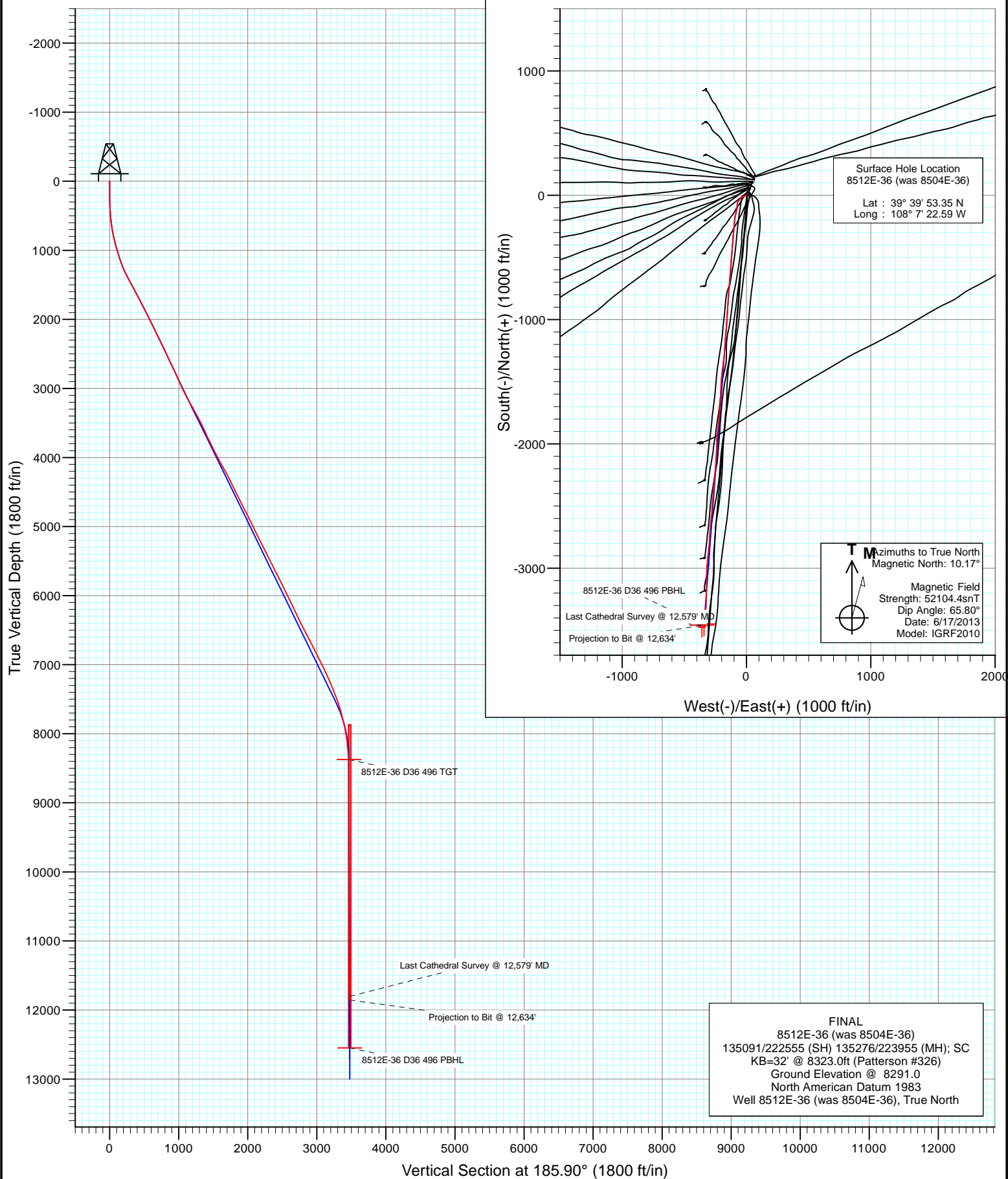


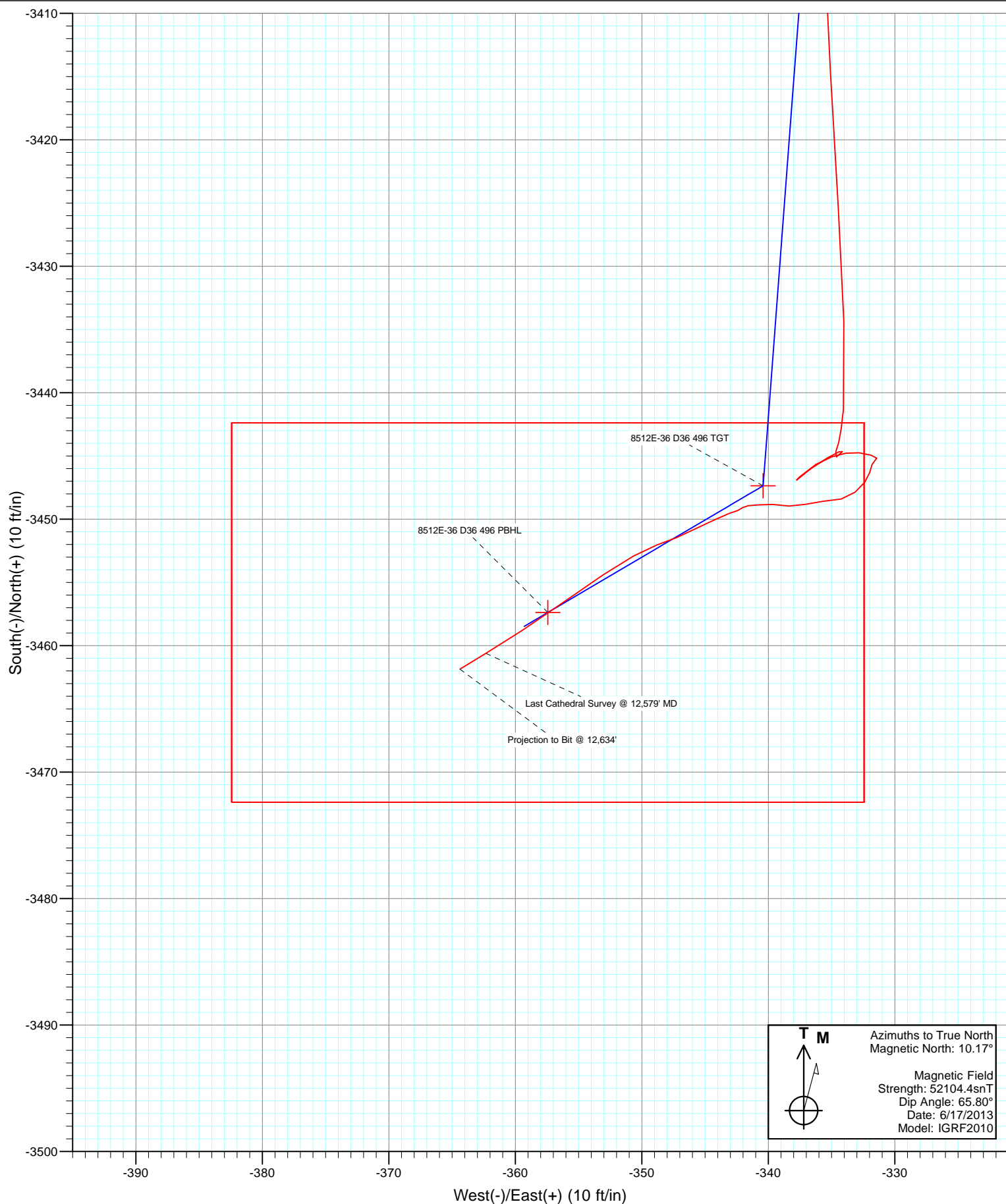


Project: Story Gulch
Site: S36-T4S-R96W (D36 496)
Well: 8512E-36 (was 8504E-36)
Wellbore: DD
Design: FINAL





