

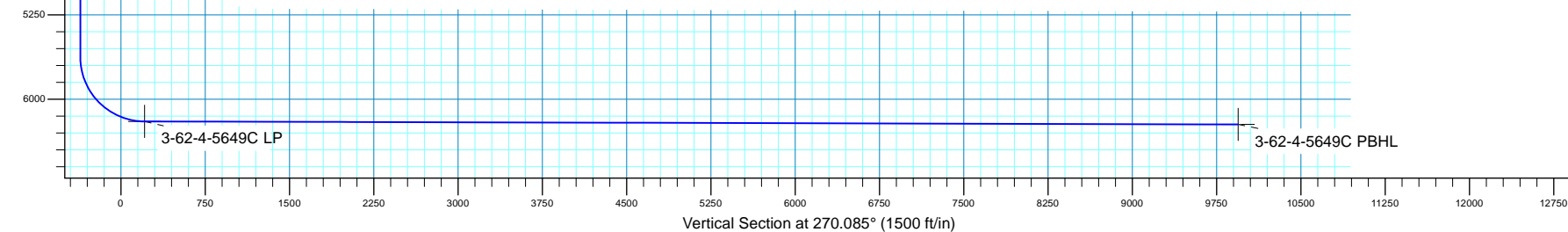
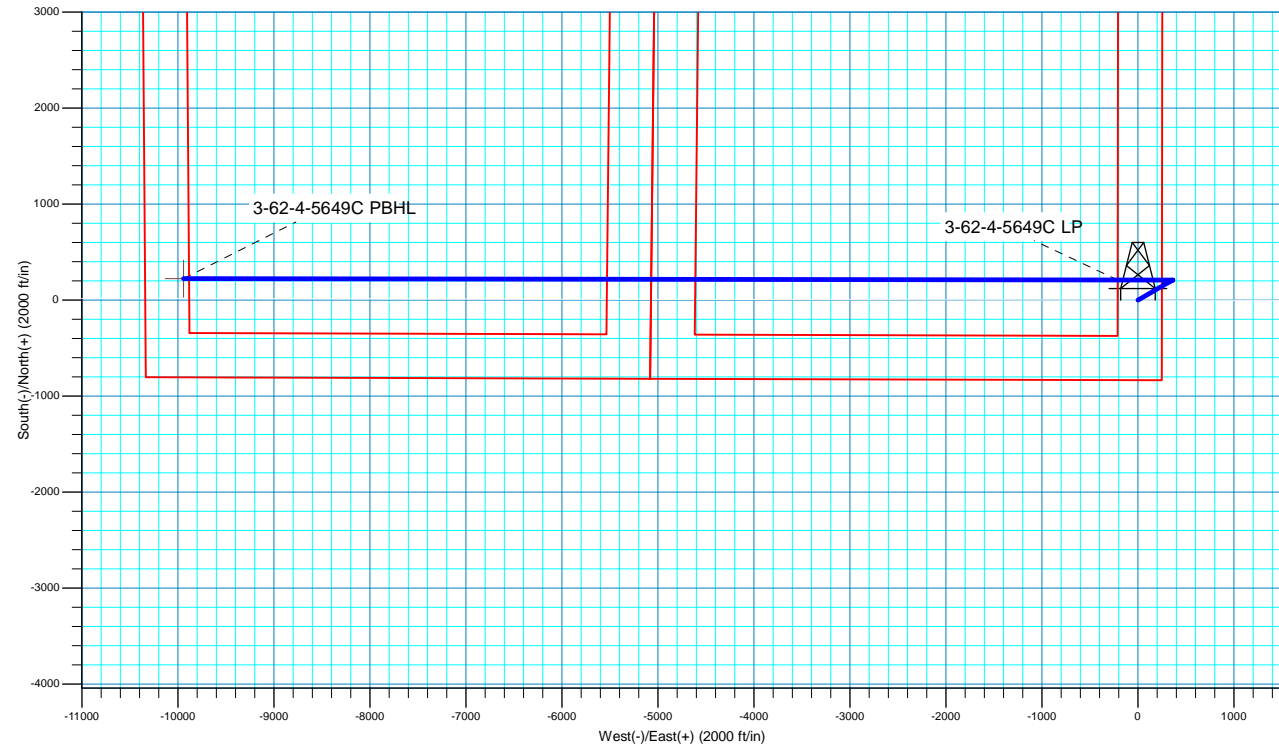
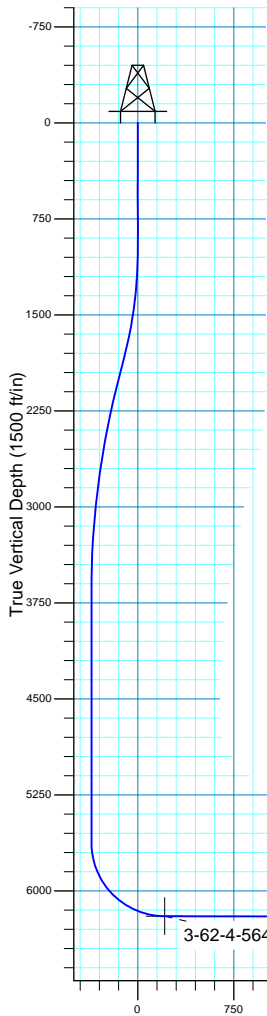


