



Crestone Peak Resources

Schlumberger

Plan 1

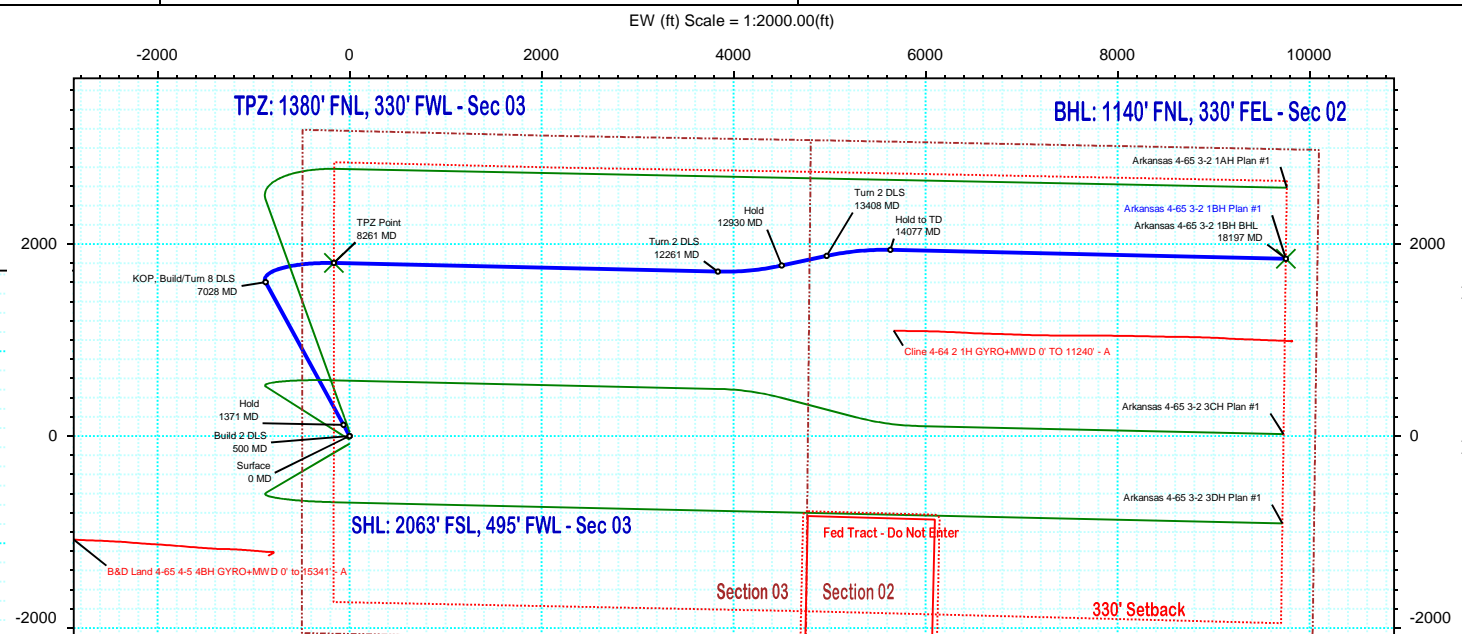
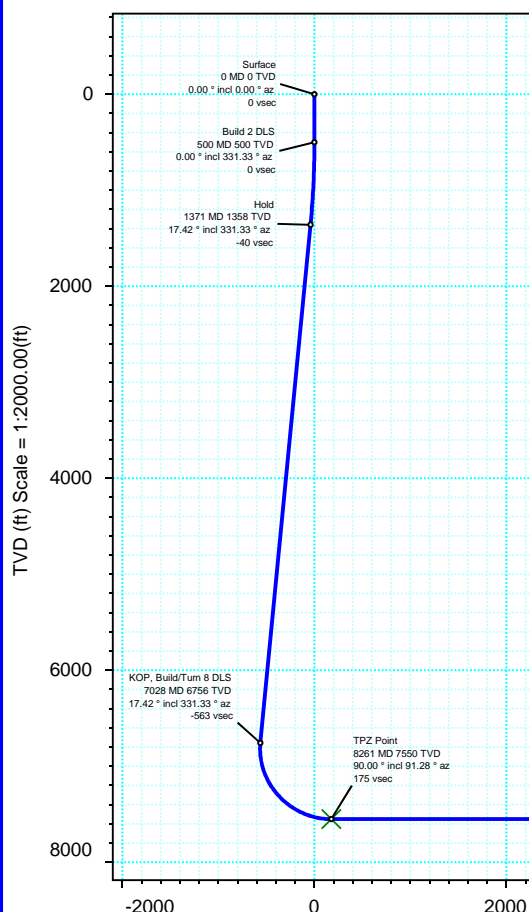
Borehole:	Well:	Field:	Structure:
Original Hole	Arkansas 4-65 3-2 1BH	CO, Arapahoe County (NAD 83 CZ)	Crestone Peak 03-04S-64W (Arkansas 4-65 3-2 Pad)

Gravity & Magnetic Parameters				Surface Location				Miscellaneous			
Model:	HDGM 2021	Dip:	66.356°	Date:	21-Jul-2021	Lat:	N 39 43 48.33	Northing:	1692230.15ftUS	Grid Conv:	0.6029°
MagDec:	8.335°	FS:	51513.523nT	Gravity FS:	998.935mgN (9.80665 Based)	Lon:	W 104 32 38.66	Easting:	3268861.41ftUS	Scale Fact:	0.99999612
								Slot:			
								Arkansas 4-65 3-2 1BH			
								TVD Ref:			
								KB 13ft(5624.3ft above MSL)			
								Plan:			
								Arkansas 4-65 3-2 1BH Plan #1			

