

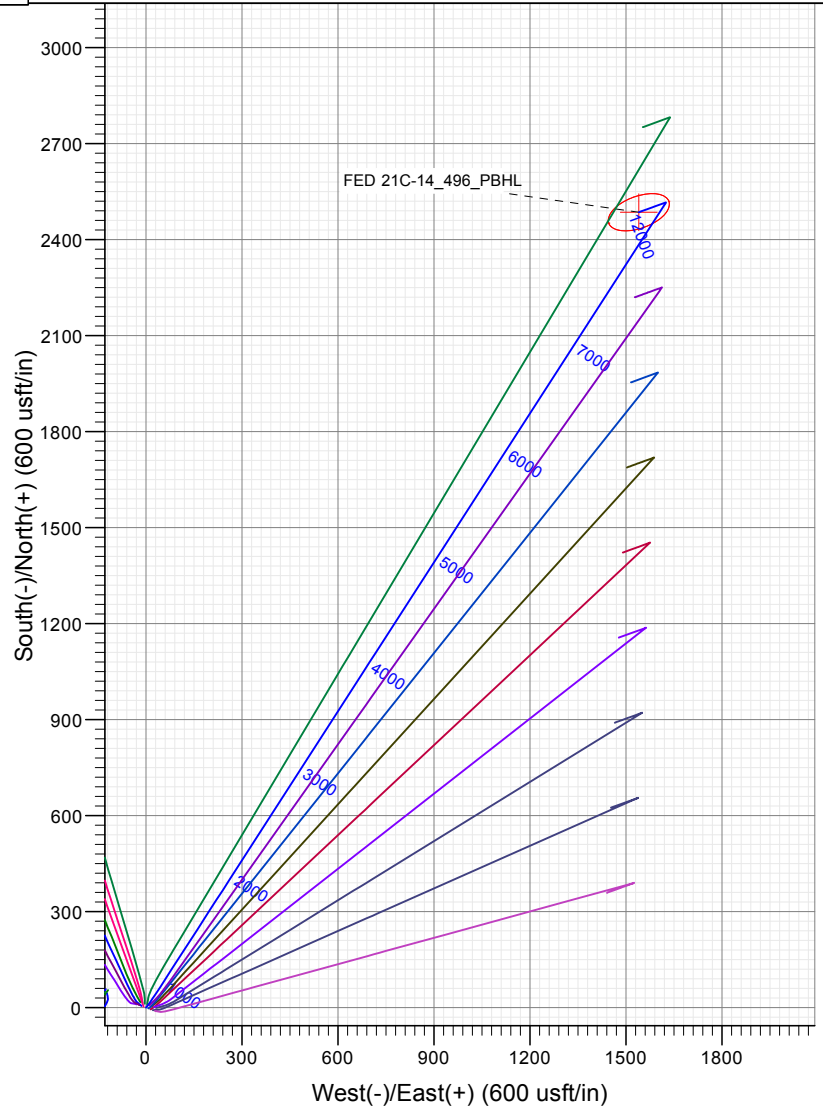
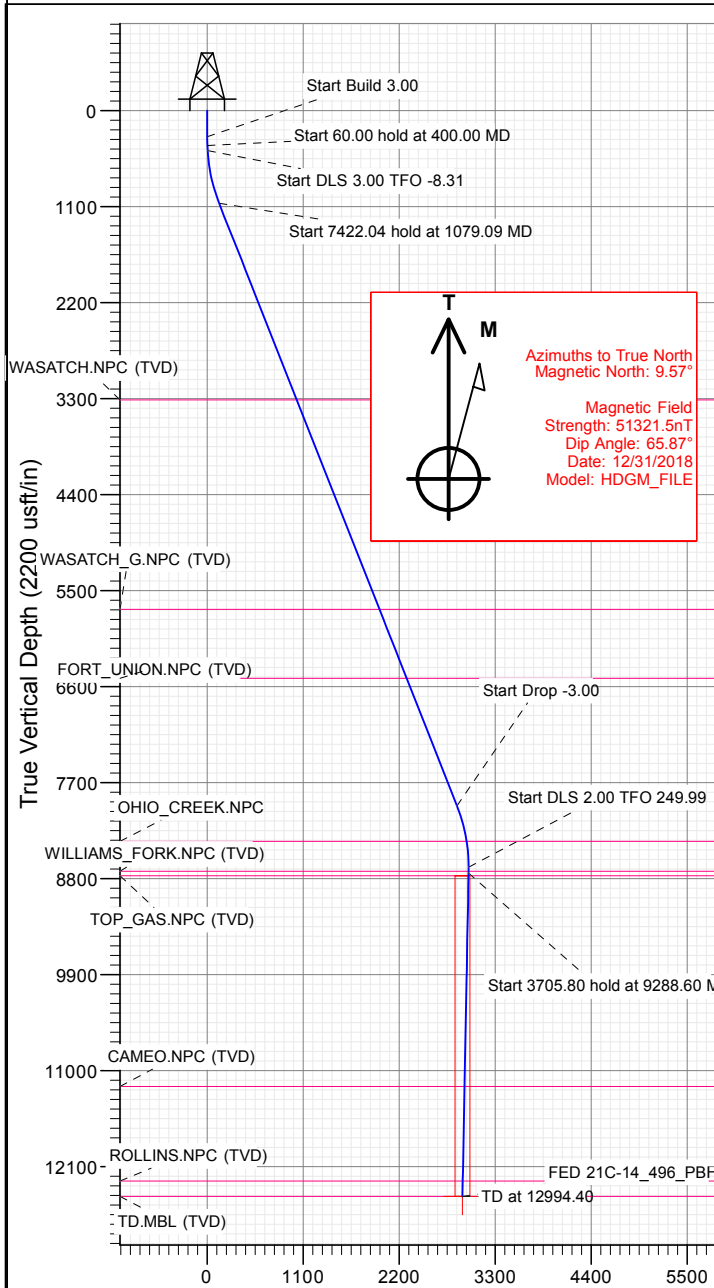


SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	V Sect	Target
1	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
2	300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	
3	400.00	3.00	40.00	399.95	2.01	1.68	3.00	40.00	2.59	
4	460.00	3.00	40.00	459.87	4.41	3.70	0.00	0.00	5.70	
5	1079.09	21.55	32.80	1062.19	113.33	76.34	3.00	-8.31	136.54	
6	8501.13	21.55	32.80	7965.62	2404.35	1552.98	0.00	0.00	2861.78	
7	9219.31	0.00	0.00	8667.00	2516.23	1625.28	3.00	180.00	2995.20	
8	9288.60	1.39	249.99	8736.28	2516.23	1624.49	2.00	249.99	2994.55	
9	12994.40	1.39	249.99	12441.00	2485.57	1540.28	0.00	0.00	2924.13	FED 21C-14_496_PBHL

PLAN #1 FED 21C-14_496 GL +RB = 30' @ 7532.00usft Ground Level @ 7902.00 NAD 1927 - Western US Well FED 21C-14_496 - Slot ES_5, True North									
Type	Target	Azimuth	Origin	Type	N/S	E/W	From	TVD	
TD	No Target (Freehand)	31.79	Slot		0.00	0.00	TVD	0.00	
Name	FED 21C-14_496_PBHL	TVD	+N/-S	+E/-W	Latitude	Longitude			
		12441.00	2485.57	1540.28	39.707633	-108.130552			

Project: Garfield County, CO (UTM 12N)
Site: SEC 14-T4S-R96W ELU J14 496 PAD
Well: FED 21C-14_496
Wellbore: OH
Design: PLAN #1



FORMATION TOP DETAILS

TVDPath	MDPath	Formation
3316.00	3502.21	WASATCH.NPC (TVD)
5716.00	6082.50	WASATCH.G.NPC (TVD)
6505.00	6930.78	FORT UNION.NPC (TVD)
8373.00	8924.14	OHIO_CREEK.NPC
8717.00	9269.31	WILLIAMS_FORK.NPC (TVD)
8767.00	9319.33	TOP_GAS.NPC (TVD)
11183.00	11736.03	CAMEO.NPC (TVD)
12266.00	12819.35	ROLLINS.NPC (TVD)
12441.00	12994.40	TD.MBL (TVD)

