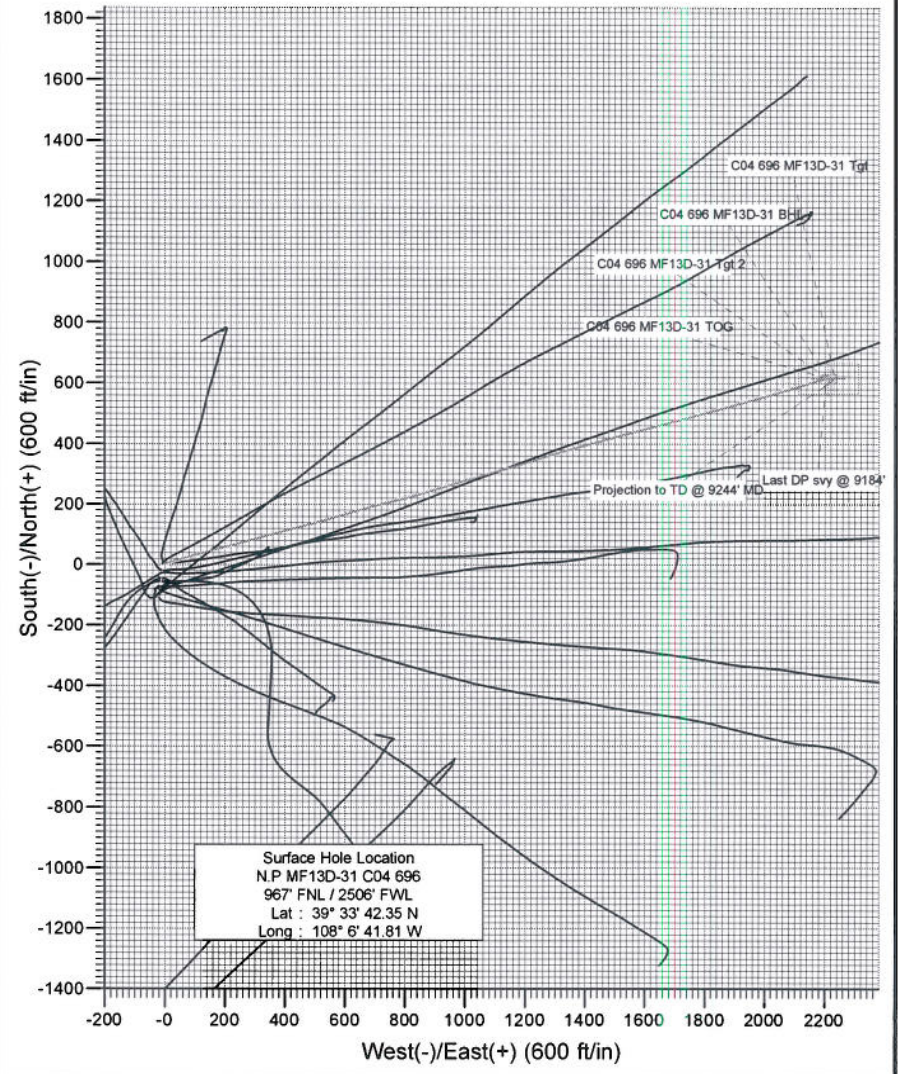
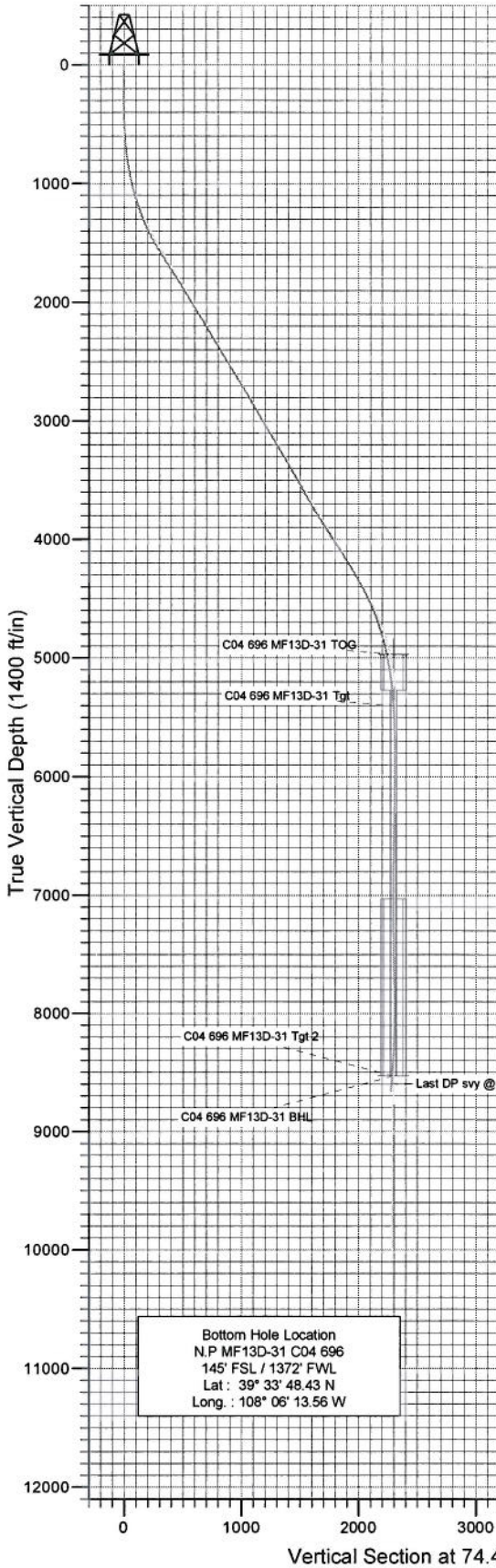