Proposal



True North
Tot Corr (M->T 8.335°)
Mag Dec (8.335°)
Grid Conv (0.603°)



Target Description		Surface Location		Grid Coord		Local Coord	
		Northing:	1692230.15242663	Easting:	3268861.4127859	Latitude:	N 39 43 48.33
		Longitude:	W 104 32 38.66	VSec Azimuth:	79.28		
Arkansas 4-65 3-2 Pad Sec 2-3	N 39 43 48.72	W 104 32 38.66	1692269.86	3268860.99	5624.30	7.39	39.71
Arkansas 4-65 3-2 Pad - Fed Tract 2 - 50'	N 39 43 48.72	W 104 32 38.66	1692269.86	3268860.99	5624.30	7.39	39.71
Arkansas 4-65 3-2 Pad Sec 2-3 - 330' SB	N 39 43 48.72	W 104 32 38.66	1692269.86	3268860.99	5624.30	7.39	39.71
Arkansas 4-65 3-2 Pad - Fed Tract 2	N 39 43 48.72	W 104 32 38.66	1692269.86	3268860.99	5624.30	7.39	39.71
Arkansas 4-65 3-2 1BH TPZ	N 39 44 6.13	W 104 32 40.74	1694029.65	3268679.63	7550.00	175.06	1801.32
Arkansas 4-65 3-2 1BH BHL	N 39 44 6.56	W 104 30 33.83	1694178.81	3278593.50	7550.00	9925.32	1846.16

Critical Points								
Critical Point	MD	INCL	AZIM	TVD	VSEC	N(+)/S(-)	E(+)/W(-)	DLS
Surface	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Build 2 DLS	500.00	0.00	331.33	500.00	0.00	0.00	0.00	0.00
Hold	1370.97	17.42	331.33	1357.62	-40.50	115.27	-63.04	2.00
KOP, Build/Turn 8 DLS	7028.40	17.42	331.33	6755.59	-562.52	1601.23	-875.64	0.00
TPZ Point	8260.85	90.00	91.28	7550.00	175.06	1801.32	-162.84	8.00
Turn 2 DLS	12260.85	90.00	91.28	7550.00	4087.65	1711.96	3836.16	0.00
Hold	12930.12	90.00	77.89	7550.00	4752.54	1774.95	4500.94	2.00
Turn 2 DLS	13408.17	90.00	77.89	7550.00	5230.45	1875.21	4968.36	0.00
Hold to TD	14077.45	90.00	91.28	7550.00	5895.35	1938.20	5633.14	2.00
Arkansas 4-65 3-2 1BH BHL	18197.45	90.00	91.28	7550.00	9925.32	1846.16	9752.11	0.00

Vertical Section (ft) Azim = 79.28° Scale = 1:2000.00(ft) Origin = 0N/-S, 0E/-W

Arkansas 4-65 3-2 1BH Plan #1 Proposal Geodetic Report



(Def Plan)

Report Date: July 21, 2021 - 02:09 PM
Client: Crestone Peak Resources
Field: CO, Arapahoe County (NAD 83 CZ)
Structure / Slot: Crestone Peak 03-04S-64W (Arkansas 4-65 3-2 Pad) / Arkansas 4-65 3-2 1BH
Well: Arkansas 4-65 3-2 1BH
Borehole: Original Hole
UWI / API#: Unknown / Unknown
Survey Name: Arkansas 4-65 3-2 1BH Plan #1
Survey Date: July 21, 2021
Tort / AHD / DDI / ERD Ratio: 142.786 ° / 12563.272 ft / 6.636 / 1.664
Coordinate Reference System: NAD83 Colorado State Plane, Central Zone, US Feet
Location Lat / Long: N 39° 43' 48.33120", W 104° 32' 38.65560"
Location Grid N/E/Y/X: N 1692230.152 ftUS, E 3268861.413 ftUS
CRS Grid Convergence Angle: 0.6029 °
Grid Scale Factor: 0.99999612
Version / Patch: 2.10.825.0

Survey / DLS Computation: Minimum Curvature / Lubinski
Vertical Section Azimuth: 79.280 ° (True North)
Vertical Section Origin: 0.000 ft, 0.000 ft
TVD Reference Datum: KB 13ft
TVD Reference Elevation: 5624.300 ft above MSL
Seabed / Ground Elevation: 5611.300 ft above MSL
Magnetic Declination: 8.335 °
Total Gravity Field Strength: 998.9352mgn (9.80665 Based)
Gravity Model: GARM
Total Magnetic Field Strength: 51513.523 nT
Magnetic Dip Angle: 66.356 °
Declination Date: July 21, 2021
Magnetic Declination Model: HDGM 2021
North Reference: True North
Grid Convergence Used: 0.0000 °
Total Corr Mag North->True North: 8.3352 °
Local Coord Referenced To: Well Head