WELL DETAILS: FED 21C-14_496

+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
0.00	0.00	14429970.30	2446048.60	39.700812	-108.136025

ES_5



Planning Report

Database:	USA EDM 5000 Multi Users DB	Local Co-ordinate Reference:	Well FED 21C-14_496 - Slot ES_5
Company:	Caerus Oil & Gas	TVD Reference:	GL + KB = 30' @ 7932.00usft
Project:	Garfield County, CO (UTM 12N)	MD Reference:	GL + KB = 30' @ 7932.00usft
Site:	SEC 14-T4S-R96W ELU J14 496 PAD	North Reference:	True
Well:	FED 21C-14_496	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1		

Project	Garfield County, CO (UTM 12N)		
Map System:	Universal Transverse Mercator (US Survey Feet)	System Datum:	Mean Sea Level
Geo Datum:	NAD 1927 - Western US		
Map Zone:	Zone 12N (114 W to 108 W)		

Site		SEC 14-T4S-R96W ELU J14 496 PAD			
Site Position:		Northing:	14,430,033.00 usft	Latitude:	39.700997
From:	Map	Easting:	2,445,893.00 usft	Longitude:	-108.136570
Position Uncertainty:	3.28 usft	Slot Radius:	13-3/16 "	Grid Convergence:	1.83 °

Well	FED 21C-14_496 - Slot ES_5					
Well Position	+N/-S	0.00 usft	Northing:	14,429,970.30 usft	Latitude:	39.700812
	+E/-W	0.00 usft	Easting:	2,446,048.60 usft	Longitude:	-108.136025
Position Uncertainty		3.28 usft	Wellhead Elevation:	usft	Ground Level:	7,902.00 usft

Wellbore	OH				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	HDGM_FILE	12/31/2018	9.57	65.87	51,321.50000000

Design	PLAN #1			
Audit Notes:				
Version:	Phase:	PLAN	Tie On Depth:	0.00
Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)
	0.00	0.00	0.00	31.79

Plan Sections										
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
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	0.00	
400.00	3.00	40.00	399.95	2.01	1.68	3.00	3.00	0.00	40.00	
460.00	3.00	40.00	459.87	4.41	3.70	0.00	0.00	0.00	0.00	
1,079.09	21.55	32.80	1,062.19	113.33	76.34	3.00	3.00	-1.16	-8.31	
8,501.13	21.55	32.80	7,965.62	2,404.35	1,552.98	0.00	0.00	0.00	0.00	
9,219.31	0.00	0.00	8,667.00	2,516.51	1,625.28	3.00	-3.00	0.00	180.00	
9,288.60	1.39	249.99	8,736.28	2,516.23	1,624.49	2.00	2.00	-158.77	249.99	
12,994.40	1.39	249.99	12,441.00	2,485.57	1,540.28	0.00	0.00	0.00	0.00	FED 21C-14_496_PB