Project: North Piceance
 Site: C04 696 Pad (NENW Sec4-T6S-R96W)
 Well: N.P MF13D-31 C04 696
 Wellbore: DD
 Design: Final



Surface Hole Location
 N.P MF13D-31 C04 696
 967' FNL / 2506' FWL
 Lat : 39° 33' 42.35 N
 Long : 108° 6' 41.81 W

Bottom Hole Location
 N.P MF13D-31 C04 696
 145' FSL / 1372' FWL
 Lat : 39° 33' 48.43 N
 Long. : 108° 06' 13.56 W



Azimuths to True North
 Magnetic North: 10.70°
 Magnetic Field
 Strength: 52540.3snT
 Dip Angle: 65.85°
 Date: 1/15/2009
 Model: IGRF200510

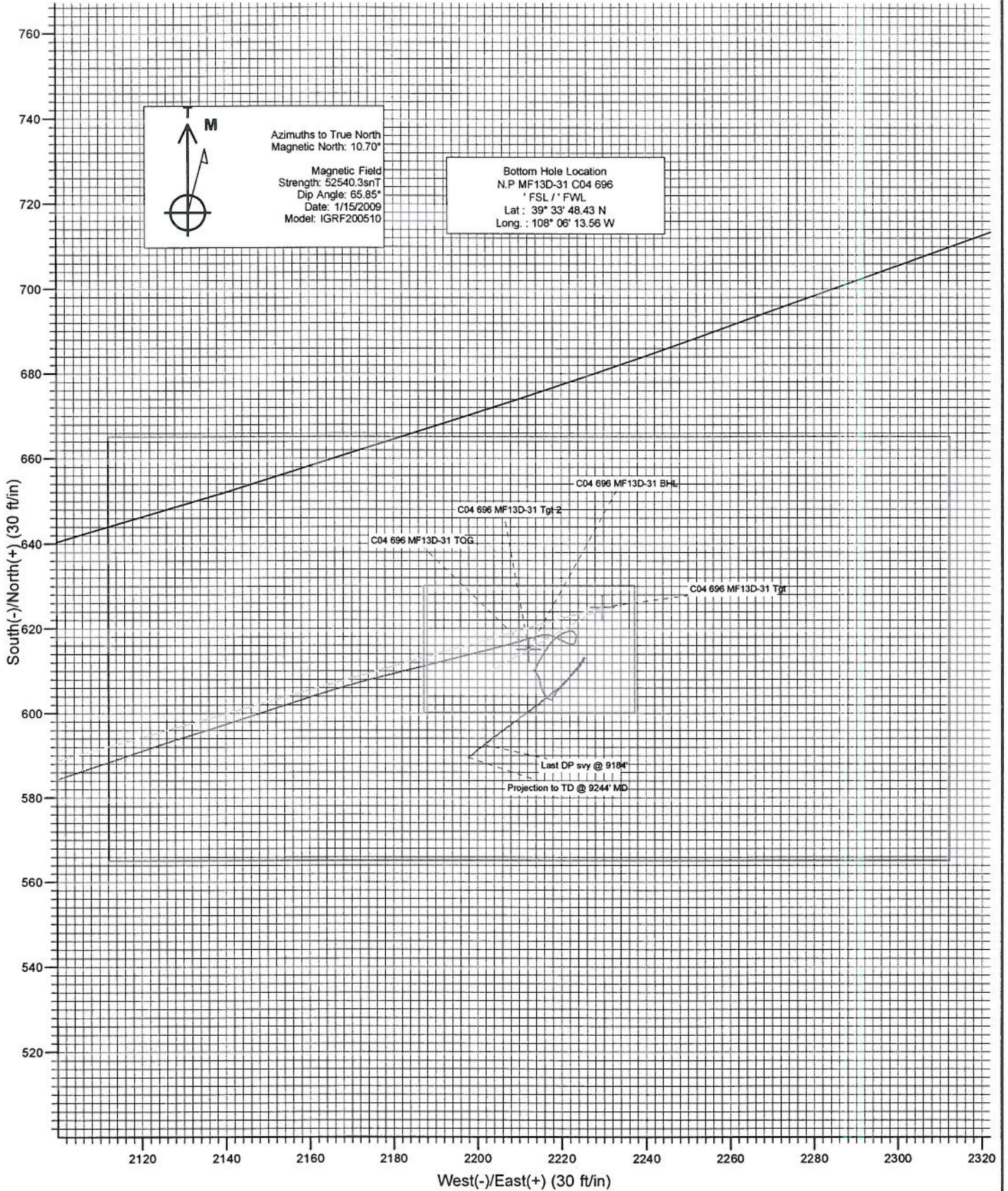
DESIGN DETAILS: DD

85530, 95024;LR
 KBE @ 5831.0ft (Patterson 307)

Target	Azimuth	Origin	N/S	E/W	From TVD
No Target (Freehand)	74.46	Slot	0.0	0.0	0.0



Project: North Piceance
Site: C04 696 Pad (NENW Sec4-T6S-R96W)
Well: N.P MF13D-31 C04 696
Wellbore: DD
Design: Final



Cathedral Energy Services

Survey Report

Company: EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference: Well N.P MF13D-31 C04 696
Project: North Piceance	TVD Reference: KBE @ 5831.0ft (Patterson 307)
Site: C04 696 Pad (NENW Sec4-T6S-R96W)	MD Reference: KBE @ 5831.0ft (Patterson 307)
Well: N.P MF13D-31 C04 696	North Reference: True
Wellbore: DD	Survey Calculation Method: Minimum Curvature
Design: DD	Database: EDM 2003.21 US Multi Users DB

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

Site: C04 696 Pad (NENW Sec4-T6S-R96W)					
Site Position:		Northing:	1,639,985.42 ft	Latitude:	39° 33' 41.34 N
From: Lat/Long		Easting:	2,263,774.17 ft	Longitude:	108° 6' 42.05 W
Position Uncertainty:	0.0 ft	Slot Radius:	0.000 in	Grid Convergence:	-1.65 °