Comments	MD (ft)	Incl (°)	Azim True (°)	TVD (ft)	TVDSS (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (°)	Longitude (°)
Surface	0.00	0.00	0.00	0.00	-5624.30	0.00	0.00	0.00	N/A	1692230.15	3268861.41	39.730092	-104.544071
	100.00	0.00	331.33	100.00	-5524.30	0.00	0.00	0.00	0.00	1692230.15	3268861.41	39.730092	-104.544071
	200.00	0.00	331.33	200.00	-5424.30	0.00	0.00	0.00	0.00	1692230.15	3268861.41	39.730092	-104.544071
	300.00	0.00	331.33	300.00	-5324.30	0.00	0.00	0.00	0.00	1692230.15	3268861.41	39.730092	-104.544071
	400.00	0.00	331.33	400.00	-5224.30	0.00	0.00	0.00	0.00	1692230.15	3268861.41	39.730092	-104.544071
	500.00	0.00	331.33	500.00	-5124.30	0.00	0.00	0.00	0.00	1692230.15	3268861.41	39.730092	-104.544071
	600.00	2.00	331.33	599.98	-5024.32	-0.54	1.53	-0.84	2.00	1692231.67	3268860.56	39.730096	-104.544074
	700.00	4.00	331.33	699.84	-4924.46	-2.15	6.12	-3.35	2.00	1692236.24	3268858.00	39.730109	-104.544083
	800.00	6.00	331.33	799.45	-4824.85	-4.84	13.77	-7.53	2.00	1692243.84	3268853.74	39.730130	-104.544098
	900.00	8.00	331.33	898.70	-4725.60	-8.59	24.46	-13.38	2.00	1692254.47	3268847.78	39.730159	-104.544119
Build 2 DLS	1000.00	10.00	331.33	997.47	-4626.83	-13.41	38.19	-20.88	2.00	1692268.12	3268840.13	39.730197	-104.544145
	1100.00	12.00	331.33	1095.62	-4528.68	-19.30	54.93	-30.04	2.00	1692284.76	3268830.80	39.730243	-104.544178
	1200.00	14.00	331.33	1193.06	-4431.24	-26.23	74.66	-40.83	2.00	1692304.38	3268819.80	39.730297	-104.544216
	1300.00	16.00	331.33	1289.64	-4334.66	-34.21	97.37	-53.25	2.00	1692326.96	3268807.14	39.730359	-104.544260
	1370.97	17.42	331.33	1357.62	-4266.68	-40.50	115.27	-63.04	2.00	1692344.75	3268797.17	39.730408	-104.544295
	1400.00	17.42	331.33	1385.31	-4238.99	-43.17	122.90	-67.21	0.00	1692352.33	3268792.92	39.730429	-104.544310
	1500.00	17.42	331.33	1480.73	-4143.57	-52.40	149.16	-81.57	0.00	1692378.45	3268778.28	39.730501	-104.544361
	1600.00	17.42	331.33	1576.14	-4048.16	-61.63	175.43	-95.93	0.00	1692404.56	3268763.64	39.730574	-104.544412
	1700.00	17.42	331.33	1671.55	-3952.75	-70.86	201.69	-110.30	0.00	1692430.67	3268749.00	39.730646	-104.544463
	1800.00	17.42	331.33	1766.97	-3857.33	-80.08	227.96	-124.66	0.00	1692456.79	3268734.36	39.730718	-104.544514
Hold	1900.00	17.42	331.33	1862.38	-3761.92	-89.31	254.22	-139.02	0.00	1692482.90	3268719.72	39.730790	-104.544565
	2000.00	17.42	331.33	1957.80	-3666.50	-98.54	280.49	-153.39	0.00	1692509.01	3268705.08	39.730862	-104.544616
	2100.00	17.42	331.33	2053.21	-3571.09	-107.77	306.76	-167.75	0.00	1692535.12	3268690.44	39.730934	-104.544667
	2200.00	17.42	331.33	2148.62	-3475.68	-116.99	333.02	-182.11	0.00	1692561.24	3268675.81	39.731006	-104.544718
	2300.00	17.42	331.33	2244.04	-3380.26	-126.22	359.29	-196.48	0.00	1692587.35	3268661.17	39.731078	-104.544770
	2400.00	17.42	331.33	2339.45	-3284.85	-135.45	385.55	-210.84	0.00	1692613.46	3268646.53	39.731150	-104.544821
	2500.00	17.42	331.33	2434.87	-3189.43	-144.67	411.82	-225.20	0.00	1692639.58	3268631.89	39.731223	-104.544872
	2600.00	17.42	331.33	2530.28	-3094.02	-153.90	438.08	-239.57	0.00	1692665.69	3268617.25	39.731295	-104.544923
	2700.00	17.42	331.33	2625.69	-2998.61	-163.13	464.35	-253.93	0.00	1692691.80	3268602.61	39.731367	-104.544974
	2800.00	17.42	331.33	2721.11	-2903.19	-172.36	490.61	-268.30	0.00	1692717.91	3268587.97	39.731439	-104.545025
	2900.00	17.42	331.33	2816.52	-2807.78	-181.58	516.88	-282.66	0.00	1692744.03	3268573.33	39.731511	-104.545076
	3000.00	17.42	331.33	2911.94	-2712.36	-190.81	543.15	-297.02	0.00	1692770.14	3268558.69	39.731583	-104.545127
	3100.00	17.42	331.33	3007.35	-2616.95	-200.04	569.41	-311.39	0.00	1692796.25	3268544.05	39.731655	-104.545178
	3200.00	17.42	331.33	3102.76	-2521.54	-209.27	595.68	-325.75	0.00	1692822.37	3268529.42	39.731727	-104.545229