Planning Report

Database:	USA EDM 5000 Multi Users DB	Local Co-ordinate Reference:	Well FED 21C-14_496 - Slot ES_5
Company:	Caerus Oil & Gas	TVD Reference:	GL + KB = 30' @ 7932.00usft
Project:	Garfield County, CO (UTM 12N)	MD Reference:	GL + KB = 30' @ 7932.00usft
Site:	SEC 14-T4S-R96W ELU J14 496 PAD	North Reference:	True
Well:	FED 21C-14_496	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100u)	Comments / Formations
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
100.00	0.00	0.00	100.00	0.00	0.00	0.00	0.00	0.00	
200.00	0.00	0.00	200.00	0.00	0.00	0.00	0.00	0.00	
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	Start Build 3.00
400.00	3.00	40.00	399.95	2.01	1.68	2.59	3.00	3.00	Start 60.00 hold at 400.00 MD
460.00	3.00	40.00	459.87	4.41	3.70	5.70	0.00	0.00	Start DLS 3.00 TFO -8.31
500.00	4.19	37.63	499.79	6.37	5.27	8.19	3.00	2.98	
600.00	7.18	35.15	599.29	14.38	11.10	18.07	3.00	2.99	
700.00	10.18	34.12	698.13	26.81	19.65	33.14	3.00	3.00	
800.00	13.18	33.56	796.05	43.62	30.91	53.36	3.00	3.00	
900.00	16.17	33.20	892.78	64.78	44.84	78.68	3.00	3.00	
1,000.00	19.17	32.95	988.05	90.22	61.40	109.03	3.00	3.00	
1,079.09	21.55	32.80	1,062.19	113.33	76.34	136.54	3.00	3.00	Start 7422.04 hold at 1079.09 MD
1,100.00	21.55	32.80	1,081.64	119.78	80.50	144.22	0.00	0.00	
1,200.00	21.55	32.80	1,174.65	150.65	100.39	180.94	0.00	0.00	
1,300.00	21.55	32.80	1,267.67	181.52	120.29	217.65	0.00	0.00	
1,400.00	21.55	32.80	1,360.68	212.38	140.18	254.37	0.00	0.00	
1,500.00	21.55	32.80	1,453.69	243.25	160.08	291.09	0.00	0.00	
1,600.00	21.55	32.80	1,546.70	274.12	179.97	327.81	0.00	0.00	
1,700.00	21.55	32.80	1,639.72	304.99	199.87	364.53	0.00	0.00	
1,800.00	21.55	32.80	1,732.73	335.85	219.76	401.24	0.00	0.00	
1,900.00	21.55	32.80	1,825.74	366.72	239.66	437.96	0.00	0.00	
2,000.00	21.55	32.80	1,918.75	397.59	259.56	474.68	0.00	0.00	
2,100.00	21.55	32.80	2,011.77	428.46	279.45	511.40	0.00	0.00	
2,200.00	21.55	32.80	2,104.78	459.33	299.35	548.12	0.00	0.00	
2,300.00	21.55	32.80	2,197.79	490.19	319.24	584.84	0.00	0.00	
2,400.00	21.55	32.80	2,290.81	521.06	339.14	621.55	0.00	0.00	
2,500.00	21.55	32.80	2,383.82	551.93	359.03	658.27	0.00	0.00	
2,600.00	21.55	32.80	2,476.83	582.80	378.93	694.99	0.00	0.00	
2,700.00	21.55	32.80	2,569.84	613.67	398.82	731.71	0.00	0.00	
2,800.00	21.55	32.80	2,662.86	644.53	418.72	768.43	0.00	0.00	
2,900.00	21.55	32.80	2,755.87	675.40	438.61	805.14	0.00	0.00	
3,000.00	21.55	32.80	2,848.88	706.27	458.51	841.86	0.00	0.00	
3,100.00	21.55	32.80	2,941.89	737.14	478.41	878.58	0.00	0.00	
3,200.00	21.55	32.80	3,034.91	768.00	498.30	915.30	0.00	0.00	
3,300.00	21.55	32.80	3,127.92	798.87	518.20	952.02	0.00	0.00	
3,400.00	21.55	32.80	3,220.93	829.74	538.09	988.74	0.00	0.00	
3,500.00	21.55	32.80	3,313.94	860.61	557.99	1,025.45	0.00	0.00	
3,502.21	21.55	32.80	3,316.00	861.29	558.43	1,026.27	0.00	0.00	WASATCH.NPC (TVD)
3,600.00	21.55	32.80	3,406.96	891.48	577.88	1,062.17	0.00	0.00	
3,700.00	21.55	32.80	3,499.97	922.34	597.78	1,098.89	0.00	0.00	
3,800.00	21.55	32.80	3,592.98	953.21	617.67	1,135.61	0.00	0.00	
3,900.00	21.55	32.80	3,685.99	984.08	637.57	1,172.33	0.00	0.00	
4,000.00	21.55	32.80	3,779.01	1,014.95	657.46	1,209.04	0.00	0.00	
4,100.00	21.55	32.80	3,872.02	1,045.81	677.36	1,245.76	0.00	0.00	
4,200.00	21.55	32.80	3,965.03	1,076.68	697.26	1,282.48	0.00	0.00	
4,300.00	21.55	32.80	4,058.05	1,107.55	717.15	1,319.20	0.00	0.00	
4,400.00	21.55	32.80	4,151.06	1,138.42	737.05	1,355.92	0.00	0.00	
4,500.00	21.55	32.80	4,244.07	1,169.29	756.94	1,392.64	0.00	0.00	
4,600.00	21.55	32.80	4,337.08	1,200.15	776.84	1,429.35	0.00	0.00	
4,700.00	21.55	32.80	4,430.10	1,231.02	796.73	1,466.07	0.00	0.00	
4,800.00	21.55	32.80	4,523.11	1,261.89	816.63	1,502.79	0.00	0.00	