SECTION DETAILS

MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	VSect
0.00	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00
1000.00	0.00	0.000	1000.00	0.00	0.00	0.00	0.00	0.00
1802.21	16.04	60.046	1791.76	55.72	96.68	2.00	60.05	-96.60
2102.83	16.04	60.046	2080.68	97.20	168.67	0.00	0.00	-168.52
3707.24	0.00	0.000	3664.20	208.63	362.03	1.00	180.00	-361.72
5667.08	0.00	0.000	5624.04	208.63	362.03	0.00	0.00	-361.72
6565.49	89.84	270.085	6197.00	209.47	-209.34	10.00	270.08	209.65
16297.78	89.84	270.085	6224.00	223.86	-9941.58	0.00	0.00	9941.90

WELL DETAILS: Anschutz Equus Farm 3-62-4-5649C

		GL 4591.4' & KB 20' @ 4611.40ft				
+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	
0.00	0.00	1336114.15	3329293.69	40° 15' 0.068 N	104° 19' 12.850 W	





Bill Barrett Corporation

Bill Barrett Corp.

Weld County, CO NAD 83

Anschutz Equus Farms 3-62-4_5 SESE Pad

Anschutz Equus Farm 3-62-4-5649C

OH

Plan: Plan 1

Standard Planning Report

06 September, 2017



Scientific Drilling

www.scientificdrilling.com



Database:	Casper District	Local Co-ordinate Reference:	Well Anschutz Equus Farm 3-62-4-5649C
Company:	Bill Barrett Corp.	TVD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Project:	Weld County, CO NAD 83	MD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Site:	Anschutz Equus Farms 3-62-4_5 SESE Pad	North Reference:	True
Well:	Anschutz Equus Farm 3-62-4-5649C	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	Plan 1		

Project	Weld County, CO NAD 83		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Colorado Northern Zone		

Site	Anschutz Equus Farms 3-62-4_5 SESE Pad, Site Center : Anschutz Equus Farm 3-62-4-4148C			
Site Position:		Northing:	1,336,129.47 usft	Latitude: 40° 15' 0.220 N
From:	Lat/Long	Easting:	3,329,293.49 usft	Longitude: 104° 19' 12.850 W
Position Uncertainty:	0.00 ft	Slot Radius:	13.200 in	Grid Convergence: 0.76 °

Well	Anschutz Equus Farm 3-62-4-5649C, 835' FSL 250' FEL Sec 4 T3N R62W			
Well Position	+N/-S	-15.31 ft	Northing:	1,336,114.16 usft
	+E/-W	0.00 ft	Easting:	3,329,293.69 usft
Position Uncertainty		0.00 ft	Wellhead Elevation:	0.00 ft
			Ground Level:	4,591.40 ft