	3300.00	17.42	331.33	3198.18	-2426.12	-218.49	621.94	-340.11	0.00	1692848.48	3268514.78	39.731799	-104.545280
	3400.00	17.42	331.33	3293.59	-2330.71	-227.72	648.21	-354.48	0.00	1692874.59	3268500.14	39.731871	-104.545331
	3500.00	17.42	331.33	3389.00	-2235.30	-236.95	674.47	-368.84	0.00	1692900.70	3268485.50	39.731944	-104.545382
	3600.00	17.42	331.33	3484.42	-2139.88	-246.17	700.74	-383.20	0.00	1692926.82	3268470.86	39.732016	-104.545433
	3700.00	17.42	331.33	3579.83	-2044.47	-255.40	727.01	-397.57	0.00	1692952.93	3268456.22	39.732088	-104.545484
	3800.00	17.42	331.33	3675.25	-1949.05	-264.63	753.27	-411.93	0.00	1692979.04	3268441.58	39.732160	-104.545535
	3900.00	17.42	331.33	3770.66	-1853.64	-273.86	779.54	-426.29	0.00	1693005.16	3268426.94	39.732232	-104.545586
	4000.00	17.42	331.33	3866.07	-1758.23	-283.08	805.80	-440.66	0.00	1693031.27	3268412.30	39.732304	-104.545637
	4100.00	17.42	331.33	3961.49	-1662.81	-292.31	832.07	-455.02	0.00	1693057.38	3268397.67	39.732376	-104.545688
	4200.00	17.42	331.33	4056.90	-1567.40	-301.54	858.33	-469.38	0.00	1693083.49	3268383.03	39.732448	-104.545740
	4300.00	17.42	331.33	4152.32	-1471.98	-310.77	884.60	-483.75	0.00	1693109.61	3268368.39	39.732520	-104.545791
	4400.00	17.42	331.33	4247.73	-1376.57	-319.99	910.86	-498.11	0.00	1693135.72	3268353.75	39.732593	-104.545842
	4500.00	17.42	331.33	4343.14	-1281.16	-329.22	937.13	-512.47	0.00	1693161.83	3268339.11	39.732665	-104.545893
	4600.00	17.42	331.33	4438.56	-1185.74	-338.45	963.40	-526.84	0.00	1693187.95	3268324.47	39.732737	-104.545944
	4700.00	17.42	331.33	4533.97	-1090.33	-347.67	989.66	-541.20	0.00	1693214.06	3268309.83	39.732809	-104.545995
	4800.00	17.42	331.33	4629.39	-994.91	-356.90	1015.93	-555.56	0.00	1693240.17	3268295.19	39.732881	-104.546046
	4900.00	17.42	331.33	4724.80	-900.50	-366.13	1042.19	-569.83	0.00	1693266.28	3268280.55	39.732953	-104.546097
	5000.00	17.42	331.33	4820.21	-804.09	-375.36	1068.46	-584.29	0.00	1693292.40	3268265.91	39.733025	-104.546148
	5100.00	17.42	331.33	4915.63	-708.67	-384.58	1094.72	-598.65	0.00	1693318.51	3268251.28	39.733097	-104.546200
	5200.00	17.42	331.33	5011.04	-613.26	-393.81	1120.99	-613.02	0.00	1693344.62	3268236.64	39.733169	-104.546251
	5300.00	17.42	331.33	5106.45	-517.85	-403.04	1147.25	-627.38	0.00	1693370.74	3268222.00	39.733241	-104.546302
	5400.00	17.42	331.33	5201.87	-422.43	-412.27	1173.52	-641.75	0.00	1693396.85	3268207.36	39.733314	-104.546353
	5500.00	17.42	331.33	5297.28	-327.02	-421.49	1199.79	-656.11	0.00	1693422.96	3268192.72	39.733386	-104.546404
	5600.00	17.42	331.33	5392.70	-231.60	-430.72	1226.05	-670.47	0.00	1693449.07	3268178.08	39.733458	-104.546455
	5700.00	17.42	331.33	5488.11	-136.19	-439.95	1252.32	-684.84	0.00	1693475.19	3268163.44	39.733530	-104.546506
	5800.00	17.42	331.33	5583.52	-40.78	-449.17	1278.58	-699.20	0.00	1693501.30	3268148.80	39.733602	-104.546557
5900.00	17.42	331.33	5678.94	54.64	-458.40	1304.85	-713.56	0.00	1693527.41	3268134.16	39.733674	-104.546608	
6000.00	17.42	331.33	5774.35	150.05	-467.63	1331.11	-727.93	0.00	1693553.53	3268119.53	39.733746	-104.546659	
6100.00	17.42	331.33	5869.77	245.47	-476.86	1357.38	-742.29	0.00	1693579.64	3268104.89	39.733818	-104.546710	
6200.00	17.42	331.33	5965.18	340.88	-486.08	1383.65	-756.65	0.00	1693605.75	3268090.25	39.733890	-104.546761	
6300.00	17.42	331.33	6060.59	436.29	-495.31	1409.91	-771.02	0.00	1693631.86	3268075.61	39.733962	-104.546812	
6400.00	17.42	331.33	6156.01	531.71	-504.54	1436.18	-785.38	0.00	1693657.98	3268060.97	39.734035	-104.546863	
6500.00	17.42	331.33	6251.42	627.12	-513.76	1462.44	-799.74	0.00	1693684.09	3268046.33	39.734107	-104.546914	
6600.00	17.42	331.33	6346.84	722.54	-522.99	1488.71	-814.11	0.00	1693710.20	3268031.69	39.734179	-104.546965	
6700.00	17.42	331.33	6442.25	817.95	-532.22	1514.97	-828.47	0.00	1693736.32	32			

