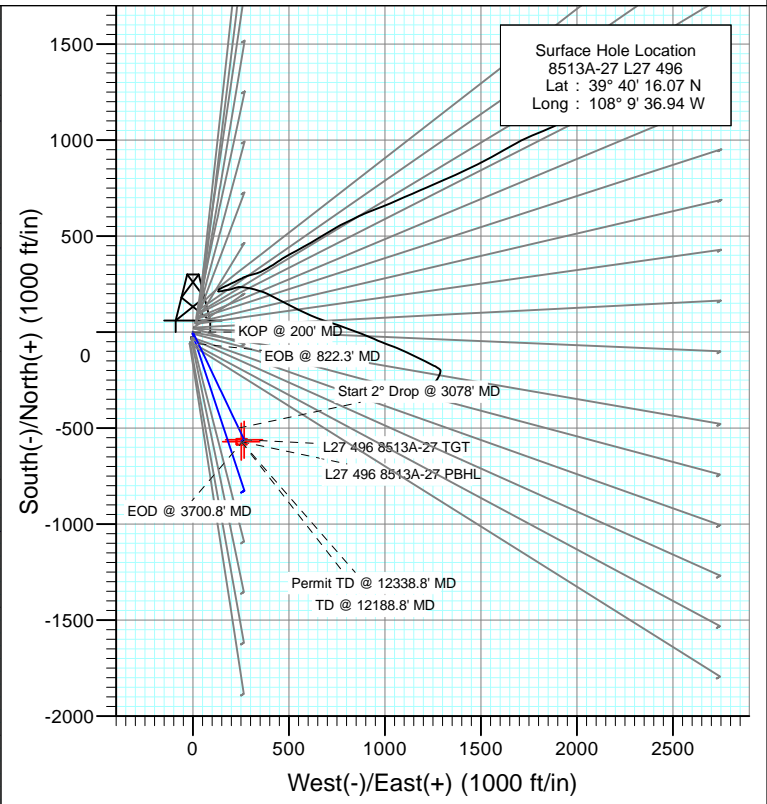


SECTION DETAILS										
Sec	MD	Inc	Azi	TVD	+N-/S	+E-/W	Dleg	TFace	VSect	Target
1	0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.0	
2	200.0	0.00	0.00	200.0	0.0	0.0	0.00	0.00	0.0	
3	822.3	12.45	154.55	817.5	-60.8	28.9	2.00	154.55	67.3	
4	3078.4	12.45	154.55	3020.5	-499.9	237.9	0.00	0.00	553.4	
5	3700.8	0.00	0.00	3638.0	-560.7	266.8	2.00	180.00	620.7	
6	7700.8	0.00	0.00	7638.0	-560.7	266.8	0.00	0.00	620.7	L27 496 8513A-27 TGT
7	7793.7	0.23	236.43	7731.0	-560.8	266.6	0.25	236.43	620.7	
8	12188.8	0.23	236.43	12126.0	-570.7	251.8	0.00	0.00	623.8	L27 496 8513A-27 PBHL
9	12338.8	0.23	236.43	12276.0	-571.0	251.3	0.00	0.00	623.8	



DESIGN TARGET DETAILS						
Name	+N-/S	+E-/W	Northing	Easting	Latitude	Longitude
L27 496 8513A-27 TGT	-560.7	266.8	1679736.83	2251502.869	40° 10.53 N	108° 9' 33.53 W
L27 496 8513A-27 PBHL	-570.7	251.8	1679727.31	2251487.589	40° 10.43 N	108° 9' 33.72 W

M Azimuths to True North
 Magnetic North: 10.28°

Magnetic Field
 Strength: 52177.8snT
 Dip Angle: 65.82°
 Date: 9/24/2012
 Model: IGRF2010