Planning Report

Database:	USA EDM 5000 Multi Users DB	Local Co-ordinate Reference:	Well FED 21C-14_496 - Slot ES_5
Company:	Caerus Oil & Gas	TVD Reference:	GL + KB = 30' @ 7932.00usft
Project:	Garfield County, CO (UTM 12N)	MD Reference:	GL + KB = 30' @ 7932.00usft
Site:	SEC 14-T4S-R96W ELU J14 496 PAD	North Reference:	True
Well:	FED 21C-14_496	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100u)	Comments / Formations
4,900.00	21.55	32.80	4,616.12	1,292.76	836.52	1,539.51	0.00	0.00	
5,000.00	21.55	32.80	4,709.13	1,323.63	856.42	1,576.23	0.00	0.00	
5,100.00	21.55	32.80	4,802.15	1,354.49	876.31	1,612.94	0.00	0.00	
5,200.00	21.55	32.80	4,895.16	1,385.36	896.21	1,649.66	0.00	0.00	
5,300.00	21.55	32.80	4,988.17	1,416.23	916.11	1,686.38	0.00	0.00	
5,400.00	21.55	32.80	5,081.18	1,447.10	936.00	1,723.10	0.00	0.00	
5,500.00	21.55	32.80	5,174.20	1,477.96	955.90	1,759.82	0.00	0.00	
5,600.00	21.55	32.80	5,267.21	1,508.83	975.79	1,796.54	0.00	0.00	
5,700.00	21.55	32.80	5,360.22	1,539.70	995.69	1,833.25	0.00	0.00	
5,800.00	21.55	32.80	5,453.23	1,570.57	1,015.58	1,869.97	0.00	0.00	
5,900.00	21.55	32.80	5,546.25	1,601.44	1,035.48	1,906.69	0.00	0.00	
6,000.00	21.55	32.80	5,639.26	1,632.30	1,055.37	1,943.41	0.00	0.00	
6,082.50	21.55	32.80	5,716.00	1,657.77	1,071.79	1,973.70	0.00	0.00	WASATCH_G.NPC (TVD)
6,100.00	21.55	32.80	5,732.27	1,663.17	1,075.27	1,980.13	0.00	0.00	
6,200.00	21.55	32.80	5,825.29	1,694.04	1,095.16	2,016.84	0.00	0.00	
6,300.00	21.55	32.80	5,918.30	1,724.91	1,115.06	2,053.56	0.00	0.00	
6,400.00	21.55	32.80	6,011.31	1,755.77	1,134.95	2,090.28	0.00	0.00	
6,500.00	21.55	32.80	6,104.32	1,786.64	1,154.85	2,127.00	0.00	0.00	
6,600.00	21.55	32.80	6,197.34	1,817.51	1,174.75	2,163.72	0.00	0.00	
6,700.00	21.55	32.80	6,290.35	1,848.38	1,194.64	2,200.44	0.00	0.00	
6,800.00	21.55	32.80	6,383.36	1,879.25	1,214.54	2,237.15	0.00	0.00	
6,900.00	21.55	32.80	6,476.37	1,910.11	1,234.43	2,273.87	0.00	0.00	
6,930.78	21.55	32.80	6,505.00	1,919.61	1,240.56	2,285.17	0.00	0.00	FORT_UNION.NPC (TVD)
7,000.00	21.55	32.80	6,569.39	1,940.98	1,254.33	2,310.59	0.00	0.00	