Comments	MD (ft)	Incl (°)	Azim True (°)	TVD (ft)	TVDSS (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (°)	Longitude (°)
TPZ Point	8260.85	90.00	91.28	7550.00	1925.70	175.06	1801.32	-162.84	8.00	1694029.65	3268679.63	39.735037	-104.544650
	8300.00	90.00	91.28	7550.00	1925.70	213.35	1800.44	-123.70	0.00	1694029.18	3268718.78	39.735035	-104.544511
	8400.00	90.00	91.28	7550.00	1925.70	311.17	1798.21	-23.72	0.00	1694028.00	3268818.77	39.735028	-104.544155
	8500.00	90.00	91.28	7550.00	1925.70	408.98	1795.97	76.25	0.00	1694026.82	3268918.76	39.735022	-104.543800
	8600.00	90.00	91.28	7550.00	1925.70	506.80	1793.74	176.23	0.00	1694025.64	3269018.75	39.735016	-104.543444
	8700.00	90.00	91.28	7550.00	1925.70	604.61	1791.51	276.20	0.00	1694024.46	3269118.75	39.735010	-104.543089
	8800.00	90.00	91.28	7550.00	1925.70	702.43	1789.27	376.18	0.00	1694023.27	3269218.74	39.735004	-104.542733
	8900.00	90.00	91.28	7550.00	1925.70	800.24	1787.04	476.15	0.00	1694022.09	3269318.73	39.734998	-104.542378
	9000.00	90.00	91.28	7550.00	1925.70	898.06	1784.81	576.13	0.00	1694020.91	3269418.72	39.734992	-104.542023
	9100.00	90.00	91.28	7550.00	1925.70	995.87	1782.57	676.10	0.00	1694019.73	3269518.72	39.734986	-104.541667
	9200.00	90.00	91.28	7550.00	1925.70	1093.69	1780.34	776.08	0.00	1694018.55	3269618.71	39.734979	-104.541312
	9300.00	90.00	91.28	7550.00	1925.70	1191.50	1778.10	876.05	0.00	1694017.37	3269718.70	39.734973	-104.540956
	9400.00	90.00	91.28	7550.00	1925.70	1289.32	1775.87	976.03	0.00	1694016.18	3269818.69	39.734967	-104.540601
	9500.00	90.00	91.28	7550.00	1925.70	1387.13	1773.64	1076.00	0.00	1694015.00	3269918.69	39.734961	-104.540245
	9600.00	90.00	91.28	7550.00	1925.70	1484.95	1771.40	1175.98	0.00	1694013.82	3270018.68	39.734955	-104.539890
	9700.00	90.00	91.28	7550.00	1925.70	1582.76	1769.17	1275.95	0.00	1694012.64	3270118.67	39.734949	-104.539534
	9800.00	90.00	91.28	7550.00	1925.70	1680.57	1766.93	1375.93	0.00	1694011.46	3270218.66	39.734943	-104.539179
	9900.00	90.00	91.28	7550.00	1925.70	1778.39	1764.70	1475.90	0.00	1694010.27	3270318.66	39.734936	-104.538823
	10000.00	90.00	91.28	7550.00	1925.70	1876.20	1762.47	1575.88	0.00	1694009.09	3270418.65	39.734930	-104.538468
	10100.00	90.00	91.28	7550.00	1925.70	1974.02	1760.23	1675.85	0.00	1694007.91	3270518.64	39.734924	-104.538112
	10200.00	90.00	91.28	7550.00	1925.70	2071.83	1758.00	1775.83	0.00	1694006.73	3270618.63	39.734918	-104.537757
	10300.00	90.00	91.28	7550.00	1925.70	2169.65	1755.77	1875.80	0.00	1694005.55	3270718.63	39.734912	-104.537401
	10400.00	90.00	91.28	7550.00	1925.70	2267.46	1753.53	1975.78	0.00	1694004.37	3270818.62	39.734906	-104.537046
	10500.00	90.00	91.28	7550.00	1925.70	2365.28	1751.30	2075.75	0.00	1694003.18	3270918.61	39.734899	-104.536690
	10600.00	90.00	91.28	7550.00	1925.70	2463.09	1749.06	2175.73	0.00	1694002.00	3271018.60	39.734893	-104.536335
	10700.00	90.00	91.28	7550.00	1925.70	2560.91	1746.83	2275.70	0.00	1694000.82	3271118.60	39.734887	-104.535979
	10800.00	90.00	91.28	7550.00	1925.70	2658.72	1744.60	2375.68	0.00	1693999.64	3271218.59	39.734881	-104.535624
	10900.00	90.00	91.28	7550.00	1925.70	2756.54	1742.36	2475.65	0.00	1693998.46	3271318.58	39.734875	-104.535269
	11000.00	90.00	91.28	7550.00	1925.70	2854.35	1740.13	2575.63	0.00	1693997.28	3271418.57	39.734869	-104.534913
	11100.00	90.00	91.28	7550.00	1925.70	2952.17	1737.89	2675.60	0.00	1693996.09	3271518.57	39.734863	-104.534558
11200.00	90.00	91.28	7550.00	1925.70	3049.98	1735.66	2775.58	0.00	1693994.91	3271618.56	39.734856	-104.534202	