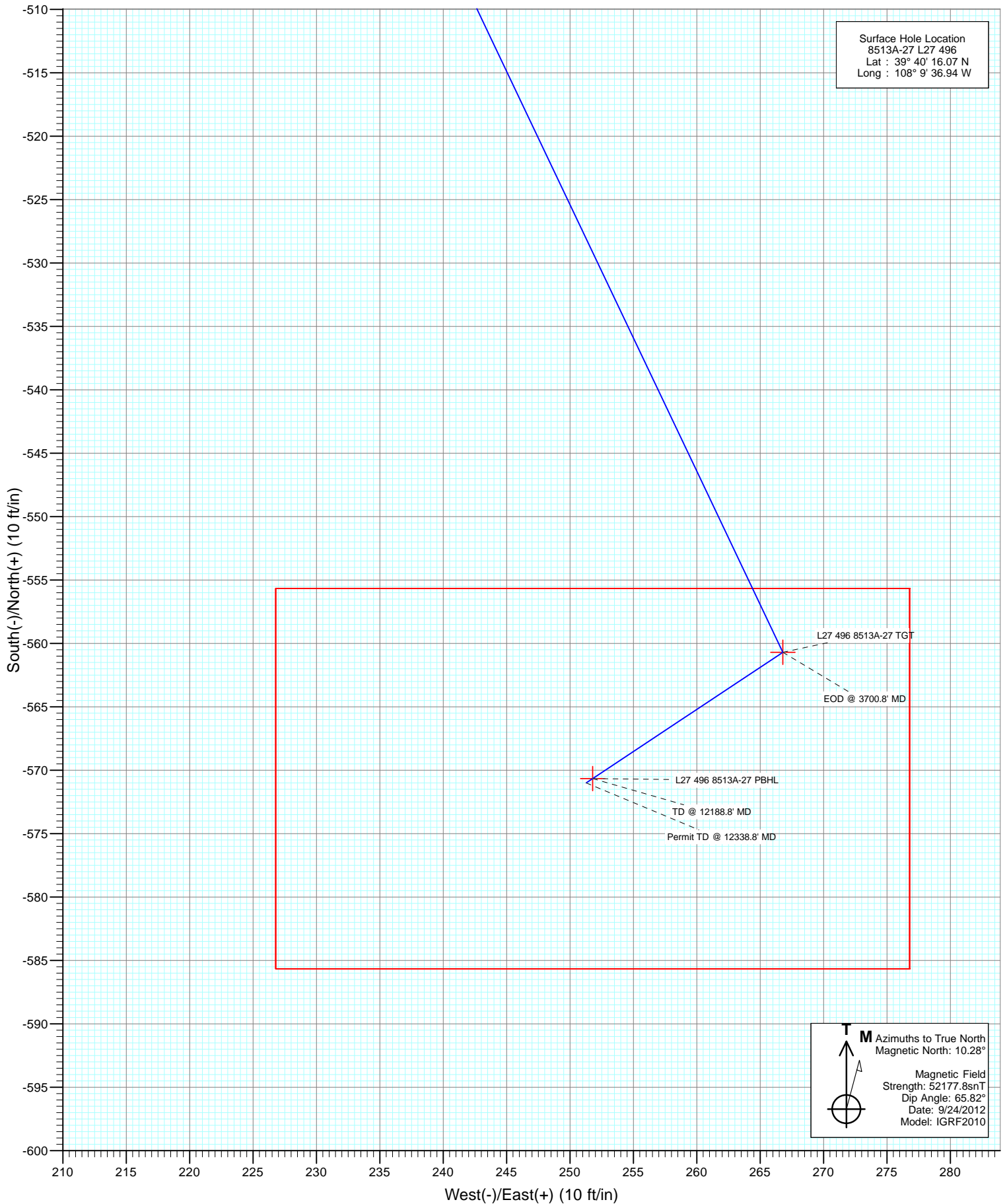
FORMATION TOP DETAILS		
TVDPath	MDPath	Formation
1081.0	1092.2	A_GROOVE_TVD
1235.0	1249.9	B_GROOVE_TVD
1261.0	1276.6	B_GROOVE_BASE_TVD
2201.0	2239.2	GARDEN_GULCH_TVD
3192.0	3253.0	WASATCH_FM_TVD
5408.0	5470.8	WASATCH_G_TVD
7598.0	7660.8	WILLIAMS_FORK_TVD
7638.0	7700.8	TOG_TVD
10797.0	10859.8	CAMEO_TVD
11248.0	11310.8	ROLLINS_TVD
11486.0	11548.8	COZZETTE_TVD
11670.0	11732.8	CORCORAN_TVD
11976.0	12038.8	UPPER_SEGO_TVD
12126.0	12188.8	SEGO BASE TARGET TVD