7,100.00	21.55	32.80	6,662.40	1,971.85	1,274.22	2,347.31	0.00	0.00	
7,200.00	21.55	32.80	6,755.41	2,002.72	1,294.12	2,384.03	0.00	0.00	
7,300.00	21.55	32.80	6,848.42	2,033.58	1,314.01	2,420.75	0.00	0.00	
7,400.00	21.55	32.80	6,941.44	2,064.45	1,333.91	2,457.46	0.00	0.00	
7,500.00	21.55	32.80	7,034.45	2,095.32	1,353.80	2,494.18	0.00	0.00	
7,600.00	21.55	32.80	7,127.46	2,126.19	1,373.70	2,530.90	0.00	0.00	
7,700.00	21.55	32.80	7,220.47	2,157.06	1,393.60	2,567.62	0.00	0.00	
7,800.00	21.55	32.80	7,313.49	2,187.92	1,413.49	2,604.34	0.00	0.00	
7,900.00	21.55	32.80	7,406.50	2,218.79	1,433.39	2,641.05	0.00	0.00	
8,000.00	21.55	32.80	7,499.51	2,249.66	1,453.28	2,677.77	0.00	0.00	
8,100.00	21.55	32.80	7,592.53	2,280.53	1,473.18	2,714.49	0.00	0.00	
8,200.00	21.55	32.80	7,685.54	2,311.40	1,493.07	2,751.21	0.00	0.00	
8,300.00	21.55	32.80	7,778.55	2,342.26	1,512.97	2,787.93	0.00	0.00	
8,400.00	21.55	32.80	7,871.56	2,373.13	1,532.86	2,824.65	0.00	0.00	
8,500.00	21.55	32.80	7,964.58	2,404.00	1,552.76	2,861.36	0.00	0.00	
8,501.13	21.55	32.80	7,965.62	2,404.35	1,552.98	2,861.78	0.00	0.00	Start Drop -3.00
8,600.00	18.58	32.80	8,058.49	2,432.85	1,571.36	2,895.69	3.00	-3.00	
8,700.00	15.58	32.80	8,154.07	2,457.54	1,587.27	2,925.05	3.00	-3.00	
8,800.00	12.58	32.80	8,251.05	2,477.98	1,600.44	2,949.37	3.00	-3.00	
8,900.00	9.58	32.80	8,349.18	2,494.13	1,610.85	2,968.58	3.00	-3.00	
8,924.14	8.86	32.80	8,373.00	2,497.38	1,612.95	2,972.44	3.00	-3.00	OHIO_CREEK.NPC
9,000.00	6.58	32.80	8,448.17	2,505.94	1,618.47	2,982.63	3.00	-3.00	
9,100.00	3.58	32.80	8,547.77	2,513.38	1,623.26	2,991.48	3.00	-3.00	
9,200.00	0.58	32.80	8,647.69	2,516.43	1,625.23	2,995.11	3.00	-3.00	
9,219.31	0.00	0.00	8,667.00	2,516.51	1,625.28	2,995.20	3.00	-3.00	Start DLS 2.00 TFO 249.99
9,269.31	1.00	249.99	8,717.00	2,516.37	1,624.87	2,994.86	2.00	2.00	WILLIAMS_FORK.NPC (TVD)
9,288.60	1.39	249.99	8,736.28	2,516.23	1,624.49	2,994.55	2.00	2.00	Start 3705.80 hold at 9288.60 MD
9,300.00	1.39	249.99	8,747.68	2,516.13	1,624.23	2,994.33	0.00	0.00	