Well: N.P MF13D-31 C04 696						
Well Position	+N/-S	0.0 ft	Northing:	1,640,087.16 ft	Latitude:	39° 33' 42.35 N
	+E/-W	0.0 ft	Easting:	2,263,795.98 ft	Longitude:	108° 6' 41.81 W
Position Uncertainty		0.0 ft	Wellhead Elevation:	ft	Ground Level:	5,816.0 ft

Wellbore: DD					
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF200510	1/15/2009	10.70	65.85	52,540

Design: DD					
Audit Notes:					
Version:	1.0	Phase:	ACTUAL	Tie On Depth:	0.0
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)	
	0.0	0.0	0.0	74.46	

Survey Program Date: 2/25/2009					
From (ft)	To (ft)	Survey (Wellbore)	Tool Name	Description	
141.0	1,932.0	Survey #1 (DD)	MWD	Geolink MWD	
1,939.0	9,244.0	Survey #2 (DD)	MWD	Geolink MWD	

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	
141.0	0.70	288.00	141.0	0.3	-0.8	-0.7	0.50	0.50	
232.0	1.00	284.00	232.0	0.6	-2.1	-1.9	0.34	0.33	
324.0	0.60	341.00	324.0	1.3	-3.1	-2.6	0.91	-0.43	
416.0	1.20	84.10	416.0	1.8	-2.3	-1.7	1.58	0.65	
508.0	2.40	67.40	507.9	2.7	0.5	1.2	1.41	1.30	
599.0	4.20	69.10	598.8	4.6	5.4	6.4	1.98	1.98	
692.0	5.80	71.10	691.4	7.3	13.0	14.5	1.73	1.72	
787.0	8.20	73.50	785.7	10.8	24.0	26.0	2.54	2.53	
883.0	10.20	73.80	880.5	15.1	38.8	41.4	2.08	2.08	
979.0	12.10	75.30	974.6	20.1	56.6	59.9	2.00	1.98	
1,075.0	15.20	74.70	1,067.9	25.9	78.5	82.6	3.23	3.23	

