

US ROCKIES WATTENBERG PLANNING

**WELD-NAD83-UTMFT13N
2N-65W-13 Guest 11-13HZ Pad
GUEST 29N-12HZ**

Plan A

Plan: Permit Rev-3

Standard Planning Report

15 November, 2016

Project: WELD-NAD83-UTMFT13N
 Site: 2N-65W-13 Guest 11-13HZ Pad
 Well: GUEST 29N-12HZ
 Wellbore: Plan A
 Design: Permit Rev-3

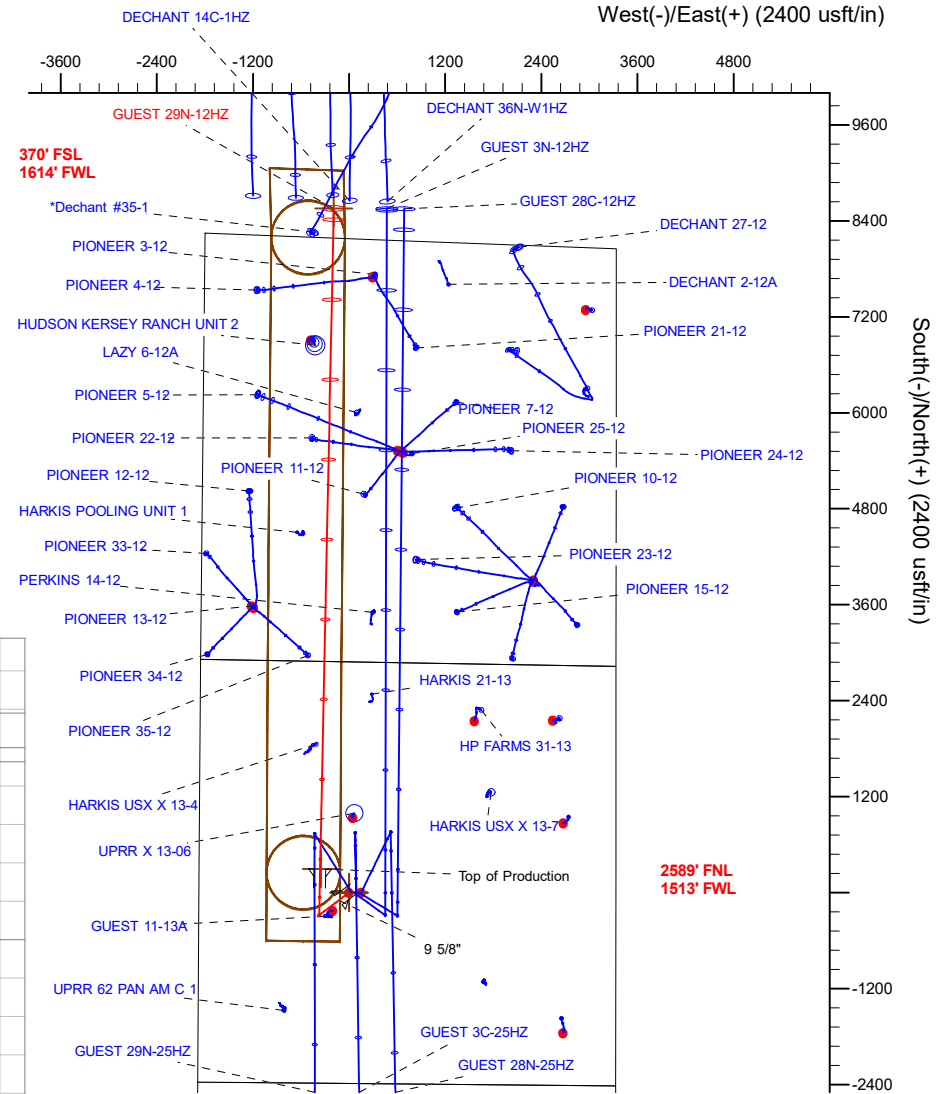
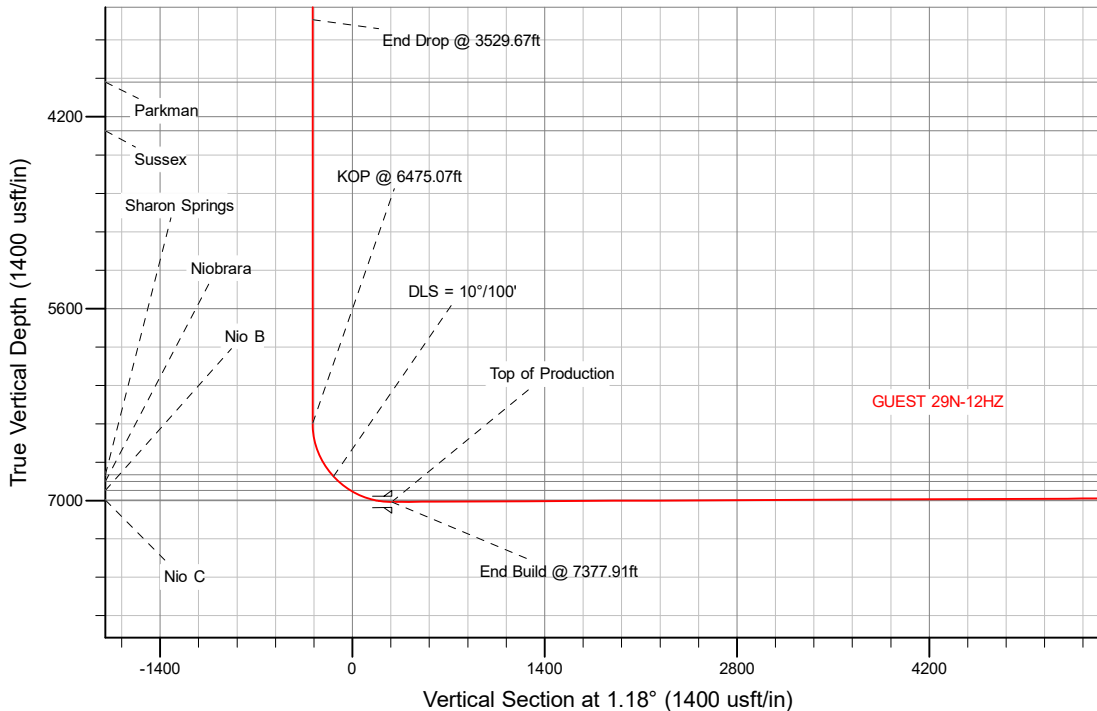
US ROCKIES WATTENBERG PLANNING

SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	Vsect	Target
1	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
2	250.00	0.00	0.00	250.00	0.00	0.00	0.00	0.00	0.00	
3	916.67	10.00	233.00	913.29	-34.92	-46.34	1.50	233.00	-35.87	
4	3029.67	10.00	233.00	2994.19	-255.74	-339.38	0.00	0.00	-262.68	
5	3529.67	0.00	0.00	3491.65	-281.93	-374.14	2.00	180.00	-289.58	
6	6475.07	0.00	0.00	6437.05	-281.93	-374.14	0.00	0.00	-289.58	
7	7377.91	90.28	1.18	7010.00	293.75	-362.27	10.00	1.18	286.22	
8	15641.02	90.28	1.18	6969.00	8555.00	-191.89	0.00	0.00	8549.23	GUEST 29N-12HZ_Toe

WELLBORE TARGET DETAILS (LAT/LONG)

Name	TVD	+N/-S	+E/-W	Latitude	Longitude	Shape
GUEST 29N-12HZ_SHL	0.00	0.00	0.00	40.137759	-104.614855	Point
GUEST 29N-12HZ_Toe	6969.00	8555.00	-191.89	40.161252	-104.615542	Point



WELL DETAILS: GUEST 29N-12HZ	
Ground Level:	4872.00
GL 4872 & KB 17 @ 4889.00usft (ASSUMED)	
Plan: Permit Rev-3 (GUEST 29N-12HZ/Plan A)	
Created By:	Date: 11/15/2016
Reviewed:	Date:

Corporate Planning Report

Database:	PLANNING	Local Co-ordinate Reference:	Well GUEST 29N-12HZ
Company:	US ROCKIES WATTENBERG PLANNING	TVD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Project:	WELD-NAD83-UTMFT13N	MD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Site:	2N-65W-13 Guest 11-13HZ Pad	North Reference:	True
Well:	GUEST 29N-12HZ	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Permit Rev-3		