Planning Report

Database:	USA EDM 5000 Multi Users DB	Local Co-ordinate Reference:	Well FED 21C-14_496 - Slot ES_5
Company:	Caerus Oil & Gas	TVD Reference:	GL + KB = 30' @ 7932.00usft
Project:	Garfield County, CO (UTM 12N)	MD Reference:	GL + KB = 30' @ 7932.00usft
Site:	SEC 14-T4S-R96W ELU J14 496 PAD	North Reference:	True
Well:	FED 21C-14_496	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100u)	Comments / Formations
9,319.33	1.39	249.99	8,767.00	2,515.97	1,623.79	2,993.96	0.00	0.00	TOP_GAS.NPC (TVD)
9,400.00	1.39	249.99	8,847.65	2,515.31	1,621.96	2,992.43	0.00	0.00	
9,500.00	1.39	249.99	8,947.62	2,514.48	1,619.69	2,990.53	0.00	0.00	
9,600.00	1.39	249.99	9,047.59	2,513.65	1,617.42	2,988.63	0.00	0.00	
9,700.00	1.39	249.99	9,147.56	2,512.82	1,615.14	2,986.73	0.00	0.00	
9,800.00	1.39	249.99	9,247.53	2,512.00	1,612.87	2,984.83	0.00	0.00	
9,900.00	1.39	249.99	9,347.50	2,511.17	1,610.60	2,982.93	0.00	0.00	
10,000.00	1.39	249.99	9,447.48	2,510.34	1,608.33	2,981.03	0.00	0.00	
10,100.00	1.39	249.99	9,547.45	2,509.52	1,606.05	2,979.13	0.00	0.00	
10,200.00	1.39	249.99	9,647.42	2,508.69	1,603.78	2,977.23	0.00	0.00	
10,300.00	1.39	249.99	9,747.39	2,507.86	1,601.51	2,975.33	0.00	0.00	
10,400.00	1.39	249.99	9,847.36	2,507.03	1,599.24	2,973.43	0.00	0.00	
10,500.00	1.39	249.99	9,947.33	2,506.21	1,596.96	2,971.53	0.00	0.00	
10,600.00	1.39	249.99	10,047.30	2,505.38	1,594.69	2,969.63	0.00	0.00	
10,700.00	1.39	249.99	10,147.27	2,504.55	1,592.42	2,967.73	0.00	0.00	
10,800.00	1.39	249.99	10,247.24	2,503.72	1,590.15	2,965.83	0.00	0.00	
10,900.00	1.39	249.99	10,347.21	2,502.90	1,587.87	2,963.93	0.00	0.00	
11,000.00	1.39	249.99	10,447.18	2,502.07	1,585.60	2,962.03	0.00	0.00	
11,100.00	1.39	249.99	10,547.15	2,501.24	1,583.33	2,960.12	0.00	0.00	
11,200.00	1.39	249.99	10,647.12	2,500.41	1,581.06	2,958.22	0.00	0.00	
11,300.00	1.39	249.99	10,747.10	2,499.59	1,578.78	2,956.32	0.00	0.00	
11,400.00	1.39	249.99	10,847.07	2,498.76	1,576.51	2,954.42	0.00	0.00	
11,500.00	1.39	249.99	10,947.04	2,497.93	1,574.24	2,952.52	0.00	0.00	
11,600.00	1.39	249.99	11,047.01	2,497.10	1,571.97	2,950.62	0.00	0.00	
11,700.00	1.39	249.99	11,146.98	2,496.28	1,569.70	2,948.72	0.00	0.00	
11,736.03	1.39	249.99	11,183.00	2,495.98	1,568.88	2,948.04	0.00	0.00	CAMEO.NPC (TVD)
11,800.00	1.39	249.99	11,246.95	2,495.45	1,567.42	2,946.82	0.00	0.00	
11,900.00	1.39	249.99	11,346.92	2,494.62	1,565.15	2,944.92	0.00	0.00	
12,000.00	1.39	249.99	11,446.89	2,493.80	1,562.88	2,943.02	0.00	0.00	
12,100.00	1.39	249.99	11,546.86	2,492.97	1,560.61	2,941.12	0.00	0.00	
12,200.00	1.39	249.99	11,646.83	2,492.14	1,558.33	2,939.22	0.00	0.00	
12,300.00	1.39	249.99	11,746.80	2,491.31	1,556.06	2,937.32	0.00	0.00	
12,400.00	1.39	249.99	11,846.77	2,490.49	1,553.79	2,935.42	0.00	0.00	
12,500.00	1.39	249.99	11,946.74	2,489.66	1,551.52	2,933.52	0.00	0.00	
12,600.00	1.39	249.99	12,046.72	2,488.83	1,549.24	2,931.62	0.00	0.00	
12,700.00	1.39	249.99	12,146.69	2,488.00	1,546.97	2,929.72	0.00	0.00	
12,800.00	1.39	249.99	12,246.66	2,487.18	1,544.70	2,927.82	0.00	0.00	
12,819.35	1.39	249.99	12,266.00	2,487.02	1,544.26	2,927.45	0.00	0.00	ROLLINS.NPC (TVD)
12,900.00	1.39	249.99	12,346.63	2,486.35	1,542.43	2,925.92	0.00	0.00	
12,994.40	1.39	249.99	12,441.00	2,485.57	1,540.28	2,924.13	0.00	0.00	TD at 12994.40 - TD.MBL (TVD) - FED 21C-14_