Plan #1
 8513A-27 L27 496
 12xxx; LR
 Well @ 8136.0ft (Rig)
 Ground Elevation @ 8104.0
 North American Datum 1983
 Well 8513A-27 L27 496, True North

Vertical Section at 156.19° (1500 ft/in)



Project: Story Gulch
Site: S27-T4S-R96W (L27 496)
Well: 8513A-27 L27 496
Wellbore: DD
Design: Plan #1



Cathedral Energy Services

Planning Report

Database: USA EDM 5000 Multi Users DB	Local Co-ordinate Reference: Well 8513A-27 L27 496
Company: EnCana Oil & Gas (USA) Inc	TVD Reference: Well @ 8136.0ft (Rig)
Project: Story Gulch	MD Reference: Well @ 8136.0ft (Rig)
Site: S27-T4S-R96W (L27 496)	North Reference: True
Well: 8513A-27 L27 496	Survey Calculation Method: Minimum Curvature
Wellbore: DD	
Design: Plan #1	

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 S27-T4S-R96W (L27 496)					
Site Position:		Northing: 1,680,404.44 ft	Latitude: 39° 40' 17.06 N		
From: Lat/Long		Easting: 2,251,282.88 ft	Longitude: 108° 9' 36.59 W		
Position Uncertainty: 0.0 ft		Slot Radius: 13.200 in	Grid Convergence: -1.68 °		

Well 8513A-27 L27 496					
Well Position	+N/-S 0.0 ft	Northing: 1,680,305.09 ft	Latitude: 39° 40' 16.07 N		
	+E/-W 0.0 ft	Easting: 2,251,252.59 ft	Longitude: 108° 9' 36.94 W		
Position Uncertainty	0.0 ft	Wellhead Elevation: ft	Ground Level: 8,104.0 ft		

Wellbore DD					
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	9/24/2012	10.28	65.82	52,178

Design Plan #1				
Audit Notes:				
Version:	Phase: PLAN	Tie On Depth: 0.0		
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	0.0	0.0	0.0	156.19

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
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
200.0	0.00	0.00	200.0	0.0	0.0	0.00	0.00	0.00	0.00	
822.3	12.45	154.55	817.5	-60.8	28.9	2.00	2.00	0.00	154.55	
3,078.4	12.45	154.55	3,020.5	-499.9	237.9	0.00	0.00	0.00	0.00	
3,700.8	0.00	0.00	3,638.0	-560.7	266.8	2.00	-2.00	0.00	180.00	
7,700.8	0.00	0.00	7,638.0	-560.7	266.8	0.00	0.00	0.00	0.00	L27 496 8513A-27 TC
7,793.7	0.23	236.43	7,731.0	-560.8	266.6	0.25	0.25	-132.94	236.43	
12,188.8	0.23	236.43	12,126.0	-570.7	251.8	0.00	0.00	0.00	0.00	L27 496 8513A-27 PE
12,338.8	0.23	236.43	12,276.0	-571.0	251.3	0.00	0.00	0.00	0.00	