11300.00	90.00	91.28	7550.00	1925.70	3147.80	1733.43	2875.55	0.00	1693993.73	3271718.55	39.734850	-104.533847	
11400.00	90.00	91.28	7550.00	1925.70	3245.61	1731.19	2975.53	0.00	1693992.55	3271818.54	39.734844	-104.533491	
11500.00	90.00	91.28	7550.00	1925.70	3343.43	1728.96	3075.50	0.00	1693991.37	3271918.54	39.734838	-104.533136	
11600.00	90.00	91.28	7550.00	1925.70	3441.24	1726.73	3175.48	0.00	1693990.19	3272018.53	39.734832	-104.532780	
11700.00	90.00	91.28	7550.00	1925.70	3539.06	1724.49	3275.45	0.00	1693989.00	3272118.52	39.734826	-104.532425	
11800.00	90.00	91.28	7550.00	1925.70	3636.87	1722.26	3375.43	0.00	1693987.82	3272218.51	39.734819	-104.532069	
11900.00	90.00	91.28	7550.00	1925.70	3734.69	1720.02	3475.40	0.00	1693986.64	3272318.50	39.734813	-104.531714	
12000.00	90.00	91.28	7550.00	1925.70	3832.50	1717.79	3575.38	0.00	1693985.46	3272418.50	39.734807	-104.531358	
12100.00	90.00	91.28	7550.00	1925.70	3930.32	1715.56	3675.35	0.00	1693984.28	3272518.49	39.734801	-104.531003	
Turn 2 DLS	12200.00	90.00	91.28	7550.00	1925.70	4028.13	1713.32	3775.33	0.00	1693983.09	3272618.48	39.734795	-104.530647
	12260.85	90.00	91.28	7550.00	1925.70	4087.65	1711.96	3836.16	0.00	1693982.38	3272679.33	39.734791	-104.530431
	12300.00	90.00	90.50	7550.00	1925.70	4126.00	1711.36	3875.31	2.00	1693982.18	3272718.48	39.734789	-104.530292
	12400.00	90.00	88.50	7550.00	1925.70	4224.41	1712.23	3975.30	2.00	1693984.11	3272818.45	39.734792	-104.529936
	12500.00	90.00	86.50	7550.00	1925.70	4323.38	1716.60	4075.20	2.00	1693989.53	3272918.30	39.734804	-104.529581
	12600.00	90.00	84.50	7550.00	1925.70	4422.79	1724.45	4174.89	2.00	1693998.43	3273017.90	39.734825	-104.529227
	12700.00	90.00	82.50	7550.00	1925.70	4522.61	1735.78	4274.24	2.00	1694010.80	3273117.12	39.734856	-104.528873
	12800.00	90.00	80.50	7550.00	1925.70	4622.43	1750.56	4373.13	2.00	1694026.62	3273215.86	39.734977	-104.528522
	12900.00	90.00	78.50	7550.00	1925.70	4722.42	1768.79	4471.45	2.00	1694045.88	3273313.98	39.734947	-104.528172
	12930.12	90.00	77.89	7550.00	1925.70	4752.54	1774.95	4500.94	2.00	1694052.36	3273343.40	39.734964	-104.528067
	13000.00	90.00	77.89	7550.00	1925.70	4822.40	1789.61	4569.26	0.00	1694067.73	3273411.56	39.735004	-104.527824
	13100.00	90.00	77.89	7550.00	1925.70	4922.37	1810.58	4667.04	0.00	1694089.73	3273509.11	39.735061	-104.527477
	13200.00	90.00	77.89	7550.00	1925.70	5022.34	1831.55	4764.81	0.00	1694111.73	3273606.66	39.735119	-104.527129
	13300.00	90.00	77.89	7550.00	1925.70	5122.31	1852.52	4862.59	0.00	1694133.72	3273704.21	39.735176	-104.526781
	13400.00	90.00	77.89	7550.00	1925.70	5222.28	1873.49	4960.37	0.00	1694155.72	3273801.76	39.735234	-104.526434
	13408.17	90.00	77.89	7550.00	1925.70	5230.45	1875.21	4968.36	0.00	1694157.52	3273809.74	39.735239	-104.526405
	13500.00	90.00	79.73	7550.00	1925.70	5322.27	1893.02	5058.44	2.00	1694176.28	3273899.62	39.735287	-104.526085
	13600.00	90.00	81.73	7550.00	1925.70	5422.23	1909.13	5157.13	2.00	1694193.43	3273998.13	39.735332	-104.525734
	13700.00	90.00	83.73	7550.00	1925.70	5522.05	1921.78	5256.32	2.00	1694207.12	3274097.19	39.735366	-104.525381
	13800.00	90.00	85.73	7550.00	1925.70	5621.59	1930.96	5355.89	2.00	1694217.35	3274196.66	39.735391	-104.525027
	13900.00	90.00	87.73	7550.00	1925.70	5720.74	1936.66	5455.72	2.00	1694224.10	3274296.42	39.735407	-104.524672
	14000.00	90.00	89.73	7550.00	1925.70	5819.38	1938.88	5555.69	2.00	1694227.37	3274396.36	39.735413	-104.524317
	14077.45	90.0											