Cathedral Energy Services

Survey Report

Company:	EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference:	Well N.P MF13D-31 C04 696
Project:	North Piceance	TVD Reference:	KBE @ 5831.0ft (Patterson 307)
Site:	C04 696 Pad (NENW Sec4-T6S-R96W)	MD Reference:	KBE @ 5831.0ft (Patterson 307)
Well:	N.P MF13D-31 C04 696	North Reference:	True
Wellbore:	DD	Survey Calculation Method:	Minimum Curvature
Design:	DD	Database:	EDM 2003.21 US 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
1,171.0	17.60	75.10	1,160.0	33.0	104.7	109.7	2.50	2.50	
1,266.0	20.60	74.20	1,249.8	41.2	134.7	140.8	3.17	3.16	
1,362.0	23.40	75.90	1,338.8	50.5	169.4	176.7	2.99	2.92	
1,458.0	26.90	74.20	1,425.7	61.0	208.8	217.5	3.72	3.65	
1,554.0	30.20	76.00	1,510.0	72.8	253.1	263.4	3.55	3.44	
1,649.0	33.20	74.60	1,590.8	85.5	301.4	313.3	3.25	3.16	
1,745.0	33.00	74.80	1,671.2	99.3	352.0	365.7	0.24	-0.21	
1,841.0	32.40	75.00	1,752.0	112.8	402.1	417.6	0.64	-0.62	
1,882.0	32.20	74.60	1,786.7	118.6	423.2	439.5	0.71	-0.49	
1,932.0	32.20	74.60	1,829.0	125.6	448.9	466.1	0.00	0.00	
1,939.0	31.80	76.53	1,834.9	126.6	452.5	469.8	15.68	-5.71	
2,034.0	32.00	75.74	1,915.6	138.6	501.2	520.0	0.49	0.21	
2,129.0	32.60	74.42	1,995.9	151.7	550.3	570.8	0.97	0.63	
2,224.0	31.90	73.54	2,076.2	165.7	599.0	621.5	0.89	-0.74	
2,319.0	30.85	72.66	2,157.3	180.0	646.3	670.9	1.21	-1.11	
2,414.0	30.32	75.65	2,239.1	193.2	692.8	719.2	1.70	-0.56	
2,509.0	31.77	77.32	2,320.5	204.7	740.4	768.2	1.78	1.53	
2,604.0	30.80	76.10	2,401.7	216.0	788.4	817.5	1.22	-1.02	
2,699.0	31.70	74.90	2,482.9	228.3	836.1	866.8	1.15	0.95	
2,794.0	32.70	72.70	2,563.3	242.5	884.8	917.4	1.62	1.05	
2,890.0	31.60	72.20	2,644.6	257.9	933.5	968.4	1.18	-1.15	
2,984.0	31.80	73.90	2,724.5	272.3	980.7	1,017.8	0.97	0.21	
3,079.0	29.80	73.40	2,806.1	286.0	1,027.4	1,066.4	2.12	-2.11	