Project: Story Gulch
Site: S36-T4S-R96W (D36 496)
Well: 8512E-36 (was 8504E-36)
Wellbore: DD
Design: FINAL



Cathedral Energy Services

Survey Report

Company:	EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference:	Well 8512E-36 (was 8504E-36)
Project:	Story Gulch	TVD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Site:	S36-T4S-R96W (D36 496)	MD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Well:	8512E-36 (was 8504E-36)	North Reference:	True
Wellbore:	DD	Survey Calculation Method:	Minimum Curvature
Design:	FINAL	Database:	USA EDM 5000 Multi Users DB

Project	Story Gulch		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Colorado Central Zone		

Site		S36-T4S-R96W (D36 496)			
Site Position:		Northing:	1,590,537.44 ft	Latitude:	39° 25' 42.24 N
From:	Lat/Long	Easting:	2,297,786.47 ft	Longitude:	107° 59' 10.64 W
Position Uncertainty:	0.0 ft	Slot Radius:	13.200 in	Grid Convergence:	-1.57 °

Well	8512E-36 (was 8504E-36)					
Well Position	+N/-S	0.0 ft	Northing:	1,677,701.70 ft	Latitude:	39° 39' 53.35 N
	+E/-W	0.0 ft	Easting:	2,261,687.16 ft	Longitude:	108° 7' 22.59 W
Position Uncertainty		0.0 ft	Wellhead Elevation:	ft	Ground Level:	8,291.0 ft

Wellbore	DD				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	6/17/2013	10.17	65.80	52,104

Design	FINAL				
Audit Notes:					
Version:	1.0	Phase:	ACTUAL	Tie On Depth:	0.0
Vertical Section:	Depth From (TVD)	+N/-S (ft)	+E/-W (ft)	Direction (°)	
	0.0	0.0	0.0	185.90	

Survey Program	Date	6/27/2013			
From (ft)	To (ft)	Survey (Wellbore)	Tool Name	Description	
179.0	12,634.0	Survey #1 (DD)	MWD	Geolink MWD	

Survey										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Formations / Comments	
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00		
179.0	0.40	274.60	179.0	0.1	-0.6	0.0	0.22	0.22		
209.0	0.90	273.40	209.0	0.1	-1.0	0.0	1.67	1.67		
240.0	1.80	257.40	240.0	0.0	-1.7	0.2	3.12	2.90		
270.0	2.80	255.20	270.0	-0.3	-2.8	0.6	3.35	3.33		
301.0	3.70	254.30	300.9	-0.8	-4.5	1.2	2.91	2.90		
331.0	4.50	251.50	330.8	-1.4	-6.6	2.1	2.75	2.67		
362.0	5.10	253.50	361.7	-2.2	-9.1	3.1	2.01	1.94		
392.0	6.10	252.30	391.6	-3.0	-11.9	4.3	3.36	3.33		
422.0	6.80	245.00	421.4	-4.3	-15.0	5.8	3.59	2.33		
453.0	7.30	243.70	452.2	-5.9	-18.4	7.8	1.69	1.61		
483.0	7.80	243.90	481.9	-7.7	-22.0	9.9	1.67	1.67		
514.0	8.70	241.00	512.6	-9.7	-25.9	12.3	3.20	2.90		

Cathedral Energy Services

Survey Report

Company:	EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference:	Well 8512E-36 (was 8504E-36)
Project:	Story Gulch	TVD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Site:	S36-T4S-R96W (D36 496)	MD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Well:	8512E-36 (was 8504E-36)	North Reference:	True
Wellbore:	DD	Survey Calculation Method:	Minimum Curvature
Design:	FINAL	Database:	USA EDM 5000 Multi Users DB

Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Formations / Comments
544.0	9.00	238.00	542.2	-12.1	-29.9	15.1	1.83	1.00	
574.0	9.60	233.90	571.8	-14.8	-33.9	18.2	2.98	2.00	
605.0	10.30	229.90	602.4	-18.1	-38.1	21.9	3.17	2.26	
636.0	11.00	230.00	632.8	-21.8	-42.5	26.0	2.26	2.26	
667.0	11.60	227.50	663.2	-25.8	-47.0	30.5	2.50	1.94	
699.0	12.00	224.70	694.6	-30.3	-51.8	35.5	2.18	1.25	
730.0	12.70	220.40	724.8	-35.2	-56.2	40.8	3.73	2.26	
760.0	13.40	216.00	754.1	-40.5	-60.4	46.5	4.05	2.33	
791.0	13.60	212.00	784.2	-46.5	-64.5	52.9	3.08	0.65	
821.0	13.90	205.30	813.3	-52.8	-67.9	59.5	5.40	1.00	
851.0	14.10	198.60	842.5	-59.5	-70.6	66.5	5.44	0.67	
882.0	14.20	192.30	872.5	-66.8	-72.6	73.9	4.98	0.32	
912.0	14.30	183.60	901.6	-74.1	-73.6	81.3	7.14	0.33	
943.0	15.10	181.40	931.6	-82.0	-73.9	89.1	3.15	2.58	
974.0	15.60	182.50	961.5	-90.2	-74.2	97.3	1.87	1.61	
1,004.0	16.30	185.60	990.3	-98.4	-74.8	105.6	3.67	2.33	
1,035.0	16.40	189.50	1,020.1	-107.0	-76.0	114.3	3.56	0.32	
1,065.0	16.90	192.00	1,048.8	-115.5	-77.6	122.8	2.91	1.67	
1,111.0	17.50	194.30	1,092.8	-128.7	-80.7	136.3	1.97	1.30	
1,157.0	18.70	194.40	1,136.5	-142.6	-84.2	150.5	2.61	2.61	
1,202.0	20.20	192.40	1,178.9	-157.1	-87.7	165.3	3.65	3.33	
1,248.0	21.30	188.20	1,221.9	-173.2	-90.6	181.6	4.02	2.39	
1,294.0	23.20	187.00	1,264.5	-190.4	-92.9	199.0	4.25	4.13	
1,340.0	24.90	187.10	1,306.5	-209.0	-95.2	217.7	3.70	3.70	
1,431.0	27.70	184.50	1,388.1	-249.1	-99.2	258.0	3.33	3.08	
1,523.0	28.30	184.20	1,469.3	-292.2	-102.5	301.2	0.67	0.65	
1,614.0	28.40	185.60	1,549.4	-335.2	-106.1	344.4	0.74	0.11	
1,706.0	28.50	185.10	1,630.3	-378.9	-110.2	388.2	0.28	0.11	
1,798.0	27.80	184.50	1,711.4	-422.1	-113.9	431.6	0.82	-0.76	
1,889.0	27.20	184.10	1,792.1	-464.0	-117.0	473.6	0.69	-0.66	
1,980.0	26.60	184.10	1,873.3	-505.1	-120.0	514.8	0.66	-0.66	
2,071.0	26.40	183.60	1,954.7	-545.6	-122.7	555.3	0.33	-0.22	
2,163.0	26.10	184.20	2,037.2	-586.2	-125.5	596.0	0.44	-0.33	
2,254.0	26.30	185.50	2,118.9	-626.2	-128.9	636.2	0.67	0.22	
2,346.0	26.10	185.10	2,201.4	-666.7	-132.6	676.8	0.29	-0.22	
2,437.0	26.30	185.50	2,283.1	-706.7	-136.3	717.0	0.29	0.22	
2,529.0	25.60	184.70	2,365.8	-746.8	-139.9	757.2	0.85	-0.76	
2,620.0	25.20	183.60	2,448.0	-785.7	-142.7	796.2	0.68	-0.44	
2,711.0	25.10	183.70	2,530.4	-824.3	-145.2	834.9	0.12	-0.11	
2,803.0	25.00	183.70	2,613.7	-863.2	-147.7	873.8	0.11	-0.11	
2,894.0	25.20	183.20	2,696.1	-901.7	-150.0	912.4	0.32	0.22	
2,977.0	25.60	183.90	2,771.1	-937.3	-152.2	947.9	0.60	0.48	
3,082.0	24.60	183.90	2,866.2	-981.7	-155.3	992.5	0.95	-0.95	
3,174.0	24.40	182.40	2,949.9	-1,019.8	-157.4	1,030.6	0.71	-0.22	
3,265.0	24.00	184.70	3,032.9	-1,057.0	-159.7	1,067.8	1.13	-0.44	
3,357.0	27.80	185.70	3,115.7	-1,097.0	-163.3	1,108.0	4.16	4.13	
3,448.0	30.80	184.50	3,195.0	-1,141.4	-167.3	1,152.5	3.36	3.30	
3,540.0	29.80	184.90	3,274.4	-1,187.6	-171.1	1,198.9	1.11	-1.09	
3,631.0	28.30	184.00	3,354.0	-1,231.7	-174.5	1,243.1	1.72	-1.65	
3,723.0	27.00	182.60	3,435.5	-1,274.3	-177.0	1,285.7	1.58	-1.41	
3,814.0	27.60	189.00	3,516.4	-1,315.8	-181.2	1,327.4	3.29	0.66	
3,905.0	24.20	186.40	3,598.2	-1,355.1	-186.6	1,367.1	3.94	-3.74	
3,998.0	25.40	187.50	3,682.6	-1,393.9	-191.3	1,406.1	1.38	1.29	