Cathedral Energy Services

Planning Report

Database:	USA EDM 5000 Multi Users DB	Local Co-ordinate Reference:	Well 8513A-27 L27 496
Company:	EnCana Oil & Gas (USA) Inc	TVD Reference:	Well @ 8136.0ft (Rig)
Project:	Story Gulch	MD Reference:	Well @ 8136.0ft (Rig)
Site:	S27-T4S-R96W (L27 496)	North Reference:	True
Well:	8513A-27 L27 496	Survey Calculation Method:	Minimum Curvature
Wellbore:	DD		
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)	Comments / Formations
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00	
100.0	0.00	0.00	100.0	0.0	0.0	0.0	0.00	0.00	
200.0	0.00	0.00	200.0	0.0	0.0	0.0	0.00	0.00	KOP @ 200' MD
300.0	2.00	154.55	300.0	-1.6	0.7	1.7	2.00	2.00	
400.0	4.00	154.55	399.8	-6.3	3.0	7.0	2.00	2.00	
500.0	6.00	154.55	499.5	-14.2	6.7	15.7	2.00	2.00	
600.0	8.00	154.55	598.7	-25.2	12.0	27.9	2.00	2.00	
700.0	10.00	154.55	697.5	-39.3	18.7	43.5	2.00	2.00	
800.0	12.00	154.55	795.6	-56.5	26.9	62.6	2.00	2.00	
822.3	12.45	154.55	817.5	-60.8	28.9	67.3	2.00	2.00	EOB @ 822.3' MD
900.0	12.45	154.55	893.3	-75.9	36.1	84.0	0.00	0.00	
1,000.0	12.45	154.55	990.9	-95.4	45.4	105.6	0.00	0.00	
1,092.2	12.45	154.55	1,081.0	-113.3	53.9	125.5	0.00	0.00	A_GROOVE_TVD
1,100.0	12.45	154.55	1,088.6	-114.8	54.6	127.1	0.00	0.00	
1,200.0	12.45	154.55	1,186.2	-134.3	63.9	148.7	0.00	0.00	
1,249.9	12.45	154.55	1,235.0	-144.0	68.5	159.4	0.00	0.00	B_GROOVE_TVD
1,276.6	12.45	154.55	1,261.0	-149.2	71.0	165.2	0.00	0.00	B_GROOVE_BASE_TVD
1,300.0	12.45	154.55	1,283.9	-153.8	73.2	170.2	0.00	0.00	
1,400.0	12.45	154.55	1,381.5	-173.2	82.4	191.8	0.00	0.00	
1,500.0	12.45	154.55	1,479.2	-192.7	91.7	213.3	0.00	0.00	
1,600.0	12.45	154.55	1,576.8	-212.2	100.9	234.8	0.00	0.00	
1,700.0	12.45	154.55	1,674.5	-231.6	110.2	256.4	0.00	0.00	
1,800.0	12.45	154.55	1,772.1	-251.1	119.5	277.9	0.00	0.00	
