

Project: Rio Blanco County, CO  
 Site: ELU O13 496 Pad  
 Well: ELU O13 FED 12B-13 496  
 Wellbore: Wellbore #1  
 Design: Design #4  
 Latitude: 39.698716  
 Longitude: -108.114602  
 Ground Level: 8118.0  
 RKB @ 8143.0usft (25')

PROJECT DETAILS: Rio Blanco County, CO  
 Geodetic System: Universal Transverse Mercator (US Survey Feet)  
 Datum: NAD 1927 - Western US  
 Ellipsoid: Clarke 1886  
 Zone: Zone 12N (114 W to 108 W)  
 System Datum: Mean Sea Level

REFERENCE INFORMATION  
 Vertical (TVD) Reference: RKB @ 8143.0usft (25')  
 Section (VS) Reference: Slot - 12B-13(0.0N, 0.0E)  
 Measured Depth Reference: RKB @ 8143.0usft (25')  
 Calculation Method: Minimum Curvature

#### SECTION DETAILS

MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	Vsect	Annotation
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.0	
500.0	0.00	0.00	500.0	0.0	0.0	0.00	0.00	0.0	Start Build 3.00
1095.7	17.87	345.77	1086.1	89.3	-22.7	3.00	345.77	92.1	Start 7306.4 hold at 1095.7 MD
8402.0	17.87	345.77	8039.9	2262.5	-573.9	0.00	0.00	2332.2	Start Drop -3.00
8997.7	0.00	0.00	8626.0	2351.8	-596.6	3.00	180.00	2424.2	Start DLS 1.50 TFO 250.02
9089.0	1.37	250.02	8717.3	2351.4	-597.6	1.50	250.02	2424.2	Start 4138.9 hold at 9089.0 MD
13227.9	1.37	250.02	12655.0	2317.6	-690.6	0.00	0.00	2418.3	TD at 13227.9

