)
#82 MD(7850.00) Inc(88.36) Azm(267.17) TVD(6289.70)
VS(1399.59) N/-S(1011.23) E/-W(-1242.60)
#83 MD(7945.00) Inc(88.82) Azm(266.94) TVD(6292.04)
VS(1492.14) N/-S(1006.35) E/-W(-1337.45)
#84 MD(8039.00) Inc(88.07) Azm(266.91) TVD(6294.59)
VS(1583.66) N/-S(1001.31) E/-W(-1431.28)
#85 MD(8134.00) Inc(90.07) Azm(268.94) TVD(6296.13)
VS(1676.53) N/-S(997.87) E/-W(-1526.19)
#86 MD(8229.00) Inc(90.14) Azm(268.96) TVD(6295.96)
VS(1769.77) N/-S(996.13) E/-W(-1621.18)
#87 MD(8324.00) Inc(90.51) Azm(268.76) TVD(6295.42)
VS(1862.97) N/-S(994.24) E/-W(-1716.16)
#88 MD(8418.00) Inc(91.53) Azm(268.77) TVD(6293.75)
VS(1955.14) N/-S(992.21) E/-W(-1810.12)
#89 MD(8511.00) Inc(90.13) Azm(269.96) TVD(6292.40)
VS(2046.53) N/-S(991.18) E/-W(-1903.10)
#90 MD(8606.00) Inc(89.45) Azm(270.66) TVD(6292.75)
VS(2140.17) N/-S(991.70) E/-W(-1998.10)
#91 MD(8701.00) Inc(89.99) Azm(270.83) TVD(6293.21)
VS(2233.92) N/-S(992.93) E/-W(-2093.09)
#92 MD(8795.00) Inc(87.89) Azm(270.15) TVD(6294.95)
VS(2326.60) N/-S(993.73) E/-W(-2187.06)
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#93 MD(8890.00) Inc(87.12) Azm(268.64) TVD(6299.09)
VS(2419.88) N/-S(992.73) E/-W(-2281.96)

#94 MD(8985.00) Inc(90.22) Azm(269.63) TVD(6301.29)
VS(2513.14) N/-S(991.30) E/-W(-2376.91)

#95 MD(9079.00) Inc(89.50) Azm(268.69) TVD(6301.52)
VS(2605.45) N/-S(989.92) E/-W(-2470.90)

#96 MD(9173.00) Inc(88.73) Azm(268.20) TVD(6302.97)
VS(2697.53) N/-S(987.37) E/-W(-2564.85)

#97 MD(9267.00) Inc(88.50) Azm(268.41) TVD(6305.25)
VS(2789.54) N/-S(984.59) E/-W(-2658.78)

#98 MD(9362.00) Inc(88.24) Azm(267.86) TVD(6307.95)
VS(2882.47) N/-S(981.50) E/-W(-2753.70)

#99 MD(9457.00) Inc(89.80) Azm(268.22) TVD(6309.57)
VS(2975.38) N/-S(978.25) E/-W(-2848.62)

#100 MD(9552.00) Inc(89.64) Azm(267.48) TVD(6310.04)
VS(3068.24) N/-S(974.69) E/-W(-2943.55)

#101 MD(9646.00) Inc(89.18) Azm(267.48) TVD(6311.00)
VS(3160.00) N/-S(970.56) E/-W(-3037.46)

#102 MD(9741.00) Inc(88.92) Azm(266.60) TVD(6312.58)
VS(3252.56) N/-S(965.65) E/-W(-3132.32)

#103 MD(9836.00) Inc(90.35) Azm(269.67) TVD(6313.19)
VS(3345.50) N/-S(962.56) E/-W(-3227.25)

#104 MD(9931.00) Inc(90.55) Azm(269.09) TVD(6312.44)
VS(3438.87) N/-S(961.53) E/-W(-3322.24)

#105 MD(10026.00) Inc(90.46) Azm(268.57) TVD(6311.60)
VS(3532.06) N/-S(959.59) E/-W(-3417.22)

#106 MD(10120.00) Inc(90.69) Azm(267.97) TVD(6310.66)
VS(3624.08) N/-S(956.75) E/-W(-3511.17)

#107 MD(10214.00) Inc(90.35) Azm(271.34) TVD(6309.80)
VS(3716.53) N/-S(956.19) E/-W(-3605.15)

#108 MD(10309.00) Inc(88.71) Azm(271.14) TVD(6310.58)
VS(3810.41) N/-S(958.24) E/-W(-3700.12)

#109 MD(10404.00) Inc(89.11) Azm(270.53) TVD(6312.39)
VS(3904.18) N/-S(959.63) E/-W(-3795.09)

#110 MD(10498.00) Inc(88.84) Azm(270.43) TVD(6314.07)
VS(3996.86) N/-S(960.42) E/-W(-3889.08)

#111 MD(10593.00) Inc(88.51) Azm(270.25) TVD(6316.27)
VS(4090.48) N/-S(960.98) E/-W(-3984.05)

#112 MD(10687.00) Inc(88.57) Azm(270.00) TVD(6318.66)
VS(4183.05) N/-S(961.18) E/-W(-4078.02)

#113 MD(10781.00) Inc(88.85) Azm(269.85) TVD(6320.78)
VS(4275.58) N/-S(961.06) E/-W(-4171.99)

#114 MD(10876.00) Inc(88.41) Azm(268.89) TVD(6323.05)
VS(4368.91) N/-S(960.02) E/-W(-4266.96)

#115 MD(10971.00) Inc(88.09) Azm(268.54) TVD(6325.95)
VS(4462.02) N/-S(957.89) E/-W(-4361.89)

#116 MD(11066.00) Inc(88.37) Azm(268.34) TVD(6328.89)
VS(4555.05) N/-S(955.30) E/-W(-4456.81)

#117 MD(11160.00) Inc(88.04) Azm(268.00) TVD(6331.83)
VS(4647.00) N/-S(952.30) E/-W(-4550.72)

#118 MD(11254.00) Inc(89.51) Azm(269.40) TVD(6333.84)
VS(4739.14) N/-S(950.17) E/-W(-4644.67)

#119 MD(11349.00) Inc(89.99) Azm(269.01) TVD(6334.26)
VS(4832.45) N/-S(948.85) E/-W(-4739.66)

#120 MD(11444.00) Inc(89.92) Azm(268.72) TVD(6334.33)
VS(4925.66) N/-S(946.97) E/-W(-4834.64)

#121 MD(11538.00) Inc(89.88) Azm(268.54) TVD(6334.50)
VS(5017.81) N/-S(944.72) E/-W(-4928.61)

#122 MD(11633.00) Inc(89.66) Azm(268.12) TVD(6334.88)
VS(5110.84) N/-S(941.95) E/-W(-5023.57)

#123 MD(11727.00) Inc(89.75) Azm(267.87) TVD(6335.36)
VS(5202.77) N/-S(938.67) E/-W(-5117.51)

#124 MD(11822.00) Inc(89.81) Azm(267.73) TVD(6335.73)
VS(5295.62) N/-S(935.02) E/-W(-5212.44)