Cathedral Energy Services

Survey Report

Company:	EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference:	Well 8512E-36 (was 8504E-36)
Project:	Story Gulch	TVD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Site:	S36-T4S-R96W (D36 496)	MD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Well:	8512E-36 (was 8504E-36)	North Reference:	True
Wellbore:	DD	Survey Calculation Method:	Minimum Curvature
Design:	FINAL	Database:	USA EDM 5000 Multi Users DB

Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Formations / Comments
4,089.0	26.50	187.00	3,764.5	-1,433.4	-196.3	1,445.9	1.23	1.21	
4,180.0	25.30	185.20	3,846.3	-1,472.9	-200.6	1,485.7	1.58	-1.32	
4,271.0	26.30	181.80	3,928.3	-1,512.4	-203.0	1,525.2	1.96	1.10	
4,363.0	29.20	183.10	4,009.7	-1,555.2	-204.8	1,568.0	3.22	3.15	
4,454.0	28.20	184.50	4,089.5	-1,598.8	-207.7	1,611.7	1.32	-1.10	
4,546.0	29.60	182.30	4,170.0	-1,643.2	-210.3	1,656.1	1.91	1.52	
4,637.0	28.20	182.10	4,249.7	-1,687.1	-212.0	1,700.0	1.54	-1.54	
4,729.0	26.20	182.00	4,331.5	-1,729.1	-213.5	1,741.9	2.17	-2.17	
4,820.0	27.10	185.60	4,412.9	-1,769.8	-216.2	1,782.7	2.03	0.99	
4,912.0	25.40	185.70	4,495.4	-1,810.3	-220.3	1,823.4	1.85	-1.85	
5,003.0	26.90	187.90	4,577.1	-1,850.1	-225.0	1,863.5	1.96	1.65	
5,094.0	25.80	188.90	4,658.6	-1,890.1	-230.9	1,903.8	1.30	-1.21	
5,186.0	27.20	185.40	4,740.9	-1,930.8	-236.0	1,944.8	2.28	1.52	
5,278.0	27.90	180.90	4,822.5	-1,973.3	-238.3	1,987.3	2.39	0.76	
5,369.0	26.10	181.30	4,903.6	-2,014.6	-239.1	2,028.5	1.99	-1.98	
5,461.0	26.80	182.40	4,986.0	-2,055.5	-240.4	2,069.4	0.93	0.76	
5,552.0	25.10	183.80	5,067.8	-2,095.3	-242.6	2,109.1	1.99	-1.87	
5,643.0	26.60	183.50	5,149.7	-2,134.9	-245.1	2,148.8	1.65	1.65	
5,735.0	27.40	183.70	5,231.6	-2,176.6	-247.7	2,190.5	0.88	0.87	
5,826.0	26.20	183.50	5,312.9	-2,217.5	-250.3	2,231.5	1.32	-1.32	
5,918.0	27.30	185.40	5,395.0	-2,258.8	-253.5	2,272.9	1.51	1.20	
6,009.0	25.80	185.70	5,476.4	-2,299.3	-257.4	2,313.6	1.65	-1.65	