Comments	MD (ft)	Incl (°)	Azim True (°)	TVD (ft)	TVDSS (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (°)	Longitude (°)
		1	0.000	13.000	1/100.000	13.500	9.625		NAL_MWD-NON_SLB-Depth Only		Original Hole / Arkansas 4-65 3-2 1BH Plan #1		
		1	13.000	2200.000	1/100.000	13.500	9.625		NAL_MWD-NON_SLB		Original Hole / Arkansas 4-65 3-2 1BH Plan #1		
		1	2200.000	18197.450	1/100.000	8.500	5.500		NAL_MWD_PLUS_0.5_DEG		Original Hole / Arkansas 4-65 3-2 1BH Plan #1		

Arkansas 4-65 3-2 1BH Plan #1 Anti-Collision Summary Report

Analysis Date-24hr Time: July 21, 2021 - 14:10
Client: Crestone Peak Resources
Field: CO, Arapahoe County (NAD 83 CZ)

Analysis Method: 3D Least Distance
Reference Trajectory: Arkansas 4-65 3-2 1BH Plan #1 (Def Plan)
Depth Interval: Every 10.00 Measured Depth (ft)

Structure: Crestone Peak 03-04S-64W (Arkansas 4-65 3-2 Pad)
Slot: Arkansas 4-65 3-2 1BH
Well: Arkansas 4-65 3-2 1BH
Borehole: Original Hole
Scan MD Range: 0.00ft - 18197.45ft

Rule Set: NAL Procedure: D&M AntiCollision Standard S002
Min Pts: All local minima indicated.
Version / Patch: 2.10.825.0
Database \ Project: localhost\drilling-Colorado

Trajectory Error Model: ISCWSA0 3-D 95.000% Confidence 2.7955 sigma, for subject well. For offset wells, error model version is specified with each well respectively.

Offset Trajectories Summary

Offset Selection Criteria

Wellhead distance scan: Not performed!
 Selection filters: Definitive Surveys - Definitive Plans - Definitive surveys exclude definitive plans
 - All Non-Def Surveys when no Def-Survey is set in a borehole - All Non-Def Plans when no Def-Plan is set in a borehole

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		

Results highlighted: Sep-Factor separation <= 1.50 ft

Arkansas 4-65 3-2 1AH Plan #1
(Def Plan)

Fail Minor

39.71	31.96	38.72	7.75	N/A	MAS = 9.74 (m)	0.00	0.00	ClCt<=15m<15.00				Enter Alert	
39.71	31.96	38.72	7.75	N/A	MAS = 9.74 (m)	13.00	13.00					WRP	
39.71	31.96	35.93	7.75	13.90	MAS = 9.74 (m)	500.00	500.00					MinPts	
40.63	31.96	34.95	8.67	8.52	MAS = 9.74 (m)	810.00	809.40					MINPT-O-EOU	
49.20	31.96	39.05	17.24	5.26	MAS = 9.74 (m)	1340.00	1328.02	ClCt<=15m>15.00				Exit Alert	
51.94	31.96	40.74	19.98	4.99	MAS = 9.74 (m)	1420.00	1404.40	OSF<5.00				Enter Alert	
56.22	31.96	43.98	24.26	4.91	MAS = 9.74 (m)	1500.00	1480.73					MinPt-O-SF	
62.92	31.96	49.55	30.96	5.00	MAS = 9.74 (m)	1590.00	1566.60	OSF>5.00				Exit Alert	
810.28	88.33	751.07	721.95	13.90	OSF1.50	7028.40	6755.59					MinPt-O-SF	
982.56	83.86	926.32	898.70	17.77	OSF1.50	8250.00	7549.92					MinPt-CtCt	
992.27	298.46	792.97	693.81	5.00	OSF1.50	11950.00	7550.00	OSF<5.00				Enter Alert	
732.36	448.56	433.00	283.80	2.45	OSF1.50	14070.00	7550.00					MinPt-CtCt	
742.92	743.47	246.95	-0.55	1.50	OSF1.50	18100.00	7550.00			OSF<1.50		Enter Minor	
743.19	751.13	242.11	-7.94	1.48	OSF1.50	18197.45	7550.00					MinPts	

Arkansas 4-65 3-2 3CH Plan #1
(Def Plan)

Warning Alert

40.07	32.25	39.09	7.82	N/A	MAS = 9.83 (m)	0.00	0.00	ClCt<=15m<15.00				Enter Alert	
40.07	32.25	39.09	7.82	N/A	MAS = 9.83 (m)	13.00	13.00					WRP	
40.07	32.25	36.30	7.82	14.03	MAS = 9.83 (m)	500.00	500.00					MinPts	
40.13	32.25	36.24	7.88	13.46	MAS = 9.83 (m)	520.00	520.00					MINPT-O-EOU	
47.63	32.25	42.51	15.38	11.29	MAS = 9.83 (m)	720.00	719.78					MinPt-O-SF	
48.10	32.25	43.85	16.85	11.29	MAS = 9.83 (m)	740.00	739.72	ClCt<=15m>15.00				Exit Alert	
283.59	32.25	267.14	251.34	18.29	MAS = 9.83 (m)	2200.00	2148.62					MinPt-O-SF	
1036.05	76.98	984.40	959.07	20.43	OSF1.50	6810.00	6547.20					MinPt-O-SF	
1223.13	65.94	1178.84	1157.19	28.22	OSF1.50	8290.00	7550.00					MinPt-CtCt	
1224.20	315.88	1013.28	908.32	5.83	OSF1.50	12330.00	7550.00					MINPT-O-EOU	
1225.01	316.85	1013.45	908.16	5.81	OSF1.50	12350.00	7550.00					MinPt-O-SF	
1247.77	326.56	1029.74	921.21	5.74	OSF1.50	12560.00	7550.00					MinPt-O-ADP	
1828.60	549.82	1461.72	1278.78	4.99	OSF1.50	15550.00	7550.00	OSF<5.00				Enter Alert	
1828.60	744.99	1331.61	1083.61	3.68	OSF1.50	18197.45	7550.00					MinPts	

Cline 4-64 2 1H GYRO+MWD
0' TO 11240' - A (Def Survey)