Wellbore	OH				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	HDGM	9/6/2017	8.27	66.92	52,359

Design	Plan 1			
Audit Notes:				
Version:	Phase:	PLAN	Tie On Depth:	0.00
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	0.00	0.00	0.00	270.085

Plan Sections										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	TFO (°)	Target
0.00	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
1,000.00	0.00	0.000	1,000.00	0.00	0.00	0.00	0.00	0.00	0.00	
1,802.21	16.04	60.046	1,791.76	55.72	96.68	2.00	2.00	0.00	60.05	
2,102.83	16.04	60.046	2,080.68	97.20	168.67	0.00	0.00	0.00	0.00	
3,707.24	0.00	0.000	3,664.20	208.63	362.03	1.00	-1.00	0.00	180.00	
5,667.08	0.00	0.000	5,624.04	208.63	362.03	0.00	0.00	0.00	0.00	
6,565.49	89.84	270.085	6,197.00	209.47	-209.34	10.00	10.00	-10.01	270.08	
16,297.78	89.84	270.085	6,224.00	223.86	-9,941.58	0.00	0.00	0.00	0.00	3-62-4-5649C PBHL

Database:	Casper District	Local Co-ordinate Reference:	Well Anschutz Equus Farm 3-62-4-5649C
Company:	Bill Barrett Corp.	TVD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Project:	Weld County, CO NAD 83	MD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Site:	Anschutz Equus Farms 3-62-4_5 SESE Pad	North Reference:	True
Well:	Anschutz Equus Farm 3-62-4-5649C	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	Plan 1		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
0.00	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00
100.00	0.00	0.000	100.00	0.00	0.00	0.00	0.00	0.00	0.00
200.00	0.00	0.000	200.00	0.00	0.00	0.00	0.00	0.00	0.00
300.00	0.00	0.000	300.00	0.00	0.00	0.00	0.00	0.00	0.00
400.00	0.00	0.000	400.00	0.00	0.00	0.00	0.00	0.00	0.00
500.00	0.00	0.000	500.00	0.00	0.00	0.00	0.00	0.00	0.00
600.00	0.00	0.000	600.00	0.00	0.00	0.00	0.00	0.00	0.00
700.00	0.00	0.000	700.00	0.00	0.00	0.00	0.00	0.00	0.00
800.00	0.00	0.000	800.00	0.00	0.00	0.00	0.00	0.00	0.00
900.00	0.00	0.000	900.00	0.00	0.00	0.00	0.00	0.00	0.00
1,000.00	0.00	0.000	1,000.00	0.00	0.00	0.00	0.00	0.00	0.00
Start Build 2.00									
1,100.00	2.00	60.046	1,099.98	0.87	1.51	-1.51	2.00	2.00	0.00
1,200.00	4.00	60.046	1,199.84	3.48	6.05	-6.04	2.00	2.00	0.00
1,300.00	6.00	60.046	1,299.45	7.84	13.60	-13.59	2.00	2.00	0.00
1,400.00	8.00	60.046	1,398.70	13.92	24.16	-24.14	2.00	2.00	0.00
1,500.00	10.00	60.046	1,497.47	21.73	37.71	-37.68	2.00	2.00	0.00
1,600.00	12.00	60.046	1,595.62	31.26	54.24	-54.19	2.00	2.00	0.00
1,700.00	14.00	60.046	1,693.06	42.49	73.73	-73.67	2.00	2.00	0.00
1,800.00	16.00	60.046	1,789.64	55.41	96.15	-96.07	2.00	2.00	0.00
1,802.21	16.04	60.046	1,791.76	55.72	96.68	-96.60	2.00	2.00	0.00
Start 300.62 hold at 1802.21 MD									
1,900.00	16.04	60.046	1,885.75	69.21	120.10	-120.00	0.00	0.00	0.00
2,000.00	16.04	60.046	1,981.85	83.01	144.05	-143.92	0.00	0.00	0.00
2,100.00	16.04	60.046	2,077.96	96.81	167.99	-167.85	0.00	0.00	0.00
2,102.83	16.04	60.046	2,080.68	97.20	168.67	-168.52	0.00	0.00	0.00
Start Drop -1.00									
2,200.00	15.07	60.046	2,174.29	110.21	191.25	-191.09	1.00	-1.00	0.00
2,300.00	14.07	60.046	2,271.07	122.78	213.05	-212.87	1.00	-1.00	0.00
2,400.00	13.07	60.046	2,368.27	134.49	233.38	-233.18	1.00	-1.00	0.00
2,500.00	12.07	60.046	2,465.87	145.36	252.24	-252.03	1.00	-1.00	0.00
2,600.00	11.07	60.046	2,563.84	155.38	269.62	-269.39	1.00	-1.00	0.00
2,700.00	10.07	60.046	2,662.14	164.54	285.52	-285.27	1.00	-1.00	0.00
2,800.00	9.07	60.046	2,760.75	172.84	299.93	-299.67	1.00	-1.00	0.00
2,900.00	8.07	60.046	2,859.63	180.28	312.84	-312.57	1.00	-1.00	0.00
3,000.00	7.07	60.046	2,958.76	186.86	324.26	-323.98	1.00	-1.00	0.00
3,100.00	6.07	60.046	3,058.10	192.58	334.18	-333.89	1.00	-1.00	0.00
3,200.00	5.07	60.046	3,157.62	197.43	342.59	-342.30	1.00	-1.00	0.00
3,300.00	4.07	60.046	3,257.30	201.41	349.50	-349.20	1.00	-1.00	0.00
3,400.00	3.07	60.046	3,357.11	204.52	354.89	-354.59	1.00	-1.00	0.00
3,500.00	2.07	60.046	3,457.01	206.76	358.78	-358.48	1.00	-1.00	0.00
3,600.00	1.07	60.046	3,556.97	208.13	361.16	-360.85	1.00	-1.00	0.00
3,700.00	0.07	60.046	3,656.96	208.63	362.03	-361.72	1.00	-1.00	0.00
3,707.24	0.00	0.000	3,664.20	208.63	362.03	-361.72	1.00	-1.00	0.00
Start 1959.84 hold at 3707.24 MD									
3,800.00	0.00	0.000	3,756.96	208.63	362.03	-361.72	0.00	0.00	0.00
3,900.00	0.00	0.000	3,856.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,000.00	0.00	0.000	3,956.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,100.00	0.00	0.000	4,056.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,200.00	0.00	0.000	4,156.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,300.00	0.00	0.000	4,256.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,400.00	0.00	0.000	4,356.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,500.00	0.00	0.000	4,456.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,600.00	0.00	0.000	4,556.96	208.63	362.03	-361.72	0.00	0.00	0.00