#### DESIGN TARGET DETAILS

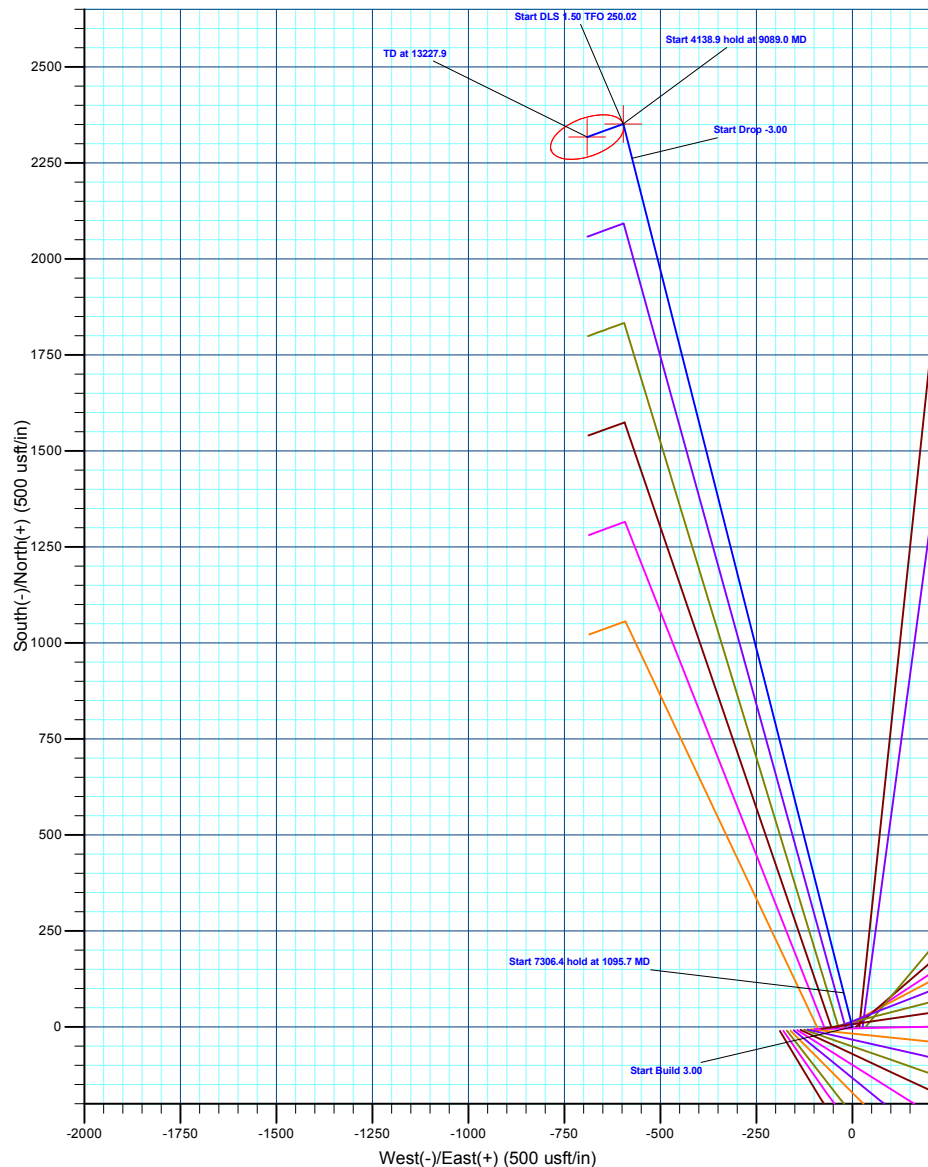
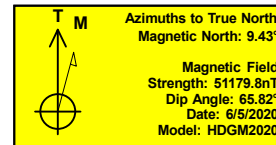
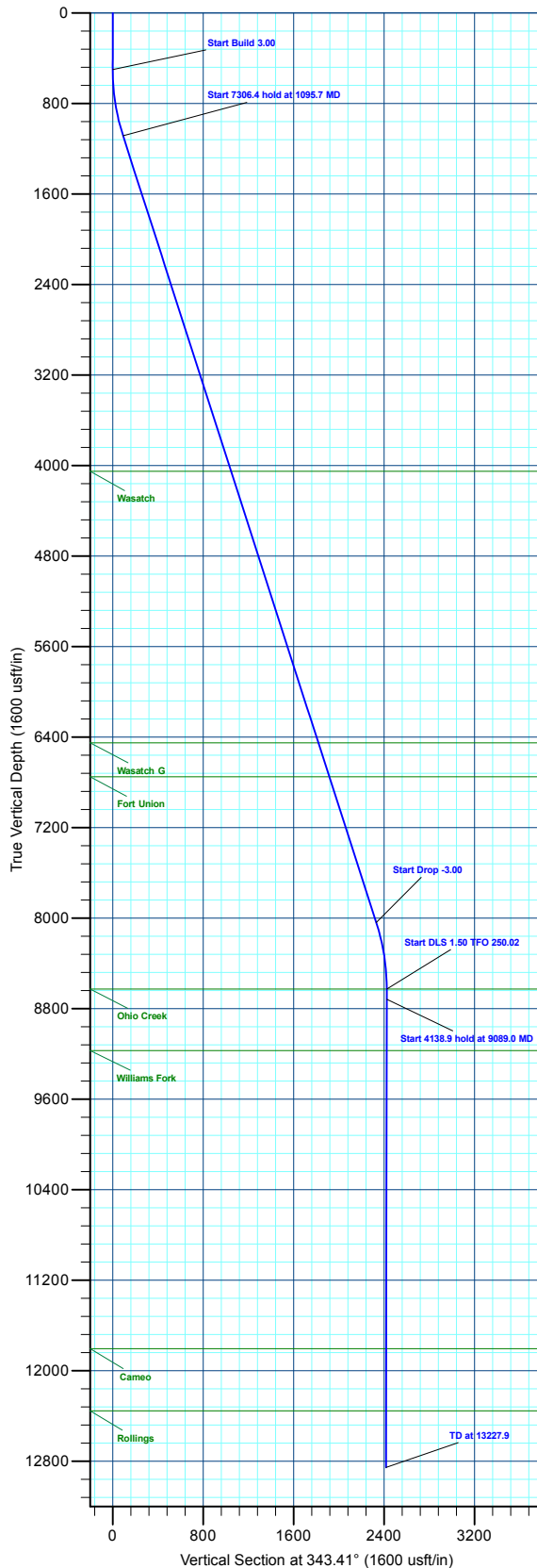
Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
12B-13 - OHCR	8626.0	2351.8	-596.6	14431731.88	2451428.23	39.705170	-108.116722
12B-13 - PBHL	12855.0	2317.6	-690.6	14431694.70	2451335.40	39.705076	-108.117056