Warning Alert

9417.56	85.93	9359.67	9331.63	167.90	OSF1.50	0.00	0.00					Surface	
9407.29	86.10	9349.29	9321.20	167.39	OSF1.50	13.00	13.00					WRP	
8453.07	83.09	8397.07	8369.97	155.96	OSF1.50	1310.00	1299.25					MinPt-O-SF	
7930.68	77.85	7878.18	7852.84	156.42	OSF1.50	2190.00	2139.08					MinPt-O-SF	
6584.65	79.77	6529.85	6504.88	131.76	OSF1.50	6610.00	6356.38					MinPt-CtCt	
6584.84	80.29	6529.69	6504.55	130.88	OSF1.50	6660.00	6404.08					MINPT-O-EOU	
6585.02	80.50	6529.73	6504.52	130.53	OSF1.50	6680.00	6423.17					MinPt-O-ADP	
1093.85	336.51	867.12	757.33	4.95	OSF1.50	13330.00	7550.00	OSF<5.00				Enter Alert	
849.70	459.90	542.57	389.80	2.78	OSF1.50	14120.00	7550.00					MinPts	
849.33	457.58	543.74	391.75	2.79	OSF1.50	14210.00	7550.00					MinPt-CtCt	
849.12	451.50	547.58	397.61	2.83	OSF1.50	14450.00	7550.00					MinPt-CtCt	
859.21	457.06	553.97	402.15	2.82	OSF1.50	16710.00	7550.00					MinPt-CtCt	
858.20	471.32	543.45	386.88	2.74	OSF1.50	17190.00	7550.00					MinPt-CtCt	
861.90	484.73	538.21	377.17	2.67	OSF1.50	17560.00	7550.00					MINPT-O-EOU	
867.01	492.01	538.47	375.00	2.65	OSF1.50	17730.00	7550.00					MinPts	
867.26	492.24	538.57	375.02	2.65	OSF1.50	17740.00	7550.00					MinPt-O-SF	
918.51	476.32	600.42	442.19	2.90	OSF1.50	18197.45	7550.00					TD	

Arkansas 4-65 3-2 3DH Plan #1
(Def Plan)

Pass

80.14	32.81	79.16	47.33	N/A	MAS = 10.00 (m)	0.00	0.00					Surface	
80.14	32.81	79.16	47.33	N/A	MAS = 10.00 (m)	13.00	13.00					WRP	
80.14	32.81	76.37	47.33	28.41	MAS = 10.00 (m)	500.00	500.00					MinPts	
80.20	32.81	76.31	47.39	27.23	MAS = 10.00 (m)	520.00	520.00					MINPT-O-EOU	
104.14	32.81	97.94	71.33	19.79	MAS = 10.00 (m)	890.00	888.80					MinPt-O-SF	
2188.32	74.33	2138.44	2113.99	44.73	OSF1.50	7028.40	6755.59					MinPt-O-SF	
2494.18	322.43	2278.90	2171.75	11.63	OSF1.50	12400.00	7550.00					MINPT-O-EOU	
2498.44	327.51	2279.77	2170.93	11.47	OSF1.50	12470.00	7550.00					MinPt-O-ADP	
2757.28	745.77	2259.78	2011.52	5.55	OSF1.50	18197.45	7550.00					MinPts	

B&D Land 4-65 4-5 4BH
GYRO+MWD 0' to 15341' - A
(Def Survey)

Pass

1499.15	32.81	1497.34	1466.35	N/A	MAS = 10.00 (m)	0.00	0.00					MinPts	
1499.16	32.81	1497.33	1466.35	125496.10	MAS = 10.00 (m)	13.00	13.00					WRP	
1499.24	32.81	1497.27	1466.43	9867.48	MAS = 10.00 (m)	60.00	60.00					MINPT-O-EOU	
1499.70	32.81	1497.27	1466.89	2459.21	MAS = 10.00 (m)	150.00	150.00					MINPT-O-EOU	
1501.72	32.81	1497.65	1468.91	663.40	MAS = 10.00 (m)	510.00	510.00					MINPT-O-EOU	
2812.46	58.61	2772.85	2753.85	73.98	OSF1.50	7028.40	6755.59					MinPt-O-SF	
2830.65	59.19	2790.65	2771.46	73.69	OSF1.50	7100.00	6824.31					MinPt-O-SF	
2896.65	61.49	2855.12	2835.15	72.51	OSF1.50	7380.00	7089.95					MinPt-O-SF	
3165.61	56.64	3127.32	3108.97	86.24	OSF1.50	8470.00	7550.00					MinPt-O-SF	
3193.09	57.06	3154.51	3136.02	86.32	OSF1.50	8570.00	7550.00					MinPt-O-SF	

...Arkansas 4-65 3-2 1BH\Original Hole\Arkansas 4-65 3-2 1BH Plan #1

Offset Trajectory	Separation			Allow Dev. (ft)	Sep. Fact.	Controlling Rule	Reference Trajectory		Risk Level			Alert	Status
	Ct-Ct (ft)	MAS (ft)	EOU (ft)				MD (ft)	TVD (ft)	Alert	Minor	Major		
	4067.40	80.25	4013.36	3987.15	77.55	OSF1.50	10350.00	7550.00					MinPt-O-SF
	4106.88	81.00	4052.35	4025.89	77.55	OSF1.50	10410.00	7550.00					MinPt-O-SF
	10992.44	113.89	10915.98	10878.55	146.83	OSF1.50	18197.45	7550.00					TD