Project	WELD-NAD83-UTMFT13N		
Map System:	Universal Transverse Mercator (US Survey Feet)	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Zone 13N (108 W to 102 W)		

Site	2N-65W-13 Guest 11-13HZ Pad				
Site Position:		Northing:	14,577,131.06 usft	Latitude:	40.137758
From:	Lat/Long	Easting:	1,748,179.59 usft	Longitude:	-104.614427
Position Uncertainty:	2.68 usft	Slot Radius:	0 "	Grid Convergence:	0.25 °

Well	GUEST 29N-12HZ					
Well Position	+N/-S	0.36 usft	Northing:	14,577,130.91 usft	Latitude:	40.137759
	+E/-W	-119.62 usft	Easting:	1,748,059.96 usft	Longitude:	-104.614855
Position Uncertainty		3.28 usft	Wellhead Elevation:	0.00 usft	Ground Level:	4,872.00 usft

Wellbore	Plan A				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	11/12/2014	8.30	66.75	52,649.64602203

Design	Permit Rev-3			
Audit Notes:				
Version:	Phase:	PROTOTYPE	Tie On Depth:	0.00
Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)
	0.00	0.00	0.00	1.18

Plan Survey Tool Program	Date	11/15/2016		
Depth From (usft)	Depth To (usft)	Survey (Wellbore)	Tool Name	Remarks
1	0.00	1,500.00 Permit Rev-3 (Plan A)	APC_ISCWSA REV 2 MWD+I	Fixed:v2:crustal field declinatio
2	1,500.00	15,641.02 Permit Rev-3 (Plan A)	APC_ISCWSA REV 2 MWD+I	Fixed:v2:crustal field declinatio

Corporate Planning Report

Database:	PLANNING	Local Co-ordinate Reference:	Well GUEST 29N-12HZ
Company:	US ROCKIES WATTENBERG PLANNING	TVD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Project:	WELD-NAD83-UTMFT13N	MD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Site:	2N-65W-13 Guest 11-13HZ Pad	North Reference:	True
Well:	GUEST 29N-12HZ	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Permit Rev-3		

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	
250.00	0.00	0.00	250.00	0.00	0.00	0.00	0.00	0.00	0.00	
916.67	10.00	233.00	913.29	-34.92	-46.34	1.50	1.50	0.00	233.00	
3,029.67	10.00	233.00	2,994.19	-255.74	-339.38	0.00	0.00	0.00	0.00	
3,529.67	0.00	0.00	3,491.65	-281.93	-374.14	2.00	-2.00	0.00	180.00	
6,475.07	0.00	0.00	6,437.05	-281.93	-374.14	0.00	0.00	0.00	0.00	
7,377.91	90.28	1.18	7,010.00	293.75	-362.27	10.00	10.00	0.13	1.18	
15,641.02	90.28	1.18	6,969.00	8,555.00	-191.89	0.00	0.00	0.00	0.00	GUEST 29N-12HZ_Tr

**Corporate
Planning Report**

Database:	PLANNING	Local Co-ordinate Reference:	Well GUEST 29N-12HZ
Company:	US ROCKIES WATTENBERG PLANNING	TVD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Project:	WELD-NAD83-UTMFT13N	MD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Site:	2N-65W-13 Guest 11-13HZ Pad	North Reference:	True
Well:	GUEST 29N-12HZ	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Permit Rev-3		