Database:	Casper District	Local Co-ordinate Reference:	Well Anschutz Equus Farm 3-62-4-5649C
Company:	Bill Barrett Corp.	TVD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Project:	Weld County, CO NAD 83	MD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Site:	Anschutz Equus Farms 3-62-4_5 SESE Pad	North Reference:	True
Well:	Anschutz Equus Farm 3-62-4-5649C	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	Plan 1		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
4,700.00	0.00	0.000	4,656.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,800.00	0.00	0.000	4,756.96	208.63	362.03	-361.72	0.00	0.00	0.00
4,900.00	0.00	0.000	4,856.96	208.63	362.03	-361.72	0.00	0.00	0.00
5,000.00	0.00	0.000	4,956.96	208.63	362.03	-361.72	0.00	0.00	0.00
5,100.00	0.00	0.000	5,056.96	208.63	362.03	-361.72	0.00	0.00	0.00
5,200.00	0.00	0.000	5,156.96	208.63	362.03	-361.72	0.00	0.00	0.00
5,300.00	0.00	0.000	5,256.96	208.63	362.03	-361.72	0.00	0.00	0.00
5,400.00	0.00	0.000	5,356.96	208.63	362.03	-361.72	0.00	0.00	0.00
5,500.00	0.00	0.000	5,456.96	208.63	362.03	-361.72	0.00	0.00	0.00
5,600.00	0.00	0.000	5,556.96	208.63	362.03	-361.72	0.00	0.00	0.00
5,667.08	0.00	0.000	5,624.04	208.63	362.03	-361.72	0.00	0.00	0.00
Start DLS 10.00 TFO 270.08									
5,700.00	3.29	270.085	5,656.94	208.63	361.08	-360.77	10.00	10.00	0.00
5,800.00	13.29	270.085	5,755.77	208.65	346.68	-346.37	10.00	10.00	0.00
5,900.00	23.29	270.085	5,850.60	208.70	315.33	-315.02	10.00	10.00	0.00
6,000.00	33.29	270.085	5,938.54	208.77	268.00	-267.69	10.00	10.00	0.00
6,100.00	43.29	270.085	6,016.93	208.86	206.11	-205.80	10.00	10.00	0.00
6,200.00	53.29	270.085	6,083.38	208.97	131.55	-131.24	10.00	10.00	0.00
6,300.00	63.29	270.085	6,135.87	209.10	46.58	-46.27	10.00	10.00	0.00
6,400.00	73.29	270.085	6,172.81	209.23	-46.21	46.52	10.00	10.00	0.00
6,500.00	83.29	270.085	6,193.08	209.38	-144.00	144.31	10.00	10.00	0.00
6,565.49	89.84	270.085	6,197.00	209.47	-209.34	209.65	10.00	10.00	0.00
Start 9732.29 hold at 6565.49 MD									
6,600.00	89.84	270.085	6,197.09	209.53	-243.85	244.16	0.00	0.00	0.00
6,700.00	89.84	270.085	6,197.37	209.67	-343.85	344.16	0.00	0.00	0.00
6,800.00	89.84	270.085	6,197.65	209.82	-443.85	444.16	0.00	0.00	0.00
6,900.00	89.84	270.085	6,197.92	209.97	-543.85	544.16	0.00	0.00	0.00
7,000.00	89.84	270.085	6,198.20	210.12	-643.85	644.16	0.00	0.00	0.00
7,100.00	89.84	270.085	6,198.48	210.26	-743.85	744.16	0.00	0.00	0.00
7,200.00	89.84	270.085	6,198.76	210.41	-843.85	844.16	0.00	0.00	0.00
7,300.00	89.84	270.085	6,199.03	210.56	-943.85	944.16	0.00	0.00	0.00
7,400.00	89.84	270.085	6,199.31	210.71	-1,043.85	1,044.16	0.00	0.00	0.00
7,500.00	89.84	270.085	6,199.59	210.86	-1,143.84	1,144.16	0.00	0.00	0.00
7,600.00	89.84	270.085	6,199.87	211.00	-1,243.84	1,244.16	0.00	0.00	0.00
7,700.00	89.84	270.085	6,200.14	211.15	-1,343.84	1,344.16	0.00	0.00	0.00
7,800.00	89.84	270.085	6,200.42	211.30	-1,443.84	1,444.16	0.00	0.00	0.00
7,900.00	89.84	270.085	6,200.70	211.45	-1,543.84	1,544.15	0.00	0.00	0.00
8,000.00	89.84	270.085	6,200.98	211.59	-1,643.84	1,644.15	0.00	0.00	0.00
8,100.00	89.84	270.085	6,201.25	211.74	-1,743.84	1,744.15	0.00	0.00	0.00
8,200.00	89.84	270.085	6,201.53	211.89	-1,843.84	1,844.15	0.00	0.00	0.00
8,300.00	89.84	270.085	6,201.81	212.04	-1,943.84	1,944.15	0.00	0.00	0.00
8,400.00	89.84	270.085	6,202.09	212.19	-2,043.84	2,044.15	0.00	0.00	0.00
8,500.00	89.84	270.085	6,202.36	212.33	-2,143.84	2,144.15	0.00	0.00	0.00
8,600.00	89.84	270.085	6,202.64	212.48	-2,243.84	2,244.15	0.00	0.00	0.00
8,700.00	89.84	270.085	6,202.92	212.63	-2,343.84	2,344.15	0.00	0.00	0.00
8,800.00	89.84	270.085	6,203.20	212.78	-2,443.84	2,444.15	0.00	0.00	0.00
8,900.00	89.84	270.085	6,203.47	212.93	-2,543.84	2,544.15	0.00	0.00	0.00
9,000.00	89.84	270.085	6,203.75	213.07	-2,643.84	2,644.15	0.00	0.00	0.00
9,100.00	89.84	270.085	6,204.03	213.22	-2,743.84	2,744.15	0.00	0.00	0.00
9,200.00	89.84	270.085	6,204.31	213.37	-2,843.84	2,844.15	0.00	0.00	0.00
9,300.00	89.84	270.085	6,204.58	213.52	-2,943.84	2,944.15	0.00	0.00	0.00
9,400.00	89.84	270.085	6,204.86	213.66	-3,043.84	3,044.15	0.00	0.00	0.00
9,500.00	89.84	270.085	6,205.14	213.81	-3,143.83	3,144.15	0.00	0.00	0.00