1,900.0	12.45	154.55	1,869.8	-270.5	128.7	299.5	0.00	0.00	
2,000.0	12.45	154.55	1,967.4	-290.0	138.0	321.0	0.00	0.00	
2,100.0	12.45	154.55	2,065.1	-309.5	147.3	342.6	0.00	0.00	
2,200.0	12.45	154.55	2,162.7	-328.9	156.5	364.1	0.00	0.00	
2,239.2	12.45	154.55	2,201.0	-336.6	160.1	372.6	0.00	0.00	GARDEN_GULCH_TVD.
2,300.0	12.45	154.55	2,260.4	-348.4	165.8	385.7	0.00	0.00	
2,400.0	12.45	154.55	2,358.0	-367.9	175.0	407.2	0.00	0.00	
2,500.0	12.45	154.55	2,455.7	-387.3	184.3	428.8	0.00	0.00	
2,600.0	12.45	154.55	2,553.3	-406.8	193.6	450.3	0.00	0.00	
2,700.0	12.45	154.55	2,651.0	-426.2	202.8	471.8	0.00	0.00	
2,800.0	12.45	154.55	2,748.6	-445.7	212.1	493.4	0.00	0.00	
2,900.0	12.45	154.55	2,846.3	-465.2	221.3	514.9	0.00	0.00	
3,000.0	12.45	154.55	2,943.9	-484.6	230.6	536.5	0.00	0.00	
3,078.4	12.45	154.55	3,020.5	-499.9	237.9	553.4	0.00	0.00	Start 2° Drop @ 3078' MD
3,100.0	12.02	154.55	3,041.6	-504.0	239.8	557.9	2.00	-2.00	
3,200.0	10.02	154.55	3,139.8	-521.3	248.0	577.0	2.00	-2.00	
3,253.0	8.96	154.55	3,192.0	-529.2	251.8	585.8	2.00	-2.00	WASATCH_FM_TVD
3,300.0	8.02	154.55	3,238.5	-535.4	254.8	592.7	2.00	-2.00	
3,400.0	6.02	154.55	3,337.8	-546.4	260.0	604.9	2.00	-2.00	
3,500.0	4.02	154.55	3,437.4	-554.3	263.8	613.7	2.00	-2.00	
3,600.0	2.02	154.55	3,537.2	-559.1	266.0	618.9	2.00	-2.00	
3,700.0	0.02	154.55	3,637.2	-560.7	266.8	620.7	2.00	-2.00	
3,700.8	0.00	0.00	3,638.0	-560.7	266.8	620.7	2.00	-2.00	EOD @ 3700.8' MD
3,800.0	0.00	0.00	3,737.2	-560.7	266.8	620.7	0.00	0.00	
3,900.0	0.00	0.00	3,837.2	-560.7	266.8	620.7	0.00	0.00	
4,000.0	0.00	0.00	3,937.2	-560.7	266.8	620.7	0.00	0.00	
4,100.0	0.00	0.00	4,037.2	-560.7	266.8	620.7	0.00	0.00	
4,200.0	0.00	0.00	4,137.2	-560.7	266.8	620.7	0.00	0.00	
4,300.0	0.00	0.00	4,237.2	-560.7	266.8	620.7	0.00	0.00	