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)	
0.00	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	0.00	
200.00	0.00	0.00	200.00	0.00	0.00	0.00	0.00	0.00	0.00	
250.00	0.00	0.00	250.00	0.00	0.00	0.00	0.00	0.00	0.00	
Begin Nudge @ 250.00ft										
300.00	0.75	233.00	300.00	-0.20	-0.26	-0.20	1.50	1.50	0.00	
400.00	2.25	233.00	399.96	-1.77	-2.35	-1.82	1.50	1.50	0.00	
500.00	3.75	233.00	499.82	-4.92	-6.53	-5.06	1.50	1.50	0.00	
600.00	5.25	233.00	599.51	-9.64	-12.80	-9.90	1.50	1.50	0.00	
700.00	6.75	233.00	698.96	-15.93	-21.15	-16.37	1.50	1.50	0.00	
800.00	8.25	233.00	798.10	-23.79	-31.57	-24.43	1.50	1.50	0.00	
900.00	9.75	233.00	896.87	-33.20	-44.06	-34.10	1.50	1.50	0.00	
916.67	10.00	233.00	913.29	-34.92	-46.35	-35.87	1.50	1.50	0.00	
End Nudge @ 916.67ft										
1,000.00	10.00	233.00	995.35	-43.63	-57.90	-44.82	0.00	0.00	0.00	
1,100.00	10.00	233.00	1,093.84	-54.08	-71.77	-55.55	0.00	0.00	0.00	
1,200.00	10.00	233.00	1,192.32	-64.53	-85.64	-66.28	0.00	0.00	0.00	
1,300.00	10.00	233.00	1,290.80	-74.98	-99.51	-77.02	0.00	0.00	0.00	
1,342.85	10.00	233.00	1,333.00	-79.46	-105.45	-81.62	0.00	0.00	0.00	
Fox Hills Mkr										
1,400.00	10.00	233.00	1,389.28	-85.43	-113.37	-87.75	0.00	0.00	0.00	
1,500.00	10.00	233.00	1,487.76	-95.88	-127.24	-98.48	0.00	0.00	0.00	
1,512.43	10.00	233.00	1,500.00	-97.18	-128.97	-99.82	0.00	0.00	0.00	
9 5/8"										
1,600.00	10.00	233.00	1,586.24	-106.33	-141.11	-109.22	0.00	0.00	0.00	
1,700.00	10.00	233.00	1,684.72	-116.78	-154.98	-119.95	0.00	0.00	0.00	
1,800.00	10.00	233.00	1,783.20	-127.24	-168.85	-130.69	0.00	0.00	0.00	
1,900.00	10.00	233.00	1,881.68	-137.69	-182.72	-141.42	0.00	0.00	0.00	
2,000.00	10.00	233.00	1,980.16	-148.14	-196.58	-152.15	0.00	0.00	0.00	
2,100.00	10.00	233.00	2,078.64	-158.59	-210.45	-162.89	0.00	0.00	0.00	
2,200.00	10.00	233.00	2,177.12	-169.04	-224.32	-173.62	0.00	0.00	0.00	
2,300.00	10.00	233.00	2,275.60	-179.49	-238.19	-184.35	0.00	0.00	0.00	
2,400.00	10.00	233.00	2,374.09	-189.94	-252.06	-195.09	0.00	0.00	0.00	
2,500.00	10.00	233.00	2,472.57	-200.39	-265.92	-205.82	0.00	0.00	0.00	
2,600.00	10.00	233.00	2,571.05	-210.84	-279.79	-216.56	0.00	0.00	0.00	
2,700.00	10.00	233.00	2,669.53	-221.29	-293.66	-227.29	0.00	0.00	0.00	
2,800.00	10.00	233.00	2,768.01	-231.74	-307.53	-238.02	0.00	0.00	0.00	
2,900.00	10.00	233.00	2,866.49	-242.19	-321.40	-248.76	0.00	0.00	0.00	
3,000.00	10.00	233.00	2,964.97	-252.64	-335.26	-259.49	0.00	0.00	0.00	
3,029.67	10.00	233.00	2,994.19	-255.74	-339.38	-262.68	0.00	0.00	0.00	
Begin Drop @ 3029.67ft										
3,100.00	8.59	233.00	3,063.59	-262.58	-348.45	-269.70	2.00	-2.00	0.00	
3,200.00	6.59	233.00	3,162.71	-270.53	-359.01	-277.87	2.00	-2.00	0.00	
3,300.00	4.59	233.00	3,262.23	-276.40	-366.79	-283.89	2.00	-2.00	0.00	
3,400.00	2.59	233.00	3,362.03	-280.17	-371.79	-287.76	2.00	-2.00	0.00	
3,500.00	0.59	233.00	3,461.99	-281.84	-374.02	-289.48	2.00	-2.00	0.00	
3,529.67	0.00	0.00	3,491.65	-281.93	-374.14	-289.58	2.00	-2.00	0.00	
End Drop @ 3529.67ft										
3,600.00	0.00	0.00	3,561.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
3,700.00	0.00	0.00	3,661.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
3,800.00	0.00	0.00	3,761.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	