Database:	Casper District	Local Co-ordinate Reference:	Well Anschutz Equus Farm 3-62-4-5649C
Company:	Bill Barrett Corp.	TVD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Project:	Weld County, CO NAD 83	MD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Site:	Anschutz Equus Farms 3-62-4_5 SESE Pad	North Reference:	True
Well:	Anschutz Equus Farm 3-62-4-5649C	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	Plan 1		

Planned Survey										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	
9,600.00	89.84	270.085	6,205.42	213.96	-3,243.83	3,244.15	0.00	0.00	0.00	
9,700.00	89.84	270.085	6,205.69	214.11	-3,343.83	3,344.15	0.00	0.00	0.00	
9,800.00	89.84	270.085	6,205.97	214.26	-3,443.83	3,444.15	0.00	0.00	0.00	
9,900.00	89.84	270.085	6,206.25	214.40	-3,543.83	3,544.15	0.00	0.00	0.00	
10,000.00	89.84	270.085	6,206.53	214.55	-3,643.83	3,644.15	0.00	0.00	0.00	
10,100.00	89.84	270.085	6,206.80	214.70	-3,743.83	3,744.15	0.00	0.00	0.00	
10,200.00	89.84	270.085	6,207.08	214.85	-3,843.83	3,844.15	0.00	0.00	0.00	
10,300.00	89.84	270.085	6,207.36	214.99	-3,943.83	3,944.15	0.00	0.00	0.00	
10,400.00	89.84	270.085	6,207.64	215.14	-4,043.83	4,044.15	0.00	0.00	0.00	
10,500.00	89.84	270.085	6,207.91	215.29	-4,143.83	4,144.14	0.00	0.00	0.00	
10,600.00	89.84	270.085	6,208.19	215.44	-4,243.83	4,244.14	0.00	0.00	0.00	
10,700.00	89.84	270.085	6,208.47	215.59	-4,343.83	4,344.14	0.00	0.00	0.00	
10,800.00	89.84	270.085	6,208.75	215.73	-4,443.83	4,444.14	0.00	0.00	0.00	
10,900.00	89.84	270.085	6,209.02	215.88	-4,543.83	4,544.14	0.00	0.00	0.00	
11,000.00	89.84	270.085	6,209.30	216.03	-4,643.83	4,644.14	0.00	0.00	0.00	
11,100.00	89.84	270.085	6,209.58	216.18	-4,743.83	4,744.14	0.00	0.00	0.00	
11,200.00	89.84	270.085	6,209.86	216.32	-4,843.83	4,844.14	0.00	0.00	0.00	
11,300.00	89.84	270.085	6,210.13	216.47	-4,943.83	4,944.14	0.00	0.00	0.00	
11,400.00	89.84	270.085	6,210.41	216.62	-5,043.83	5,044.14	0.00	0.00	0.00	
11,500.00	89.84	270.085	6,210.69	216.77	-5,143.82	5,144.14	0.00	0.00	0.00	
11,600.00	89.84	270.085	6,210.97	216.92	-5,243.82	5,244.14	0.00	0.00	0.00	
11,700.00	89.84	270.085	6,211.24	217.06	-5,343.82	5,344.14	0.00	0.00	0.00	
11,800.00	89.84	270.085	6,211.52	217.21	-5,443.82	5,444.14	0.00	0.00	0.00	
11,900.00	89.84	270.085	6,211.80	217.36	-5,543.82	5,544.14	0.00	0.00	0.00	