3,175.0	30.10	74.30	2,889.3	299.3	1,073.4	1,114.4	0.56	0.31	
3,270.0	30.70	74.60	2,971.3	312.2	1,119.7	1,162.4	0.65	0.63	
3,364.0	31.50	74.20	3,051.7	325.2	1,166.5	1,211.0	0.88	0.85	
3,459.0	31.90	72.40	3,132.6	339.6	1,214.3	1,260.9	1.08	0.42	
3,555.0	30.10	70.70	3,214.9	355.2	1,261.2	1,310.3	2.08	-1.87	
3,650.0	30.60	74.90	3,296.8	369.4	1,307.0	1,358.2	2.29	0.53	
3,745.0	31.30	74.80	3,378.3	382.2	1,354.2	1,407.1	0.74	0.74	
3,840.0	29.90	76.10	3,460.1	394.3	1,401.0	1,455.4	1.63	-1.47	
3,936.0	29.40	73.50	3,543.5	406.8	1,446.8	1,502.9	1.44	-0.52	
4,031.0	29.10	74.60	3,626.4	419.5	1,491.4	1,549.3	0.65	-0.32	
4,126.0	30.30	75.40	3,708.9	431.7	1,536.9	1,596.4	1.33	1.26	
4,222.0	31.50	76.00	3,791.3	443.9	1,584.7	1,645.7	1.29	1.25	
4,317.0	33.80	75.00	3,871.3	456.7	1,634.3	1,696.9	2.49	2.42	
4,412.0	33.10	75.10	3,950.6	470.2	1,684.9	1,749.3	0.74	-0.74	
4,507.0	32.00	75.00	4,030.6	483.4	1,734.3	1,800.4	1.16	-1.16	
4,603.0	33.50	75.50	4,111.4	496.6	1,784.5	1,852.3	1.59	1.56	
4,698.0	32.70	75.60	4,190.9	509.6	1,834.7	1,904.2	0.84	-0.84	
4,793.0	31.60	75.20	4,271.4	522.3	1,883.7	1,954.7	1.18	-1.16	
4,888.0	29.30	74.60	4,353.3	534.8	1,930.1	2,002.9	2.44	-2.42	
4,984.0	27.00	72.50	4,437.9	547.6	1,973.6	2,048.1	2.61	-2.40	
5,079.0	25.30	74.50	4,523.2	559.5	2,013.7	2,090.0	2.02	-1.79	
5,174.0	22.30	74.80	4,610.1	569.7	2,050.7	2,128.3	3.16	-3.16	
5,270.0	19.50	73.00	4,699.8	579.2	2,083.6	2,162.6	2.99	-2.92	
5,365.0	16.70	71.10	4,790.1	588.2	2,111.7	2,192.1	3.01	-2.95	
5,460.0	14.10	72.90	4,881.6	596.0	2,135.6	2,217.2	2.78	-2.74	
5,555.0	12.40	71.70	4,974.1	602.7	2,156.4	2,239.0	1.81	-1.79	
5,651.0	10.00	75.80	5,068.3	607.9	2,174.2	2,257.6	2.63	-2.50	
5,746.0	8.00	76.10	5,162.1	611.5	2,188.7	2,272.5	2.11	-2.11	
5,841.0	6.10	76.00	5,256.4	614.4	2,200.0	2,284.1	2.00	-2.00	
5,936.0	3.90	75.00	5,351.0	616.4	2,208.0	2,292.4	2.32	-2.32	