Cathedral Energy Services

Planning Report

Database: USA EDM 5000 Multi Users DB
Company: EnCana Oil & Gas (USA) Inc
Project: Story Gulch
Site: S27-T4S-R96W (L27 496)
Well: 8513A-27 L27 496
Wellbore: DD
Design: Plan #1

Local Co-ordinate Reference: Well 8513A-27 L27 496
TVD Reference: Well @ 8136.0ft (Rig)
MD Reference: Well @ 8136.0ft (Rig)
North Reference: True
Survey Calculation Method: Minimum Curvature

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)	Comments / Formations
4,400.0	0.00	0.00	4,337.2	-560.7	266.8	620.7	0.00	0.00	
4,500.0	0.00	0.00	4,437.2	-560.7	266.8	620.7	0.00	0.00	
4,600.0	0.00	0.00	4,537.2	-560.7	266.8	620.7	0.00	0.00	
4,700.0	0.00	0.00	4,637.2	-560.7	266.8	620.7	0.00	0.00	
4,800.0	0.00	0.00	4,737.2	-560.7	266.8	620.7	0.00	0.00	
4,900.0	0.00	0.00	4,837.2	-560.7	266.8	620.7	0.00	0.00	
5,000.0	0.00	0.00	4,937.2	-560.7	266.8	620.7	0.00	0.00	
5,100.0	0.00	0.00	5,037.2	-560.7	266.8	620.7	0.00	0.00	
5,200.0	0.00	0.00	5,137.2	-560.7	266.8	620.7	0.00	0.00	
5,300.0	0.00	0.00	5,237.2	-560.7	266.8	620.7	0.00	0.00	
5,400.0	0.00	0.00	5,337.2	-560.7	266.8	620.7	0.00	0.00	
5,470.8	0.00	0.00	5,408.0	-560.7	266.8	620.7	0.00	0.00	WASATCH_G_TVD
5,500.0	0.00	0.00	5,437.2	-560.7	266.8	620.7	0.00	0.00	
5,600.0	0.00	0.00	5,537.2	-560.7	266.8	620.7	0.00	0.00	
5,700.0	0.00	0.00	5,637.2	-560.7	266.8	620.7	0.00	0.00	
5,800.0	0.00	0.00	5,737.2	-560.7	266.8	620.7	0.00	0.00	
5,900.0	0.00	0.00	5,837.2	-560.7	266.8	620.7	0.00	0.00	
6,000.0	0.00	0.00	5,937.2	-560.7	266.8	620.7	0.00	0.00	
6,100.0	0.00	0.00	6,037.2	-560.7	266.8	620.7	0.00	0.00	
6,200.0	0.00	0.00	6,137.2	-560.7	266.8	620.7	0.00	0.00	
6,300.0	0.00	0.00	6,237.2	-560.7	266.8	620.7	0.00	0.00	
6,400.0	0.00	0.00	6,337.2	-560.7	266.8	620.7	0.00	0.00	
6,500.0	0.00	0.00	6,437.2	-560.7	266.8	620.7	0.00	0.00	
6,600.0	0.00	0.00	6,537.2	-560.7	266.8	620.7	0.00	0.00	
6,700.0	0.00	0.00	6,637.2	-560.7	266.8	620.7	0.00	0.00	
6,800.0	0.00	0.00	6,737.2	-560.7	266.8	620.7	0.00	0.00	
6,900.0	0.00	0.00	6,837.2	-560.7	266.8	620.7	0.00	0.00	
7,000.0	0.00	0.00	6,937.2	-560.7	266.8	620.7	0.00	0.00	
7,100.0	0.00	0.00	7,037.2	-560.7	266.8	620.7	0.00	0.00	
7,200.0	0.00	0.00	7,137.2	-560.7	266.8	620.7	0.00	0.00	
7,300.0	0.00	0.00	7,237.2	-560.7	266.8	620.7	0.00	0.00	
7,400.0	0.00	0.00	7,337.2	-560.7	266.8	620.7	0.00	0.00	
7,500.0	0.00	0.00	7,437.2	-560.7	266.8	620.7	0.00	0.00	
7,600.0	0.00	0.00	7,537.2	-560.7	266.8	620.7	0.00	0.00	
7,660.8	0.00	0.00	7,598.0	-560.7	266.8	620.7	0.00	0.00	WILLIAMS_FORK_TVD
7,700.0	0.00	0.00	7,637.2	-560.7	266.8	620.7	0.00	0.00	
7,700.8	0.00	0.00	7,638.0	-560.7	266.8	620.7	0.00	0.00	TOG TVD
7,793.7	0.23	236.43	7,731.0	-560.8	266.6	620.7	0.25	0.25	
7,800.0	0.23	236.43	7,737.2	-560.8	266.6	620.7	0.00	0.00	
7,900.0	0.23	236.43	7,837.2	-561.0	266.3	620.8	0.00	0.00	
8,000.0	0.23	236.43	7,937.2	-561.3	265.9	620.9	0.00	0.00	
8,100.0	0.23	236.43	8,037.2	-561.5	265.6	620.9	0.00	0.00	
8,200.0	0.23	236.43	8,137.2	-561.7	265.3	621.0	0.00	0.00	
8,300.0	0.23	236.43	8,237.2	-561.9	264.9	621.1	0.00	0.00	
8,400.0	0.23	236.43	8,337.2	-562.2	264.6	621.1	0.00	0.00	
8,500.0	0.23	236.43	8,437.2	-562.4	264.3	621.2	0.00	0.00	
8,600.0	0.23	236.43	8,537.2	-562.6	263.9	621.3	0.00	0.00	
8,700.0	0.23	236.43	8,637.2	-562.8	263.6	621.3	0.00	0.00	
8,800.0	0.23	236.43	8,737.2	-563.1	263.2	621.4	0.00	0.00	
8,900.0	0.23	236.43	8,837.2	-563.3	262.9	621.5	0.00	0.00	
9,000.0	0.23	236.43	8,937.2	-563.5	262.6	621.5	0.00	0.00	
9,100.0	0.23	236.43	9,037.2	-563.7	262.2	621.6	0.00	0.00	