6,101.0	27.60	184.60	5,558.6	-2,340.4	-261.1	2,354.9	2.03	1.96	
6,193.0	26.30	186.30	5,640.6	-2,382.0	-265.1	2,396.6	1.64	-1.41	
6,284.0	27.30	186.30	5,721.8	-2,422.7	-269.6	2,437.6	1.10	1.10	
6,375.0	27.00	183.40	5,802.8	-2,464.1	-273.1	2,479.1	1.49	-0.33	
6,467.0	25.30	182.70	5,885.4	-2,504.6	-275.3	2,519.6	1.88	-1.85	
6,558.0	26.80	184.50	5,967.2	-2,544.5	-277.8	2,559.5	1.86	1.65	
6,649.0	25.50	188.00	6,048.8	-2,584.3	-282.1	2,599.6	2.22	-1.43	
6,741.0	25.30	183.70	6,132.0	-2,623.5	-286.2	2,639.1	2.02	-0.22	
6,832.0	25.50	184.90	6,214.2	-2,662.5	-289.1	2,678.1	0.61	0.22	
6,923.0	25.50	184.50	6,296.3	-2,701.5	-292.3	2,717.3	0.19	0.00	
7,015.0	26.90	183.50	6,378.8	-2,742.0	-295.1	2,757.8	1.60	1.52	
7,106.0	27.70	183.90	6,459.7	-2,783.7	-297.8	2,799.6	0.90	0.88	
7,198.0	25.80	185.50	6,541.9	-2,824.9	-301.2	2,840.9	2.21	-2.07	
7,289.0	28.20	185.40	6,622.9	-2,866.1	-305.1	2,882.3	2.64	2.64	
7,381.0	27.60	186.60	6,704.2	-2,908.9	-309.6	2,925.3	0.89	-0.65	
7,473.0	26.10	187.40	6,786.3	-2,950.1	-314.7	2,966.8	1.68	-1.63	
7,564.0	26.90	181.80	6,867.8	-2,990.6	-317.9	3,007.4	2.88	0.88	
7,656.0	26.90	180.90	6,949.8	-3,032.2	-318.9	3,048.9	0.44	0.00	
7,748.0	27.20	181.20	7,031.8	-3,074.0	-319.6	3,090.6	0.36	0.33	
7,839.0	23.80	180.80	7,113.9	-3,113.2	-320.3	3,129.6	3.74	-3.74	
7,930.0	23.70	180.10	7,197.2	-3,149.8	-320.6	3,166.1	0.33	-0.11	
8,022.0	23.00	180.90	7,281.6	-3,186.3	-320.9	3,202.4	0.84	-0.76	
8,113.0	22.70	180.90	7,365.5	-3,221.6	-321.5	3,237.6	0.33	-0.33	
8,205.0	20.30	181.30	7,451.1	-3,255.3	-322.1	3,271.2	2.61	-2.61	
8,297.0	19.20	182.00	7,537.7	-3,286.4	-323.0	3,302.2	1.22	-1.20	
8,388.0	17.30	183.70	7,624.1	-3,314.8	-324.4	3,330.6	2.17	-2.09	
8,480.0	15.10	189.40	7,712.4	-3,340.3	-327.3	3,356.3	2.95	-2.39	
8,572.0	14.00	188.60	7,801.5	-3,363.2	-330.9	3,379.3	1.22	-1.20	
8,663.0	12.00	190.30	7,890.1	-3,383.3	-334.2	3,399.8	2.24	-2.20	
8,755.0	9.80	178.60	7,980.5	-3,400.6	-335.7	3,417.1	3.38	-2.39	
8,846.0	8.00	175.90	8,070.4	-3,414.6	-335.1	3,431.0	2.03	-1.98	