**Corporate
Planning Report**

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Company:	US ROCKIES WATTENBERG PLANNING	TVD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Project:	WELD-NAD83-UTMFT13N	MD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Site:	2N-65W-13 Guest 11-13HZ Pad	North Reference:	True
Well:	GUEST 29N-12HZ	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Permit Rev-3		

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)	
3,900.00	0.00	0.00	3,861.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
3,984.02	0.00	0.00	3,946.00	-281.93	-374.14	-289.58	0.00	0.00	0.00	
Parkman										
4,000.00	0.00	0.00	3,961.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,100.00	0.00	0.00	4,061.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,200.00	0.00	0.00	4,161.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,300.00	0.00	0.00	4,261.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,340.02	0.00	0.00	4,302.00	-281.93	-374.14	-289.58	0.00	0.00	0.00	
Sussex										
4,400.00	0.00	0.00	4,361.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,500.00	0.00	0.00	4,461.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,600.00	0.00	0.00	4,561.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,700.00	0.00	0.00	4,661.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,800.00	0.00	0.00	4,761.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
4,900.00	0.00	0.00	4,861.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,000.00	0.00	0.00	4,961.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,100.00	0.00	0.00	5,061.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,200.00	0.00	0.00	5,161.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,300.00	0.00	0.00	5,261.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,400.00	0.00	0.00	5,361.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,500.00	0.00	0.00	5,461.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,600.00	0.00	0.00	5,561.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,700.00	0.00	0.00	5,661.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,800.00	0.00	0.00	5,761.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
5,900.00	0.00	0.00	5,861.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
6,000.00	0.00	0.00	5,961.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
6,100.00	0.00	0.00	6,061.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
6,200.00	0.00	0.00	6,161.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
6,300.00	0.00	0.00	6,261.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
6,400.00	0.00	0.00	6,361.98	-281.93	-374.14	-289.58	0.00	0.00	0.00	
6,475.07	0.00	0.00	6,437.05	-281.93	-374.14	-289.58	0.00	0.00	0.00	
KOP @ 6475.07ft										
6,500.00	2.49	1.18	6,461.98	-281.39	-374.13	-289.04	10.00	10.00	0.00	
6,600.00	12.49	1.18	6,561.00	-268.37	-373.86	-276.01	10.00	10.00	0.00	
6,700.00	22.49	1.18	6,656.25	-238.35	-373.24	-245.99	10.00	10.00	0.00	
6,800.00	32.49	1.18	6,744.85	-192.26	-372.29	-199.88	10.00	10.00	0.00	
6,882.49	40.74	1.18	6,811.00	-143.11	-371.27	-150.72	10.00	10.00	0.00	
Sharon Springs										
6,900.00	42.49	1.18	6,824.09	-131.48	-371.04	-139.09	10.00	10.00	0.00	
DLS = 10°/100'										
6,952.32	47.73	1.18	6,861.00	-94.43	-370.27	-102.04	10.00	10.00	0.00	
Niobrara										
7,000.00	52.49	1.18	6,891.57	-57.87	-369.52	-65.47	10.00	10.00	0.00	
7,062.80	58.77	1.18	6,927.00	-6.07	-368.45	-13.66	10.00	10.00	0.00	
Nio B										
7,100.00	62.49	1.18	6,945.24	26.34	-367.78	18.76	10.00	10.00	0.00	
7,200.00	72.49	1.18	6,983.47	118.58	-365.88	111.02	10.00	10.00	0.00	
7,248.11	77.30	1.18	6,996.00	165.00	-364.92	157.46	10.00	10.00	0.00	
Nio C										
7,300.00	82.49	1.18	7,005.10	216.07	-363.87	208.53	10.00	10.00	0.00	
7,377.91	90.28	1.18	7,010.00	293.75	-362.27	286.22	10.00	10.00	0.00	