Cathedral Energy Services

Planning Report

Database:	USA EDM 5000 Multi Users DB	Local Co-ordinate Reference:	Well 8513A-27 L27 496
Company:	EnCana Oil & Gas (USA) Inc	TVD Reference:	Well @ 8136.0ft (Rig)
Project:	Story Gulch	MD Reference:	Well @ 8136.0ft (Rig)
Site:	S27-T4S-R96W (L27 496)	North Reference:	True
Well:	8513A-27 L27 496	Survey Calculation Method:	Minimum Curvature
Wellbore:	DD		
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)	Comments / Formations
9,200.0	0.23	236.43	9,137.2	-564.0	261.9	621.7	0.00	0.00	
9,300.0	0.23	236.43	9,237.2	-564.2	261.6	621.8	0.00	0.00	
9,400.0	0.23	236.43	9,337.2	-564.4	261.2	621.8	0.00	0.00	
9,500.0	0.23	236.43	9,437.2	-564.6	260.9	621.9	0.00	0.00	
9,600.0	0.23	236.43	9,537.2	-564.9	260.5	622.0	0.00	0.00	
9,700.0	0.23	236.43	9,637.2	-565.1	260.2	622.0	0.00	0.00	
9,800.0	0.23	236.43	9,737.2	-565.3	259.9	622.1	0.00	0.00	
9,900.0	0.23	236.43	9,837.2	-565.5	259.5	622.2	0.00	0.00	
10,000.0	0.23	236.43	9,937.2	-565.7	259.2	622.2	0.00	0.00	
10,100.0	0.23	236.43	10,037.2	-566.0	258.8	622.3	0.00	0.00	
10,200.0	0.23	236.43	10,137.2	-566.2	258.5	622.4	0.00	0.00	
10,300.0	0.23	236.43	10,237.2	-566.4	258.2	622.4	0.00	0.00	
10,400.0	0.23	236.43	10,337.2	-566.6	257.8	622.5	0.00	0.00	
10,500.0	0.23	236.43	10,437.2	-566.9	257.5	622.6	0.00	0.00	
10,600.0	0.23	236.43	10,537.2	-567.1	257.2	622.6	0.00	0.00	
10,700.0	0.23	236.43	10,637.2	-567.3	256.8	622.7	0.00	0.00	
10,800.0	0.23	236.43	10,737.2	-567.5	256.5	622.8	0.00	0.00	
10,859.8	0.23	236.43	10,797.0	-567.7	256.3	622.8	0.00	0.00	CAMEO_TVD
10,900.0	0.23	236.43	10,837.2	-567.8	256.1	622.9	0.00	0.00	
11,000.0	0.23	236.43	10,937.2	-568.0	255.8	622.9	0.00	0.00	
11,100.0	0.23	236.43	11,037.2	-568.2	255.5	623.0	0.00	0.00	
11,200.0	0.23	236.43	11,137.2	-568.4	255.1	623.1	0.00	0.00	
11,300.0	0.23	236.43	11,237.2	-568.7	254.8	623.1	0.00	0.00	
11,310.8	0.23	236.43	11,248.0	-568.7	254.8	623.1	0.00	0.00	ROLLINS_TVD
11,400.0	0.23	236.43	11,337.2	-568.9	254.5	623.2	0.00	0.00	
11,500.0	0.23	236.43	11,437.2	-569.1	254.1	623.3	0.00	0.00	
11,548.8	0.23	236.43	11,486.0	-569.2	254.0	623.3	0.00	0.00	COZZETTE_TVD
11,600.0	0.23	236.43	11,537.2	-569.3	253.8	623.3	0.00	0.00	
11,700.0	0.23	236.43	11,637.2	-569.6	253.4	623.4	0.00	0.00	
11,732.8	0.23	236.43	11,670.0	-569.6	253.3	623.4	0.00	0.00	CORCORAN_TVD
11,800.0	0.23	236.43	11,737.2	-569.8	253.1	623.5	0.00	0.00	
11,900.0	0.23	236.43	11,837.2	-570.0	252.8	623.5	0.00	0.00	
12,000.0	0.23	236.43	11,937.2	-570.2	252.4	623.6	0.00	0.00	
12,038.8	0.23	236.43	11,976.0	-570.3	252.3	623.6	0.00	0.00	UPPER_SEGO_TVD
12,100.0	0.23	236.43	12,037.2	-570.5	252.1	623.7	0.00	0.00	
12,188.8	0.23	236.43	12,126.0	-570.7	251.8	623.7	0.00	0.00	TD @ 12188.8' MD - SEGO_BASE_TARGET_1
12,200.0	0.23	236.43	12,137.2	-570.7	251.8	623.7	0.00	0.00	
12,300.0	0.23	236.43	12,237.2	-570.9	251.4	623.8	0.00	0.00	
12,338.8	0.23	236.43	12,276.0	-571.0	251.3	623.8	0.00	0.00	Permit TD @ 12338.8' MD