Cathedral Energy Services

Survey Report

Company:	EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference:	Well 8512E-36 (was 8504E-36)
Project:	Story Gulch	TVD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Site:	S36-T4S-R96W (D36 496)	MD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Well:	8512E-36 (was 8504E-36)	North Reference:	True
Wellbore:	DD	Survey Calculation Method:	Minimum Curvature
Design:	FINAL	Database:	USA EDM 5000 Multi Users DB

Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Formations / Comments
8,937.0	5.70	177.70	8,160.7	-3,425.5	-334.5	3,441.7	2.54	-2.53	
9,029.0	5.40	176.70	8,252.3	-3,434.4	-334.0	3,450.5	0.34	-0.33	
9,121.0	3.30	186.00	8,344.0	-3,441.3	-334.1	3,457.4	2.40	-2.28	
9,212.0	1.00	204.30	8,435.0	-3,444.7	-334.7	3,460.8	2.61	-2.53	
9,304.0	0.60	50.90	8,527.0	-3,445.1	-334.6	3,461.2	1.70	-0.43	
9,396.0	0.20	39.30	8,619.0	-3,444.7	-334.1	3,460.7	0.44	-0.43	
9,487.0	0.50	248.50	8,710.0	-3,444.7	-334.4	3,460.8	0.75	0.33	
9,578.0	0.80	239.10	8,801.0	-3,445.1	-335.3	3,461.4	0.35	0.33	
9,669.0	1.20	235.10	8,891.9	-3,446.0	-336.6	3,462.4	0.45	0.44	
9,760.0	0.60	223.70	8,982.9	-3,446.9	-337.8	3,463.4	0.68	-0.66	
9,852.0	1.00	43.00	9,074.9	-3,446.7	-337.5	3,463.1	1.74	0.43	
9,943.0	1.10	61.10	9,165.9	-3,445.7	-336.2	3,462.0	0.38	0.11	
10,034.0	0.70	69.90	9,256.9	-3,445.1	-334.9	3,461.2	0.46	-0.44	
10,126.0	0.70	82.10	9,348.9	-3,444.8	-333.9	3,460.9	0.16	0.00	
10,218.0	0.60	94.60	9,440.9	-3,444.7	-332.8	3,460.7	0.19	-0.11	
10,309.0	0.60	109.20	9,531.9	-3,444.9	-331.9	3,460.8	0.17	0.00	
10,401.0	0.10	161.80	9,623.9	-3,445.2	-331.4	3,461.0	0.59	-0.54	
10,492.0	0.20	245.20	9,714.9	-3,445.3	-331.5	3,461.1	0.23	0.11	
10,583.0	0.40	201.50	9,805.9	-3,445.7	-331.8	3,461.5	0.32	0.22	
10,675.0	0.40	190.60	9,897.9	-3,446.3	-332.0	3,462.2	0.08	0.00	
10,766.0	0.70	215.40	9,988.9	-3,447.1	-332.4	3,463.0	0.41	0.33	
10,858.0	0.70	232.10	10,080.9	-3,447.9	-333.1	3,463.8	0.22	0.00	
10,949.0	0.90	253.70	10,171.9	-3,448.4	-334.2	3,464.5	0.39	0.22	
11,040.0	0.90	271.00	10,262.8	-3,448.6	-335.7	3,464.8	0.30	0.00	
11,132.0	0.90	250.00	10,354.8	-3,448.8	-337.1	3,465.2	0.36	0.00	
11,223.0	0.80	280.10	10,445.8	-3,449.0	-338.3	3,465.5	0.50	-0.11	
11,314.0	0.90	270.80	10,536.8	-3,448.8	-339.7	3,465.5	0.19	0.11	
11,405.0	0.60	264.50	10,627.8	-3,448.9	-340.9	3,465.6	0.34	-0.33	
11,496.0	0.30	266.10	10,718.8	-3,448.9	-341.6	3,465.8	0.33	-0.33	
11,588.0	0.30	234.80	10,810.8	-3,449.1	-342.0	3,466.0	0.18	0.00	
11,679.0	0.30	245.50	10,901.8	-3,449.3	-342.4	3,466.3	0.06	0.00	
11,771.0	0.50	255.60	10,993.8	-3,449.5	-343.0	3,466.5	0.23	0.22	
11,862.0	1.10	241.70	11,084.8	-3,450.0	-344.2	3,467.1	0.69	0.66	
12,045.0	1.00	248.90	11,267.8	-3,451.4	-347.2	3,468.9	0.09	-0.05	
12,136.0	1.10	249.90	11,358.7	-3,452.0	-348.8	3,469.6	0.11	0.11	
12,227.0	1.50	240.50	11,449.7	-3,452.9	-350.7	3,470.7	0.50	0.44	
12,411.0	2.60	234.40	11,633.6	-3,456.5	-356.1	3,474.8	0.61	0.60	
12,502.0	2.50	236.90	11,724.5	-3,458.8	-359.5	3,477.4	0.16	-0.11	
12,579.0	2.50	238.70	11,801.4	-3,460.6	-362.3	3,479.5	0.10	0.00	Last Cathedral Survey @ 12,579' MD
12,634.0	2.50	238.70	11,856.4	-3,461.9	-364.4	3,481.0	0.00	0.00	Projection to Bit @ 12,634'