12,000.00	89.84	270.085	6,212.07	217.51	-5,643.82	5,644.14	0.00	0.00	0.00	
12,100.00	89.84	270.085	6,212.35	217.66	-5,743.82	5,744.14	0.00	0.00	0.00	
12,200.00	89.84	270.085	6,212.63	217.80	-5,843.82	5,844.14	0.00	0.00	0.00	
12,300.00	89.84	270.085	6,212.91	217.95	-5,943.82	5,944.14	0.00	0.00	0.00	
12,400.00	89.84	270.085	6,213.18	218.10	-6,043.82	6,044.14	0.00	0.00	0.00	
12,500.00	89.84	270.085	6,213.46	218.25	-6,143.82	6,144.14	0.00	0.00	0.00	
12,600.00	89.84	270.085	6,213.74	218.39	-6,243.82	6,244.14	0.00	0.00	0.00	
12,700.00	89.84	270.085	6,214.02	218.54	-6,343.82	6,344.14	0.00	0.00	0.00	
12,800.00	89.84	270.085	6,214.29	218.69	-6,443.82	6,444.14	0.00	0.00	0.00	
12,900.00	89.84	270.085	6,214.57	218.84	-6,543.82	6,544.14	0.00	0.00	0.00	
13,000.00	89.84	270.085	6,214.85	218.99	-6,643.82	6,644.14	0.00	0.00	0.00	
13,100.00	89.84	270.085	6,215.13	219.13	-6,743.82	6,744.13	0.00	0.00	0.00	
13,200.00	89.84	270.085	6,215.40	219.28	-6,843.82	6,844.13	0.00	0.00	0.00	
13,300.00	89.84	270.085	6,215.68	219.43	-6,943.82	6,944.13	0.00	0.00	0.00	
13,400.00	89.84	270.085	6,215.96	219.58	-7,043.82	7,044.13	0.00	0.00	0.00	
13,500.00	89.84	270.085	6,216.24	219.72	-7,143.82	7,144.13	0.00	0.00	0.00	
13,600.00	89.84	270.085	6,216.51	219.87	-7,243.81	7,244.13	0.00	0.00	0.00	
13,700.00	89.84	270.085	6,216.79	220.02	-7,343.81	7,344.13	0.00	0.00	0.00	
13,800.00	89.84	270.085	6,217.07	220.17	-7,443.81	7,444.13	0.00	0.00	0.00	
13,900.00	89.84	270.085	6,217.35	220.32	-7,543.81	7,544.13	0.00	0.00	0.00	
14,000.00	89.84	270.085	6,217.62	220.46	-7,643.81	7,644.13	0.00	0.00	0.00	
14,100.00	89.84	270.085	6,217.90	220.61	-7,743.81	7,744.13	0.00	0.00	0.00	
14,200.00	89.84	270.085	6,218.18	220.76	-7,843.81	7,844.13	0.00	0.00	0.00	
14,300.00	89.84	270.085	6,218.46	220.91	-7,943.81	7,944.13	0.00	0.00	0.00	
14,400.00	89.84	270.085	6,218.73	221.05	-8,043.81	8,044.13	0.00	0.00	0.00	
14,500.00	89.84	270.085	6,219.01	221.20	-8,143.81	8,144.13	0.00	0.00	0.00	
14,600.00	89.84	270.085	6,219.29	221.35	-8,243.81	8,244.13	0.00	0.00	0.00	
14,700.00	89.84	270.085	6,219.57	221.50	-8,343.81	8,344.13	0.00	0.00	0.00	
14,800.00	89.84	270.085	6,219.84	221.65	-8,443.81	8,444.13	0.00	0.00	0.00	
14,900.00	89.84	270.085	6,220.12	221.79	-8,543.81	8,544.13	0.00	0.00	0.00	