#### WELL DETAILS: ELU O13 FED 12B-13 496

		Ground Level : 8118.0					
+N/-S	+E/-W	Northing	Easting	Latitude	Longitude		
0.0	0.0	14429400.50	2452100.20	39.698716	-108.114602	12B-13	

#### FORMATION TOP DETAILS

TVDPath	MDPath	Formation
4051.0	4210.9	Wasatch
6451.0	6732.6	Wasatch G
6751.0	7047.8	Fort Union
8626.0	8997.7	Ohio Creek
9171.0	9542.8	Williams Fork
11805.0	12177.6	Cameo
12355.0	12727.8	Rollings



Plan: Design #4 (ELU O13 FED 12B-13 496/Wellbore #1)

Created By: Will Jircik

Date: 11:38, February 28 2023



## **Caerus Oil & Gas**

**Rio Blanco County, CO**

**ELU O13 496 Pad**

**ELU O13 FED 12B-13 496 - Slot 12B-13**

**Wellbore #1**

**Plan: Design #4**

## **KLX Well Planning Report**

**27 February, 2023**



<b>Database:</b>	EDM 5000.1 Single User Db	<b>Local Co-ordinate Reference:</b>	Well ELU O13 FED 12B-13 496 - Slot 12B-13
<b>Company:</b>	Caerus Oil & Gas	<b>TVD Reference:</b>	RKB @ 8143.0usft (25')
<b>Project:</b>	Rio Blanco County, CO	<b>MD Reference:</b>	RKB @ 8143.0usft (25')
<b>Site:</b>	ELU O13 496 Pad	<b>North Reference:</b>	True
<b>Well:</b>	ELU O13 FED 12B-13 496	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4		

<b>Project</b>	Rio Blanco County, CO		
<b>Map System:</b>	Universal Transverse Mercator (US Survey Fee	<b>System Datum:</b>	Mean Sea Level
<b>Geo Datum:</b>	NAD 1927 - Western US		
<b>Map Zone:</b>	Zone 12N (114 W to 108 W)		

Site		ELU O13 496 Pad			
Site Position:		Northing:	14,429,398.00 usft	Latitude:	39.698712
From:	Map	Easting:	2,452,071.40 usft	Longitude:	-108.114705
Position Uncertainty:	0.0 usft	Slot Radius:	13-3/16 "	Grid Convergence:	1.84 °

Well	ELU O13 FED 12B-13 496 - Slot 12B-13					
Well Position	+N/-S	1.6 usft	Northing:	14,429,400.50 usft	Latitude:	39.698716
	+E/-W	28.9 usft	Easting:	2,452,100.20 usft	Longitude:	-108.114602
Position Uncertainty		0.0 usft	Wellhead Elevation:		Ground Level:	8,118.0 usft

<b>Wellbore</b>	Wellbore #1				
<b>Magnetics</b>	<b>Model Name</b>	<b>Sample Date</b>	<b>Declination (°)</b>	<b>Dip Angle (°)</b>	<b>Field Strength (nT)</b>
	HDGM2020	6/5/2020	9.43	65.82	51,179.80000000

<b>Design</b>	Design #4			
<b>Audit Notes:</b>				
<b>Version:</b>	<b>Phase:</b>	PLAN	<b>Tie On Depth:</b>	0.0
<b>Vertical Section:</b>	<b>Depth From (TVD) (usft)</b>	<b>+N/-S (usft)</b>	<b>+E/-W (usft)</b>	<b>Direction (°)</b>
	0.0	0.0	0.0	343.41

<b>Plan Sections</b>										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	TFO (°)	Target
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
500.0	0.00	0.00	500.0	0.0	0.0	0.00	0.00	0.00	0.00	
1,095.7	17.87	345.77	1,086.1	89.3	-22.7	3.00	3.00	0.00	345.77	
8,402.0	17.87	345.77	8,039.9	2,262.5	-573.9	0.00	0.00	0.00	0.00	
8,997.7	0.00	0.00	8,626.0	2,351.8	-596.6	3.00	-3.00	0.00	180.00	12B-13 - OHCR
9,089.0	1.37	250.02	8,717.3	2,351.4	-597.6	1.50	1.50	-120.48	250.02	
13,227.9	1.37	250.02	12,855.0	2,317.6	-690.6	0.00	0.00	0.00	0.00	12B-13 - PBHL