Cathedral Energy Services

Survey Report

Company:	EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference:	Well 8512E-36 (was 8504E-36)
Project:	Story Gulch	TVD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Site:	S36-T4S-R96W (D36 496)	MD Reference:	KB=32' @ 8323.0ft (Patterson #326)
Well:	8512E-36 (was 8504E-36)	North Reference:	True
Wellbore:	DD	Survey Calculation Method:	Minimum Curvature
Design:	FINAL	Database:	USA EDM 5000 Multi Users DB

Targets									
Target Name	Dip Angle	Dip Dir.	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
- hit/miss target	(°)	(°)	(ft)	(ft)	(ft)	(ft)	(ft)		
- Shape									
8512E-36 D36 496 PBH	0.00	0.00	12,549.0	-3,457.4	-357.4	1,674,256.08	2,261,230.08	39° 39' 19.18 N	108° 7' 27.16 W
- actual wellpath misses target center by 692.7ft at 12634.0ft MD (11856.4 TVD, -3461.9 N, -364.4 E)									
- Rectangle (sides W30.0 H50.0 D0.0)									
8512E-36 D36 496 TGT	0.00	0.00	8,372.0	-3,447.4	-340.4	1,674,265.61	2,261,247.39	39° 39' 19.28 N	108° 7' 26.94 W
- actual wellpath misses target center by 7.7ft at 9149.2ft MD (8372.2 TVD, -3442.8 N, -334.2 E)									
- Point									

Design Annotations				
Measured Depth	Vertical Depth	Local Coordinates		Comment
(ft)	(ft)	+N/-S (ft)	+E/-W (ft)	
12,579.0	11,801.4	-3,460.6	-362.3	Last Cathedral Survey @ 12,579' MD
12,634.0	11,856.4	-3,461.9	-364.4	Projection to Bit @ 12,634'

Checked By: _____ Approved By: _____ Date: _____