Database:	Casper District	Local Co-ordinate Reference:	Well Anschutz Equus Farm 3-62-4-5649C
Company:	Bill Barrett Corp.	TVD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Project:	Weld County, CO NAD 83	MD Reference:	GL 4591.4' & KB 20' @ 4611.40ft
Site:	Anschutz Equus Farms 3-62-4_5 SESE Pad	North Reference:	True
Well:	Anschutz Equus Farm 3-62-4-5649C	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	Plan 1		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
15,000.00	89.84	270.085	6,220.40	221.94	-8,643.81	8,644.13	0.00	0.00	0.00
15,100.00	89.84	270.085	6,220.68	222.09	-8,743.81	8,744.13	0.00	0.00	0.00
15,200.00	89.84	270.085	6,220.95	222.24	-8,843.81	8,844.13	0.00	0.00	0.00
15,300.00	89.84	270.085	6,221.23	222.38	-8,943.81	8,944.13	0.00	0.00	0.00
15,400.00	89.84	270.085	6,221.51	222.53	-9,043.81	9,044.13	0.00	0.00	0.00
15,500.00	89.84	270.085	6,221.79	222.68	-9,143.81	9,144.13	0.00	0.00	0.00
15,600.00	89.84	270.085	6,222.06	222.83	-9,243.80	9,244.13	0.00	0.00	0.00
15,700.00	89.84	270.085	6,222.34	222.98	-9,343.80	9,344.12	0.00	0.00	0.00
15,800.00	89.84	270.085	6,222.62	223.12	-9,443.80	9,444.12	0.00	0.00	0.00
15,900.00	89.84	270.085	6,222.90	223.27	-9,543.80	9,544.12	0.00	0.00	0.00
16,000.00	89.84	270.085	6,223.17	223.42	-9,643.80	9,644.12	0.00	0.00	0.00
16,100.00	89.84	270.085	6,223.45	223.57	-9,743.80	9,744.12	0.00	0.00	0.00
16,200.00	89.84	270.085	6,223.73	223.72	-9,843.80	9,844.12	0.00	0.00	0.00
16,297.78	89.84	270.085	6,224.00	223.86	-9,941.58	9,941.90	0.00	0.00	0.00
TD at 16297.78									