Cathedral Energy Services

Planning Report

Database:	USA EDM 5000 Multi Users DB	Local Co-ordinate Reference:	Well 8513A-27 L27 496
Company:	EnCana Oil & Gas (USA) Inc	TVD Reference:	Well @ 8136.0ft (Rig)
Project:	Story Gulch	MD Reference:	Well @ 8136.0ft (Rig)
Site:	S27-T4S-R96W (L27 496)	North Reference:	True
Well:	8513A-27 L27 496	Survey Calculation Method:	Minimum Curvature
Wellbore:	DD		
Design:	Plan #1		

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									
L27 496 8513A-27 TGT - plan hits target center - Point	0.00	0.00	7,638.0	-560.7	266.8	1,679,736.83	2,251,502.86	39° 40' 10.53 N	108° 9' 33.53 W
L27 496 8513A-27 PBHI - plan hits target center - Rectangle (sides W30.0 H50.0 D0.0)	0.00	0.00	12,126.0	-570.7	251.8	1,679,727.31	2,251,487.56	39° 40' 10.43 N	108° 9' 33.72 W

Formations						
Measured Depth	Vertical Depth	Name	Lithology	Dip	Dip Direction	
(ft)	(ft)			(°)	(°)	
1,092.2	1,081.0	A_GROOVE_TVD				
1,249.9	1,235.0	B_GROOVE_TVD				
1,276.6	1,261.0	B_GROOVE_BASE_TVD				
2,239.2	2,201.0	GARDEN_GULCH_TVD.				
3,253.0	3,192.0	WASATCH_FM_TVD				
5,470.8	5,408.0	WASATCH_G_TVD				
7,660.8	7,598.0	WILLIAMS_FORK_TVD				
7,700.8	7,638.0	TOG TVD				
10,859.8	10,797.0	CAMEO_TVD				
11,310.8	11,248.0	ROLLINS_TVD				
11,548.8	11,486.0	COZZETTE_TVD				
11,732.8	11,670.0	CORCORAN_TVD				
12,038.8	11,976.0	UPPER_SEGO_TVD				
12,188.8	12,126.0	SEGO_BASE_TARGET_TVD				

Plan Annotations					
Measured Depth	Vertical Depth	Local Coordinates		Comment	
(ft)	(ft)	+N/-S	+E/-W		
		(ft)	(ft)		
200.0	200.0	0.0	0.0	KOP @ 200' MD	
822.3	817.5	-60.8	28.9	EOB @ 822.3' MD	
3,078.4	3,020.5	-499.9	237.9	Start 2° Drop @ 3078' MD	
3,700.8	3,638.0	-560.7	266.8	EOD @ 3700.8' MD	
12,188.8	12,126.0	-560.7	266.8	TD @ 12188.8' MD	
12,338.8	12,276.0	-560.8	266.6	Permit TD @ 12338.8' MD	