<b>Database:</b>	EDM 5000.1 Single User Db	<b>Local Co-ordinate Reference:</b>	Well ELU O13 FED 12B-13 496 - Slot 12B-13
<b>Company:</b>	Caerus Oil & Gas	<b>TVD Reference:</b>	RKB @ 8143.0usft (25')
<b>Project:</b>	Rio Blanco County, CO	<b>MD Reference:</b>	RKB @ 8143.0usft (25')
<b>Site:</b>	ELU O13 496 Pad	<b>North Reference:</b>	True
<b>Well:</b>	ELU O13 FED 12B-13 496	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00	0.00
100.0	0.00	0.00	100.0	0.0	0.0	0.0	0.00	0.00	0.00
200.0	0.00	0.00	200.0	0.0	0.0	0.0	0.00	0.00	0.00
300.0	0.00	0.00	300.0	0.0	0.0	0.0	0.00	0.00	0.00
400.0	0.00	0.00	400.0	0.0	0.0	0.0	0.00	0.00	0.00
Start Build 3.00									
500.0	0.00	0.00	500.0	0.0	0.0	0.0	0.00	0.00	0.00
600.0	3.00	345.77	600.0	2.5	-0.6	2.6	3.00	3.00	0.00
700.0	6.00	345.77	699.6	10.1	-2.6	10.5	3.00	3.00	0.00
800.0	9.00	345.77	798.8	22.8	-5.8	23.5	3.00	3.00	0.00
900.0	12.00	345.77	897.1	40.5	-10.3	41.7	3.00	3.00	0.00
1,000.0	15.00	345.77	994.3	63.1	-16.0	65.0	3.00	3.00	0.00
Start 7306.4 hold at 1095.7 MD									
1,095.7	17.87	345.77	1,086.1	89.3	-22.7	92.1	3.00	3.00	0.00
1,100.0	17.87	345.77	1,090.2	90.6	-23.0	93.4	0.00	0.00	0.00
1,200.0	17.87	345.77	1,185.4	120.3	-30.5	124.1	0.00	0.00	0.00
1,300.0	17.87	345.77	1,280.5	150.1	-38.1	154.7	0.00	0.00	0.00
1,400.0	17.87	345.77	1,375.7	179.8	-45.6	185.4	0.00	0.00	0.00
1,500.0	17.87	345.77	1,470.9	209.6	-53.2	216.0	0.00	0.00	0.00
1,600.0	17.87	345.77	1,566.1	239.3	-60.7	246.7	0.00	0.00	0.00
1,700.0	17.87	345.77	1,661.2	269.1	-68.3	277.3	0.00	0.00	0.00
1,800.0	17.87	345.77	1,756.4	298.8	-75.8	308.0	0.00	0.00	0.00
1,900.0	17.87	345.77	1,851.6	328.5	-83.3	338.7	0.00	0.00	0.00
2,000.0	17.87	345.77	1,946.8	358.3	-90.9	369.3	0.00	0.00	0.00
2,100.0	17.87	345.77	2,041.9	388.0	-98.4	400.0	0.00	0.00	0.00
2,200.0	17.87	345.77	2,137.1	417.8	-106.0	430.6	0.00	0.00	0.00
2,300.0	17.87	345.77	2,232.3	447.5	-113.5	461.3	0.00	0.00	0.00
2,400.0	17.87	345.77	2,327.5	477.3	-121.1	492.0	0.00	0.00	0.00
2,500.0	17.87	345.77	2,422.6	507.0	-128.6	522.6	0.00	0.00	0.00
2,600.0	17.87	345.77	2,517.8	536.8	-136.2	553.3	0.00	0.00	0.00
2,700.0	17.87	345.77	2,613.0	566.5	-143.7	583.9	0.00	0.00	0.00
2,800.0	17.87	345.77	2,708.2	596.2	-151.3	614.6	0.00	0.00	0.00
2,900.0	17.87	345.77	2,803.3	626.0	-158.8	645.3	0.00	0.00	0.00
3,000.0	17.87	345.77	2,898.5	655.7	-166.3	675.9	0.00	0.00	0.00
3,100.0	17.87	345.77	2,993.7	685.5	-173.9	706.6	0.00	0.00	0.00
3,200.0	17.87	345.77	3,088.9	715.2	-181.4	737.2	0.00	0.00	0.00
3,300.0	17.87	345.77	3,184.0	745.0	-189.0	767.9	0.00	0.00	0.00
3,400.0	17.87	345.77	3,279.2	774.7	-196.5	798.6	0.00	0.00	0.00
3,500.0	17.87	345.77	3,374.4	804.4	-204.1	829.2	0.00	0.00	0.00
3,600.0	17.87	345.77	3,469.6	834.2	-211.6	859.9	0.00	0.00	0.00
3,700.0	17.87	345.77	3,564.7	863.9	-219.2	890.5	0.00	0.00	0.00
3,800.0	17.87	345.77	3,659.9	893.7	-226.7	921.2	0.00	0.00	0.00
3,900.0	17.87	345.77	3,755.1	923.4	-234.3	951.9	0.00	0.00	0.00
4,000.0	17.87	345.77	3,850.3	953.2	-241.8	982.5	0.00	0.00	0.00
4,100.0	17.87	345.77	3,945.4	982.9	-249.3	1,013.2	0.00	0.00	0.00
4,200.0	17.87	345.77	4,040.6	1,012.6	-256.9	1,043.8	0.00	0.00	0.00
Wasatch									
4,210.9	17.87	345.77	4,051.0	1,015.9	-257.7	1,047.2	0.00	0.00	0.00
4,300.0	17.87	345.77	4,135.8	1,042.4	-264.4	1,074.5	0.00	0.00	0.00
4,400.0	17.87	345.77	4,231.0	1,072.1	-272.0	1,105.2	0.00	0.00	0.00
4,500.0	17.87	345.77	4,326.2	1,101.9	-279.5	1,135.8	0.00	0.00	0.00
4,600.0	17.87	345.77	4,421.3	1,131.6	-287.1	1,166.5	0.00	0.00	0.00
4,700.0	17.87	345.77	4,516.5	1,161.4	-294.6	1,197.1	0.00	0.00	0.00