Cathedral Energy Services

Survey Report

Company:	EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference:	Well N.P MF13D-31 C04 696
Project:	North Piceance	TVD Reference:	KBE @ 5831.0ft (Patterson 307)
Site:	C04 696 Pad (NENW Sec4-T6S-R96W)	MD Reference:	KBE @ 5831.0ft (Patterson 307)
Well:	N.P MF13D-31 C04 696	North Reference:	True
Wellbore:	DD	Survey Calculation Method:	Minimum Curvature
Design:	DD	Database:	EDM 2003.21 US 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
6,032.0	3.30	72.60	5,446.8	618.1	2,213.8	2,298.5	0.64	-0.62	
6,127.0	1.90	112.00	5,541.7	618.3	2,217.9	2,302.4	2.31	-1.47	
6,222.0	2.40	118.50	5,636.7	616.8	2,221.1	2,305.1	0.58	0.53	
6,317.0	1.20	24.90	5,731.6	616.7	2,223.2	2,307.2	2.89	-1.26	
6,413.0	0.70	354.30	5,827.6	618.2	2,223.6	2,307.9	0.72	-0.52	
6,508.0	0.70	306.40	5,922.6	619.1	2,223.1	2,307.7	0.60	0.00	
6,603.0	0.30	257.60	6,017.6	619.4	2,222.4	2,307.1	0.58	-0.42	
6,698.0	0.50	266.30	6,112.6	619.4	2,221.7	2,306.4	0.22	0.21	
6,794.0	0.80	245.80	6,208.6	619.1	2,220.7	2,305.3	0.39	0.31	
6,889.0	1.30	239.70	6,303.6	618.2	2,219.1	2,303.7	0.54	0.53	
6,984.0	1.50	214.80	6,398.5	616.7	2,217.5	2,301.7	0.67	0.21	
7,079.0	2.90	212.40	6,493.5	613.6	2,215.5	2,298.9	1.48	1.47	
7,174.0	1.30	196.30	6,588.4	610.6	2,213.9	2,296.6	1.78	-1.68	
7,270.0	0.40	25.50	6,684.4	609.8	2,213.8	2,296.2	1.77	-0.94	
7,366.0	0.40	280.70	6,780.4	610.2	2,213.6	2,296.1	0.66	0.00	
7,461.0	0.30	100.70	6,875.4	610.2	2,213.5	2,296.0	0.74	-0.11	
7,556.0	1.00	146.70	6,970.4	609.5	2,214.2	2,296.5	0.86	0.74	
7,651.0	0.80	163.90	7,065.4	608.1	2,214.8	2,296.8	0.35	-0.21	
7,746.0	1.10	174.20	7,160.4	606.6	2,215.1	2,296.6	0.36	0.32	
7,841.0	1.20	146.70	7,255.4	604.8	2,215.7	2,296.8	0.58	0.11	
7,936.0	0.70	121.40	7,350.4	603.7	2,216.8	2,297.5	0.67	-0.53	
8,032.0	0.40	133.30	7,446.4	603.2	2,217.5	2,298.1	0.33	-0.31	
8,127.0	0.90	18.30	7,541.3	603.7	2,218.0	2,298.6	1.19	0.53	
8,222.0	2.80	41.00	7,636.3	606.1	2,219.8	2,301.0	2.11	2.00	
8,317.0	2.10	45.40	7,731.2	609.1	2,222.5	2,304.5	0.76	-0.74	
8,412.0	1.90	34.80	7,826.1	611.6	2,224.7	2,307.2	0.44	-0.21	
8,507.0	0.40	357.80	7,921.1	613.2	2,225.5	2,308.5	1.68	-1.58	
8,603.0	0.40	216.10	8,017.1	613.3	2,225.3	2,308.3	0.79	0.00	
8,698.0	1.30	210.40	8,112.1	612.1	2,224.6	2,307.3	0.95	0.95	
8,793.0	2.40	219.40	8,207.0	609.6	2,222.8	2,304.9	1.19	1.16	
8,888.0	3.30	226.20	8,301.9	606.2	2,219.5	2,300.8	1.01	0.95	
8,983.0	4.20	235.40	8,396.7	602.3	2,214.7	2,295.1	1.14	0.95	
9,078.0	4.80	231.60	8,491.4	597.9	2,208.7	2,288.2	0.70	0.63	
9,173.0	4.90	234.30	8,586.1	593.0	2,202.3	2,280.7	0.26	0.11	
9,184.0	4.70	231.80	8,597.1	592.5	2,201.6	2,279.8	2.63	-1.82	Last DP svy @ 9184'
9,244.0	4.50	230.00	8,656.9	589.5	2,197.9	2,275.4	0.41	-0.33	Projection to TD @ 9244' MD