Corporate Planning Report

Database:	PLANNING	Local Co-ordinate Reference:	Well GUEST 29N-12HZ
Company:	US ROCKIES WATTENBERG PLANNING	TVD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Project:	WELD-NAD83-UTMFT13N	MD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
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Well:	GUEST 29N-12HZ	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Permit Rev-3		

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)
End Build @ 7377.91ft - Top of Production									
7,400.00	90.28	1.18	7,009.89	315.83	-361.81	308.31	0.00	0.00	0.00
7,500.00	90.28	1.18	7,009.40	415.81	-359.75	408.31	0.00	0.00	0.00
7,600.00	90.28	1.18	7,008.90	515.79	-357.69	508.31	0.00	0.00	0.00
7,700.00	90.28	1.18	7,008.40	615.76	-355.62	608.31	0.00	0.00	0.00
7,800.00	90.28	1.18	7,007.91	715.74	-353.56	708.31	0.00	0.00	0.00
7,900.00	90.28	1.18	7,007.41	815.72	-351.50	808.31	0.00	0.00	0.00
8,000.00	90.28	1.18	7,006.92	915.70	-349.44	908.31	0.00	0.00	0.00
8,100.00	90.28	1.18	7,006.42	1,015.67	-347.38	1,008.30	0.00	0.00	0.00
8,200.00	90.28	1.18	7,005.92	1,115.65	-345.32	1,108.30	0.00	0.00	0.00
8,300.00	90.28	1.18	7,005.43	1,215.63	-343.25	1,208.30	0.00	0.00	0.00
8,400.00	90.28	1.18	7,004.93	1,315.61	-341.19	1,308.30	0.00	0.00	0.00
8,500.00	90.28	1.18	7,004.43	1,415.58	-339.13	1,408.30	0.00	0.00	0.00
8,600.00	90.28	1.18	7,003.94	1,515.56	-337.07	1,508.30	0.00	0.00	0.00
8,700.00	90.28	1.18	7,003.44	1,615.54	-335.01	1,608.30	0.00	0.00	0.00
8,800.00	90.28	1.18	7,002.95	1,715.52	-332.94	1,708.30	0.00	0.00	0.00
8,900.00	90.28	1.18	7,002.45	1,815.49	-330.88	1,808.29	0.00	0.00	0.00
9,000.00	90.28	1.18	7,001.95	1,915.47	-328.82	1,908.29	0.00	0.00	0.00
9,100.00	90.28	1.18	7,001.46	2,015.45	-326.76	2,008.29	0.00	0.00	0.00
9,200.00	90.28	1.18	7,000.96	2,115.43	-324.70	2,108.29	0.00	0.00	0.00
9,300.00	90.28	1.18	7,000.46	2,215.40	-322.64	2,208.29	0.00	0.00	0.00
9,400.00	90.28	1.18	6,999.97	2,315.38	-320.57	2,308.29	0.00	0.00	0.00
9,500.00	90.28	1.18	6,999.47	2,415.36	-318.51	2,408.29	0.00	0.00	0.00