<b>Database:</b>	EDM 5000.1 Single User Db	<b>Local Co-ordinate Reference:</b>	Well ELU O13 FED 12B-13 496 - Slot 12B-13
<b>Company:</b>	Caerus Oil & Gas	<b>TVD Reference:</b>	RKB @ 8143.0usft (25')
<b>Project:</b>	Rio Blanco County, CO	<b>MD Reference:</b>	RKB @ 8143.0usft (25')
<b>Site:</b>	ELU O13 496 Pad	<b>North Reference:</b>	True
<b>Well:</b>	ELU O13 FED 12B-13 496	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
4,800.0	17.87	345.77	4,611.7	1,191.1	-302.2	1,227.8	0.00	0.00	0.00
4,900.0	17.87	345.77	4,706.9	1,220.9	-309.7	1,258.5	0.00	0.00	0.00
5,000.0	17.87	345.77	4,802.0	1,250.6	-317.2	1,289.1	0.00	0.00	0.00
5,100.0	17.87	345.77	4,897.2	1,280.3	-324.8	1,319.8	0.00	0.00	0.00
5,200.0	17.87	345.77	4,992.4	1,310.1	-332.3	1,350.4	0.00	0.00	0.00
5,300.0	17.87	345.77	5,087.6	1,339.8	-339.9	1,381.1	0.00	0.00	0.00
5,400.0	17.87	345.77	5,182.7	1,369.6	-347.4	1,411.8	0.00	0.00	0.00
5,500.0	17.87	345.77	5,277.9	1,399.3	-355.0	1,442.4	0.00	0.00	0.00
5,600.0	17.87	345.77	5,373.1	1,429.1	-362.5	1,473.1	0.00	0.00	0.00
5,700.0	17.87	345.77	5,468.3	1,458.8	-370.1	1,503.7	0.00	0.00	0.00
5,800.0	17.87	345.77	5,563.4	1,488.5	-377.6	1,534.4	0.00	0.00	0.00
5,900.0	17.87	345.77	5,658.6	1,518.3	-385.2	1,565.1	0.00	0.00	0.00
6,000.0	17.87	345.77	5,753.8	1,548.0	-392.7	1,595.7	0.00	0.00	0.00
6,100.0	17.87	345.77	5,849.0	1,577.8	-400.2	1,626.4	0.00	0.00	0.00
6,200.0	17.87	345.77	5,944.1	1,607.5	-407.8	1,657.0	0.00	0.00	0.00
6,300.0	17.87	345.77	6,039.3	1,637.3	-415.3	1,687.7	0.00	0.00	0.00
6,400.0	17.87	345.77	6,134.5	1,667.0	-422.9	1,718.4	0.00	0.00	0.00
6,500.0	17.87	345.77	6,229.7	1,696.8	-430.4	1,749.0	0.00	0.00	0.00
6,600.0	17.87	345.77	6,324.8	1,726.5	-438.0	1,779.7	0.00	0.00	0.00
6,700.0	17.87	345.77	6,420.0	1,756.2	-445.5	1,810.3	0.00	0.00	0.00
<b>Wasatch G</b>									
6,732.6	17.87	345.77	6,451.0	1,765.9	-448.0	1,820.3	0.00	0.00	0.00
6,800.0	17.87	345.77	6,515.2	1,786.0	-453.1	1,841.0	0.00	0.00	0.00