Cathedral Energy Services

Survey Report

Company: EnCana Oil & Gas (USA) Inc	Local Co-ordinate Reference: Well N.P MF13D-31 C04 696
Project: North Piceance	TVD Reference: KBE @ 5831.0ft (Patterson 307)
Site: C04 696 Pad (NENW Sec4-T6S-R96W)	MD Reference: KBE @ 5831.0ft (Patterson 307)
Well: N.P MF13D-31 C04 696	North Reference: True
Wellbore: DD	Survey Calculation Method: Minimum Curvature
Design: DD	Database: EDM 2003.21 US 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									
C04 696 MF13D-31 TOC - actual wellpath misses target center by 56.6ft at 5563.1ft MD (4982.0 TVD, 603.2 N, 2158.0 E) - Rectangle (sides W100.0 H200.0 D300.0)	0.00	0.00	4,971.0	615.1	2,212.3	1,640,638.42	2,266,025.04	39° 33' 48.43 N	108° 6' 13.56 W
C04 696 MF13D-31 Tgt - actual wellpath misses target center by 20.2ft at 9116.3ft MD (8529.6 TVD, 595.9 N, 2206.2 E) - Rectangle (sides W100.0 H200.0 D0.0)	0.00	0.00	8,531.0	615.1	2,212.3	1,640,638.42	2,266,025.04	39° 33' 48.43 N	108° 6' 13.56 W
C04 696 MF13D-31 BHL - actual wellpath misses target center by 20.2ft at 9116.3ft MD (8529.6 TVD, 595.9 N, 2206.2 E) - Rectangle (sides W30.0 H50.0 D0.0)	0.00	0.00	8,531.0	615.1	2,212.3	1,640,638.42	2,266,025.04	39° 33' 48.43 N	108° 6' 13.56 W
C04 696 MF13D-31 Tgt - actual wellpath misses target center by 20.1ft at 5986.4ft MD (5401.3 TVD, 617.3 N, 2211.2 E) - Point	0.00	0.00	5,400.0	625.1	2,229.6	1,640,647.87	2,266,042.66	39° 33' 48.53 N	108° 6' 13.34 W

Design Annotations					
Measured Depth	Vertical Depth	Local Coordinates		Comment	
(ft)	(ft)	+N/-S	+E/-W		
		(ft)	(ft)		
9,184.0	8,597.1	592.5	2,201.6	Last DP svy @ 9184'	
9,244.0	8,656.9	589.5	2,197.9	Projection to TD @ 9244' MD	

Checked By: _____ Approved By: _____ Date: _____