9,600.00	90.28	1.18	6,998.98	2,515.34	-316.45	2,508.29	0.00	0.00	0.00
9,700.00	90.28	1.18	6,998.48	2,615.31	-314.39	2,608.28	0.00	0.00	0.00
9,800.00	90.28	1.18	6,997.98	2,715.29	-312.33	2,708.28	0.00	0.00	0.00
9,900.00	90.28	1.18	6,997.49	2,815.27	-310.26	2,808.28	0.00	0.00	0.00
10,000.00	90.28	1.18	6,996.99	2,915.25	-308.20	2,908.28	0.00	0.00	0.00
10,100.00	90.28	1.18	6,996.50	3,015.22	-306.14	3,008.28	0.00	0.00	0.00
10,200.00	90.28	1.18	6,996.00	3,115.20	-304.08	3,108.28	0.00	0.00	0.00
10,300.00	90.28	1.18	6,995.50	3,215.18	-302.02	3,208.28	0.00	0.00	0.00
10,400.00	90.28	1.18	6,995.01	3,315.16	-299.96	3,308.28	0.00	0.00	0.00
10,500.00	90.28	1.18	6,994.51	3,415.13	-297.89	3,408.27	0.00	0.00	0.00
10,600.00	90.28	1.18	6,994.01	3,515.11	-295.83	3,508.27	0.00	0.00	0.00
10,700.00	90.28	1.18	6,993.52	3,615.09	-293.77	3,608.27	0.00	0.00	0.00
10,800.00	90.28	1.18	6,993.02	3,715.07	-291.71	3,708.27	0.00	0.00	0.00
10,900.00	90.28	1.18	6,992.53	3,815.04	-289.65	3,808.27	0.00	0.00	0.00
11,000.00	90.28	1.18	6,992.03	3,915.02	-287.58	3,908.27	0.00	0.00	0.00
11,100.00	90.28	1.18	6,991.53	4,015.00	-285.52	4,008.27	0.00	0.00	0.00
11,200.00	90.28	1.18	6,991.04	4,114.98	-283.46	4,108.27	0.00	0.00	0.00
11,300.00	90.28	1.18	6,990.54	4,214.95	-281.40	4,208.26	0.00	0.00	0.00
11,400.00	90.28	1.18	6,990.04	4,314.93	-279.34	4,308.26	0.00	0.00	0.00
11,500.00	90.28	1.18	6,989.55	4,414.91	-277.27	4,408.26	0.00	0.00	0.00
11,600.00	90.28	1.18	6,989.05	4,514.89	-275.21	4,508.26	0.00	0.00	0.00
11,700.00	90.28	1.18	6,988.56	4,614.86	-273.15	4,608.26	0.00	0.00	0.00
11,800.00	90.28	1.18	6,988.06	4,714.84	-271.09	4,708.26	0.00	0.00	0.00
11,900.00	90.28	1.18	6,987.56	4,814.82	-269.03	4,808.26	0.00	0.00	0.00
12,000.00	90.28	1.18	6,987.07	4,914.80	-266.97	4,908.26	0.00	0.00	0.00
12,100.00	90.28	1.18	6,986.57	5,014.77	-264.90	5,008.26	0.00	0.00	0.00
12,200.00	90.28	1.18	6,986.07	5,114.75	-262.84	5,108.25	0.00	0.00	0.00
12,300.00	90.28	1.18	6,985.58	5,214.73	-260.78	5,208.25	0.00	0.00	0.00
12,400.00	90.28	1.18	6,985.08	5,314.71	-258.72	5,308.25	0.00	0.00	0.00