6,900.0	17.87	345.77	6,610.4	1,815.7	-460.6	1,871.7	0.00	0.00	0.00
7,000.0	17.87	345.77	6,705.5	1,845.5	-468.2	1,902.3	0.00	0.00	0.00
<b>Fort Union</b>									
7,047.8	17.87	345.77	6,751.0	1,859.7	-471.8	1,917.0	0.00	0.00	0.00
7,100.0	17.87	345.77	6,800.7	1,875.2	-475.7	1,933.0	0.00	0.00	0.00
7,200.0	17.87	345.77	6,895.9	1,905.0	-483.2	1,963.6	0.00	0.00	0.00
7,300.0	17.87	345.77	6,991.1	1,934.7	-490.8	1,994.3	0.00	0.00	0.00
7,400.0	17.87	345.77	7,086.2	1,964.4	-498.3	2,024.9	0.00	0.00	0.00
7,500.0	17.87	345.77	7,181.4	1,994.2	-505.9	2,055.6	0.00	0.00	0.00
7,600.0	17.87	345.77	7,276.6	2,023.9	-513.4	2,086.3	0.00	0.00	0.00
7,700.0	17.87	345.77	7,371.8	2,053.7	-521.0	2,116.9	0.00	0.00	0.00
7,800.0	17.87	345.77	7,466.9	2,083.4	-528.5	2,147.6	0.00	0.00	0.00
7,900.0	17.87	345.77	7,562.1	2,113.2	-536.1	2,178.2	0.00	0.00	0.00
8,000.0	17.87	345.77	7,657.3	2,142.9	-543.6	2,208.9	0.00	0.00	0.00
8,100.0	17.87	345.77	7,752.5	2,172.6	-551.2	2,239.6	0.00	0.00	0.00
8,200.0	17.87	345.77	7,847.6	2,202.4	-558.7	2,270.2	0.00	0.00	0.00
8,300.0	17.87	345.77	7,942.8	2,232.1	-566.2	2,300.9	0.00	0.00	0.00
<b>Start Drop -3.00</b>									
8,402.0	17.87	345.77	8,039.9	2,262.5	-573.9	2,332.2	0.00	0.00	0.00
8,500.0	14.93	345.77	8,133.9	2,289.3	-580.7	2,359.8	3.00	-3.00	0.00
8,600.0	11.93	345.77	8,231.2	2,311.8	-586.5	2,383.0	3.00	-3.00	0.00
8,700.0	8.93	345.77	8,329.5	2,329.4	-590.9	2,401.1	3.00	-3.00	0.00
8,800.0	5.93	345.77	8,428.6	2,341.9	-594.1	2,414.0	3.00	-3.00	0.00
8,900.0	2.93	345.77	8,528.3	2,349.4	-596.0	2,421.7	3.00	-3.00	0.00
<b>Start DLS 1.50 TFO 250.02 - Ohio Creek</b>									
8,997.7	0.00	0.00	8,626.0	2,351.8	-596.6	2,424.2	3.00	-3.00	0.00
9,000.0	0.03	250.02	8,628.3	2,351.8	-596.6	2,424.2	1.50	1.50	0.00
<b>Start 4138.9 hold at 9089.0 MD</b>									
9,089.0	1.37	250.02	8,717.3	2,351.4	-597.6	2,424.2	1.50	1.50	0.00
9,100.0	1.37	250.02	8,728.3	2,351.3	-597.9	2,424.2	0.00	0.00	0.00
9,200.0	1.37	250.02	8,828.2	2,350.5	-600.1	2,424.0	0.00	0.00	0.00