Targets									
Target Name									
- hit/miss target	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude	Longitude
- Shape									
FED 21C-14_496_PBHL	0.00	0.00	12,441.00	2,485.57	1,540.28	14,432,503.80	2,447,508.70	39.707633	-108.130552
- plan hits target center									
- Ellipse (radii L100.00 W50.00 on 250.00 azi)									

Planning Report

Database:	USA EDM 5000 Multi Users DB	Local Co-ordinate Reference:	Well FED 21C-14_496 - Slot ES_5
Company:	Caerus Oil & Gas	TVD Reference:	GL + KB = 30' @ 7932.00usft
Project:	Garfield County, CO (UTM 12N)	MD Reference:	GL + KB = 30' @ 7932.00usft
Site:	SEC 14-T4S-R96W ELU J14 496 PAD	North Reference:	True
Well:	FED 21C-14_496	Survey Calculation Method:	Minimum Curvature
Wellbore:	OH		
Design:	PLAN #1		

Formations						
Measured Depth (usft)	Vertical Depth (usft)	Name	Lithology	Dip (°)	Dip Direction (°)	
3,502.21	3,316.00	WASATCH.NPC (TVD)				
6,082.50	5,716.00	WASATCH_G.NPC (TVD)				
6,930.78	6,505.00	FORT_UNION.NPC (TVD)				
8,924.14	8,373.00	OHIO_CREEK.NPC				
9,269.31	8,717.00	WILLIAMS_FORK.NPC (TVD)				
9,319.33	8,767.00	TOP_GAS.NPC (TVD)				
11,736.03	11,183.00	CAMEO.NPC (TVD)				
12,819.35	12,266.00	ROLLINS.NPC (TVD)				
12,994.40	12,441.00	TD.MBL (TVD)				

Plan Annotations					
Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates			
		+N/-S (usft)	+E/-W (usft)	Comment	
300.00	300.00	0.00	0.00	Start Build 3.00	
400.00	399.95	2.01	1.68	Start 60.00 hold at 400.00 MD	
460.00	459.87	4.41	3.70	Start DLS 3.00 TFO -8.31	
1,079.09	1,062.19	113.33	76.34	Start 7422.04 hold at 1079.09 MD	
8,501.13	7,965.62	2,404.35	1,552.98	Start Drop -3.00	
9,219.31	8,667.00	2,516.51	1,625.28	Start DLS 2.00 TFO 249.99	
9,288.60	8,736.28	2,516.23	1,624.49	Start 3705.80 hold at 9288.60 MD	
12,994.40	12,441.00	2,485.57	1,540.28	TD at 12994.40	