Design Targets									
Target Name	Dip Angle (°)	Dip Dir. (°)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (usft)	Easting (usft)	Latitude	Longitude
- hit/miss target									
- Shape									
3-62-4-5649C LP	0.00	0.000	6,197.00	209.48	-209.34	1,336,320.83	3,329,081.58	40° 15' 2.138 N	104° 19' 15.550 W
- plan misses target center by 0.01ft at 6565.49ft MD (6197.00 TVD, 209.47 N, -209.34 E)									
- Point									
3-62-4-5649C PBHL	0.00	0.000	6,224.00	223.86	-9,941.58	1,336,205.74	3,319,350.03	40° 15' 2.261 N	104° 21' 21.071 W
- plan hits target center									
- Point									

Plan Annotations				
Measured Depth (ft)	Vertical Depth (ft)	Local Coordinates		Comment
		+N/-S (ft)	+E/-W (ft)	
1,000.00	1,000.00	0.00	0.00	Start Build 2.00
1,802.21	1,791.76	55.72	96.68	Start 300.62 hold at 1802.21 MD
2,102.83	2,080.68	97.20	168.67	Start Drop -1.00
3,707.24	3,664.20	208.63	362.03	Start 1959.84 hold at 3707.24 MD
5,667.08	5,624.04	208.63	362.03	Start DLS 10.00 TFO 270.08
6,565.49	6,197.00	209.47	-209.34	Start 9732.29 hold at 6565.49 MD
16,297.78	6,224.00	223.86	-9,941.58	TD at 16297.78