<b>Database:</b>	EDM 5000.1 Single User Db	<b>Local Co-ordinate Reference:</b>	Well ELU O13 FED 12B-13 496 - Slot 12B-13
<b>Company:</b>	Caerus Oil & Gas	<b>TVD Reference:</b>	RKB @ 8143.0usft (25')
<b>Project:</b>	Rio Blanco County, CO	<b>MD Reference:</b>	RKB @ 8143.0usft (25')
<b>Site:</b>	ELU O13 496 Pad	<b>North Reference:</b>	True
<b>Well:</b>	ELU O13 FED 12B-13 496	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
9,300.0	1.37	250.02	8,928.2	2,349.7	-602.4	2,423.9	0.00	0.00	0.00
9,400.0	1.37	250.02	9,028.2	2,348.9	-604.6	2,423.7	0.00	0.00	0.00
9,500.0	1.37	250.02	9,128.2	2,348.1	-606.9	2,423.6	0.00	0.00	0.00
<b>Williams Fork</b>									
9,542.8	1.37	250.02	9,171.0	2,347.7	-607.8	2,423.5	0.00	0.00	0.00
9,600.0	1.37	250.02	9,228.1	2,347.3	-609.1	2,423.4	0.00	0.00	0.00
9,700.0	1.37	250.02	9,328.1	2,346.4	-611.3	2,423.3	0.00	0.00	0.00
9,800.0	1.37	250.02	9,428.1	2,345.6	-613.6	2,423.2	0.00	0.00	0.00
9,900.0	1.37	250.02	9,528.0	2,344.8	-615.8	2,423.0	0.00	0.00	0.00
10,000.0	1.37	250.02	9,628.0	2,344.0	-618.1	2,422.9	0.00	0.00	0.00
10,100.0	1.37	250.02	9,728.0	2,343.2	-620.3	2,422.7	0.00	0.00	0.00
10,200.0	1.37	250.02	9,828.0	2,342.4	-622.6	2,422.6	0.00	0.00	0.00
10,300.0	1.37	250.02	9,927.9	2,341.5	-624.8	2,422.5	0.00	0.00	0.00
10,400.0	1.37	250.02	10,027.9	2,340.7	-627.1	2,422.3	0.00	0.00	0.00
10,500.0	1.37	250.02	10,127.9	2,339.9	-629.3	2,422.2	0.00	0.00	0.00
10,600.0	1.37	250.02	10,227.8	2,339.1	-631.6	2,422.0	0.00	0.00	0.00
10,700.0	1.37	250.02	10,327.8	2,338.3	-633.8	2,421.9	0.00	0.00	0.00
10,800.0	1.37	250.02	10,427.8	2,337.5	-636.0	2,421.8	0.00	0.00	0.00
10,900.0	1.37	250.02	10,527.8	2,336.6	-638.3	2,421.6	0.00	0.00	0.00
11,000.0	1.37	250.02	10,627.7	2,335.8	-640.5	2,421.5	0.00	0.00	0.00
11,100.0	1.37	250.02	10,727.7	2,335.0	-642.8	2,421.3	0.00	0.00	0.00
11,200.0	1.37	250.02	10,827.7	2,334.2	-645.0	2,421.2	0.00	0.00	0.00
11,300.0	1.37	250.02	10,927.6	2,333.4	-647.3	2,421.0	0.00	0.00	0.00
11,400.0	1.37	250.02	11,027.6	2,332.6	-649.5	2,420.9	0.00	0.00	0.00
11,500.0	1.37	250.02	11,127.6	2,331.7	-651.8	2,420.8	0.00	0.00	0.00
11,600.0	1.37	250.02	11,227.6	2,330.9	-654.0	2,420.6	0.00	0.00	0.00
11,700.0	1.37	250.02	11,327.5	2,330.1	-656.3	2,420.5	0.00	0.00	0.00
11,800.0	1.37	250.02	11,427.5	2,329.3	-658.5	2,420.3	0.00	0.00	0.00
11,900.0	1.37	250.02	11,527.5	2,328.5	-660.8	2,420.2	0.00	0.00	0.00
12,000.0	1.37	250.02	11,627.4	2,327.7	-663.0	2,420.1	0.00	0.00	0.00
12,100.0	1.37	250.02	11,727.4	2,326.8	-665.2	2,419.9	0.00	0.00	0.00
<b>Cameo</b>									
12,177.6	1.37	250.02	11,805.0	2,326.2	-667.0	2,419.8	0.00	0.00	0.00
12,200.0	1.37	250.02	11,827.4	2,326.0	-667.5	2,419.8	0.00	0.00	0.00
12,300.0	1.37	250.02	11,927.4	2,325.2	-669.7	2,419.6	0.00	0.00	0.00
12,400.0	1.37	250.02	12,027.3	2,324.4	-672.0	2,419.5	0.00	0.00	0.00
12,500.0	1.37	250.02	12,127.3	2,323.6	-674.2	2,419.3	0.00	0.00	0.00
12,600.0	1.37	250.02	12,227.3	2,322.8	-676.5	2,419.2	0.00	0.00	0.00
12,700.0	1.37	250.02	12,327.2	2,321.9	-678.7	2,419.1	0.00	0.00	0.00
<b>Rollings</b>									
12,727.8	1.37	250.02	12,355.0	2,321.7	-679.3	2,419.0	0.00	0.00	0.00
12,800.0	1.37	250.02	12,427.2	2,321.1	-681.0	2,418.9	0.00	0.00	0.00
12,900.0	1.37	250.02	12,527.2	2,320.3	-683.2	2,418.8	0.00	0.00	0.00
13,000.0	1.37	250.02	12,627.2	2,319.5	-685.5	2,418.6	0.00	0.00	0.00
13,100.0	1.37	250.02	12,727.1	2,318.7	-687.7	2,418.5	0.00	0.00	0.00
13,200.0	1.37	250.02	12,827.1	2,317.9	-690.0	2,418.4	0.00	0.00	0.00
<b>TD at 13227.9</b>									
13,227.9	1.37	250.02	12,855.0	2,317.6	-690.6	2,418.3	0.00	0.00	0.00