Corporate Planning Report

Database:	PLANNING	Local Co-ordinate Reference:	Well GUEST 29N-12HZ
Company:	US ROCKIES WATTENBERG PLANNING	TVD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Project:	WELD-NAD83-UTMFT13N	MD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Site:	2N-65W-13 Guest 11-13HZ Pad	North Reference:	True
Well:	GUEST 29N-12HZ	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Permit Rev-3		

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)	
12,500.00	90.28	1.18	6,984.59	5,414.68	-256.66	5,408.25	0.00	0.00	0.00	
12,600.00	90.28	1.18	6,984.09	5,514.66	-254.59	5,508.25	0.00	0.00	0.00	
12,700.00	90.28	1.18	6,983.59	5,614.64	-252.53	5,608.25	0.00	0.00	0.00	
12,800.00	90.28	1.18	6,983.10	5,714.62	-250.47	5,708.25	0.00	0.00	0.00	
12,900.00	90.28	1.18	6,982.60	5,814.59	-248.41	5,808.25	0.00	0.00	0.00	
13,000.00	90.28	1.18	6,982.11	5,914.57	-246.35	5,908.24	0.00	0.00	0.00	
13,100.00	90.28	1.18	6,981.61	6,014.55	-244.29	6,008.24	0.00	0.00	0.00	
13,200.00	90.28	1.18	6,981.11	6,114.53	-242.22	6,108.24	0.00	0.00	0.00	
13,300.00	90.28	1.18	6,980.62	6,214.50	-240.16	6,208.24	0.00	0.00	0.00	
13,400.00	90.28	1.18	6,980.12	6,314.48	-238.10	6,308.24	0.00	0.00	0.00	
13,500.00	90.28	1.18	6,979.62	6,414.46	-236.04	6,408.24	0.00	0.00	0.00	
13,600.00	90.28	1.18	6,979.13	6,514.44	-233.98	6,508.24	0.00	0.00	0.00	
13,700.00	90.28	1.18	6,978.63	6,614.41	-231.91	6,608.24	0.00	0.00	0.00	
13,800.00	90.28	1.18	6,978.14	6,714.39	-229.85	6,708.23	0.00	0.00	0.00	
13,900.00	90.28	1.18	6,977.64	6,814.37	-227.79	6,808.23	0.00	0.00	0.00	
14,000.00	90.28	1.18	6,977.14	6,914.35	-225.73	6,908.23	0.00	0.00	0.00	
14,100.00	90.28	1.18	6,976.65	7,014.32	-223.67	7,008.23	0.00	0.00	0.00	
14,200.00	90.28	1.18	6,976.15	7,114.30	-221.61	7,108.23	0.00	0.00	0.00	
14,300.00	90.28	1.18	6,975.65	7,214.28	-219.54	7,208.23	0.00	0.00	0.00	
14,400.00	90.28	1.18	6,975.16	7,314.26	-217.48	7,308.23	0.00	0.00	0.00	
14,500.00	90.28	1.18	6,974.66	7,414.23	-215.42	7,408.23	0.00	0.00	0.00	
14,600.00	90.28	1.18	6,974.17	7,514.21	-213.36	7,508.22	0.00	0.00	0.00	
14,700.00	90.28	1.18	6,973.67	7,614.19	-211.30	7,608.22	0.00	0.00	0.00	
14,800.00	90.28	1.18	6,973.17	7,714.17	-209.23	7,708.22	0.00	0.00	0.00	
14,900.00	90.28	1.18	6,972.68	7,814.14	-207.17	7,808.22	0.00	0.00	0.00	
15,000.00	90.28	1.18	6,972.18	7,914.12	-205.11	7,908.22	0.00	0.00	0.00	
15,100.00	90.28	1.18	6,971.68	8,014.10	-203.05	8,008.22	0.00	0.00	0.00	
15,200.00	90.28	1.18	6,971.19	8,114.08	-200.99	8,108.22	0.00	0.00	0.00	
15,300.00	90.28	1.18	6,970.69	8,214.05	-198.93	8,208.22	0.00	0.00	0.00	
15,400.00	90.28	1.18	6,970.20	8,314.03	-196.86	8,308.21	0.00	0.00	0.00	
15,500.00	90.28	1.18	6,969.70	8,414.01	-194.80	8,408.21	0.00	0.00	0.00	
15,600.00	90.28	1.18	6,969.20	8,513.99	-192.74	8,508.21	0.00	0.00	0.00	
15,641.02	90.28	1.18	6,969.00	8,555.00	-191.89	8,549.23	0.00	0.00	0.00	
TD Well @ 15641.02ft										

Casing Points					
Measured Depth (usft)	Vertical Depth (usft)	Name	Casing Diameter (")	Hole Diameter (")	
1,512.43	1,500.00	9 5/8"	9-5/8	13-1/2	
7,377.91	7,010.00	Top of Production	5-1/2	7-7/8	

Corporate Planning Report

Database:	PLANNING	Local Co-ordinate Reference:	Well GUEST 29N-12HZ
Company:	US ROCKIES WATTENBERG PLANNING	TVD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Project:	WELD-NAD83-UTMFT13N	MD Reference:	GL 4872 & KB 17 @ 4889.00usft (ASSUMED)
Site:	2N-65W-13 Guest 11-13HZ Pad	North Reference:	True
Well:	GUEST 29N-12HZ	Survey Calculation Method:	Minimum Curvature
Wellbore:	Plan A		
Design:	Permit Rev-3		

Formations						
	Measured Depth (usft)	Vertical Depth (usft)	Name	Lithology	Dip (°)	Dip Direction (°)
	1,342.85	1,333.00	Fox Hills Mkr			
	3,984.02	3,946.00	Parkman			
	4,340.02	4,302.00	Sussex			
	6,882.49	6,811.00	Sharon Springs			
	6,952.32	6,861.00	Niobrara			
	7,062.80	6,927.00	Nio B			
	7,248.11	6,996.00	Nio C			