<b>Database:</b>	EDM 5000.1 Single User Db	<b>Local Co-ordinate Reference:</b>	Well ELU O13 FED 12B-13 496 - Slot 12B-13
<b>Company:</b>	Caerus Oil & Gas	<b>TVD Reference:</b>	RKB @ 8143.0usft (25')
<b>Project:</b>	Rio Blanco County, CO	<b>MD Reference:</b>	RKB @ 8143.0usft (25')
<b>Site:</b>	ELU O13 496 Pad	<b>North Reference:</b>	True
<b>Well:</b>	ELU O13 FED 12B-13 496	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4		

## Design Targets

## Target Name

- hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude	Longitude
12B-13 - OHCR - plan hits target center - Point	0.00	0.00	8,626.0	2,351.8	-596.6	14,431,731.88	2,451,428.23	39.705170	-108.116722
12B-13 - PBHL - plan hits target center - Ellipse (radii L100.0 W50.0 on 250.00 azi)	0.00	0.00	12,855.0	2,317.6	-690.6	14,431,694.70	2,451,335.40	39.705077	-108.117056

## Formations

Measured Depth (usft)	Vertical Depth (usft)	Name	Lithology	Dip (°)	Dip Direction (°)
4,210.9	4,051.0	Wasatch			
6,732.6	6,451.0	Wasatch G			
7,047.8	6,751.0	Fort Union			
8,997.7	8,626.0	Ohio Creek			
9,542.8	9,171.0	Williams Fork			
12,177.6	11,805.0	Cameo			
12,727.8	12,355.0	Rollings			

## Plan Annotations

Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates		Comment
		+N/-S (usft)	+E/-W (usft)	
500.0	500.0	0.0	0.0	Start Build 3.00
1,095.7	1,086.1	89.3	-22.7	Start 7306.4 hold at 1095.7 MD
8,402.0	8,039.9	2,262.5	-573.9	Start Drop -3.00
8,997.7	8,626.0	2,351.8	-596.6	Start DLS 1.50 TFO 250.02
9,089.0	8,717.3	2,351.4	-597.6	Start 4138.9 hold at 9089.0 MD
13,227.9	12,855.0	2,317.6	-690.6	TD at 13227.9