

EXTRACTION OIL & GAS

SEC 19 T7N R65W

WAAG SOUTH

WAAG 22 - Slot WAAG 22

Wellbore #1

Plan: Plan #1 03Aug14 mab

Standard Planning Report - Geographic

11 August, 2014

New Tech

Planning Report - Geographic

Database:	EDM 2003.16 Single User Db	Local Co-ordinate Reference:	Well WAAG 22 - Slot WAAG 22
Company:	EXTRACTION OIL & GAS	TVD Reference:	WELL @ 4884.0ft (Xtreme 7)
Project:	SEC 19 T7N R65W	MD Reference:	WELL @ 4884.0ft (Xtreme 7)
Site:	WAAG SOUTH	North Reference:	True
Well:	WAAG 22	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Plan #1 03Aug14 mab		

Project	SEC 19 T7N R65W, Weld County, CO		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Colorado Northern Zone		

Site		WAAG SOUTH			
Site Position:		Northing:	1,445,760.46 ft	Latitude:	40° 33' 15.516 N
From:	Lat/Long	Easting:	3,220,253.02 ft	Longitude:	104° 42' 26.496 W
Position Uncertainty:	0.0 ft	Slot Radius:	"	Grid Convergence:	0.51 °

Well	WAAG 22 - Slot WAAG 22					
Well Position	+N/-S	0.0 ft	Northing:	1,445,760.46 ft	Latitude:	40° 33' 15.516 N
	+E/-W	0.0 ft	Easting:	3,220,253.02 ft	Longitude:	104° 42' 26.496 W
Position Uncertainty		0.0 ft	Wellhead Elevation:	ft	Ground Level:	4,868.0 ft

Wellbore	Wellbore #1				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2010	8/3/2014	8.42	67.08	52,887

Design	Plan #1 03Aug14 mab			
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	275.09

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	
900.0	0.00	0.00	900.0	0.0	0.0	0.00	0.00	0.00	0.00	
1,182.9	5.66	49.84	1,182.4	9.0	10.7	2.00	2.00	0.00	49.84	
6,475.8	5.66	49.84	6,449.6	345.5	409.4	0.00	0.00	0.00	0.00	
6,758.7	0.00	0.00	6,732.0	354.5	420.1	2.00	-2.00	0.00	180.00	
6,788.7	0.00	0.00	6,762.0	354.5	420.1	0.00	0.00	0.00	0.00	
7,688.7	90.00	270.62	7,335.0	360.7	-152.8	10.00	10.00	0.00	270.62	
12,123.8	90.00	270.61	7,335.0	408.5	-4,587.7	0.00	0.00	0.00	0.00	TD / PBHL WAAG SC

New Tech

Planning Report - Geographic

Database:	EDM 2003.16 Single User Db	Local Co-ordinate Reference:	Well WAAG 22 - Slot WAAG 22
Company:	EXTRACTION OIL & GAS	TVD Reference:	WELL @ 4884.0ft (Xtreme 7)
Project:	SEC 19 T7N R65W	MD Reference:	WELL @ 4884.0ft (Xtreme 7)
Site:	WAAG SOUTH	North Reference:	True
Well:	WAAG 22	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Plan #1 03Aug14 mab		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Map Northing (ft)	Map Easting (ft)	Latitude	Longitude
0.0	0.00	0.00	0.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
100.0	0.00	0.00	100.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
200.0	0.00	0.00	200.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
300.0	0.00	0.00	300.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
400.0	0.00	0.00	400.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
500.0	0.00	0.00	500.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
600.0	0.00	0.00	600.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
700.0	0.00	0.00	700.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
800.0	0.00	0.00	800.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
850.0	0.00	0.00	850.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
9 5/8"									
900.0	0.00	0.00	900.0	0.0	0.0	1,445,760.46	3,220,253.02	40° 33' 15.516 N	104° 42' 26.496 W
Start Build 2.00									
1,000.0	2.00	49.84	1,000.0	1.1	1.3	1,445,761.60	3,220,254.34	40° 33' 15.527 N	104° 42' 26.479 W
1,100.0	4.00	49.84	1,099.8	4.5	5.3	1,445,765.01	3,220,258.31	40° 33' 15.560 N	104° 42' 26.427 W
1,182.9	5.66	49.84	1,182.4	9.0	10.7	1,445,769.55	3,220,263.60	40° 33' 15.605 N	104° 42' 26.358 W
Hold 5.66° Inc, 49.84° Az									
1,200.0	5.66	49.84	1,199.5	10.1	12.0	1,445,770.65	3,220,264.88	40° 33' 15.616 N	104° 42' 26.341 W
1,300.0	5.66	49.84	1,299.0	16.4	19.5	1,445,777.08	3,220,272.36	40° 33' 15.678 N	104° 42' 26.244 W
1,400.0	5.66	49.84	1,398.5	22.8	27.0	1,445,783.50	3,220,279.84	40° 33' 15.741 N	104° 42' 26.146 W
1,500.0	5.66	49.84	1,498.0	29.2	34.6	1,445,789.93	3,220,287.31	40° 33' 15.804 N	104° 42' 26.048 W
1,600.0	5.66	49.84	1,597.5	35.5	42.1	1,445,796.35	3,220,294.79	40° 33' 15.867 N	104° 42' 25.951 W
1,700.0	5.66	49.84	1,697.0	41.9	49.6	1,445,802.78	3,220,302.27	40° 33' 15.930 N	104° 42' 25.853 W
1,800.0	5.66	49.84	1,796.5	48.2	57.2	1,445,809.20	3,220,309.75	40° 33' 15.993 N	104° 42' 25.755 W
1,900.0	5.66	49.84	1,896.0	54.6	64.7	1,445,815.63	3,220,317.22	40° 33' 16.055 N	104° 42' 25.658 W
2,000.0	5.66	49.84	1,995.6	60.9	72.2	1,445,822.05	3,220,324.70	40° 33' 16.118 N	104° 42' 25.560 W
2,100.0	5.66	49.84	2,095.1	67.3	79.8	1,445,828.47	3,220,332.18	40° 33' 16.181 N	104° 42' 25.463 W
2,200.0	5.66	49.84	2,194.6	73.7	87.3	1,445,834.90	3,220,339.65	40° 33' 16.244 N	104° 42' 25.365 W
2,300.0	5.66	49.84	2,294.1	80.0	94.8	1,445,841.32	3,220,347.13	40° 33' 16.307 N	104° 42' 25.267 W
2,400.0	5.66	49.84	2,393.6	86.4	102.4	1,445,847.75	3,220,354.61	40° 33' 16.370 N	104° 42' 25.170 W
2,500.0	5.66	49.84	2,493.1	92.7	109.9	1,445,854.17	3,220,362.08	40° 33' 16.432 N	104° 42' 25.072 W
2,600.0	5.66	49.84	2,592.6	99.1	117.4	1,445,860.60	3,220,369.56	40° 33' 16.495 N	104° 42' 24.975 W
2,700.0	5.66	49.84	2,692.2	105.5	125.0	1,445,867.02	3,220,377.04	40° 33' 16.558 N	104° 42' 24.877 W
2,800.0	5.66	49.84	2,791.7	111.8	132.5	1,445,873.45	3,220,384.51	40° 33' 16.621 N	104° 42' 24.779 W
2,900.0	5.66	49.84	2,891.2	118.2	140.0	1,445,879.87	3,220,391.99	40° 33' 16.684 N	104° 42' 24.682 W
3,000.0	5.66	49.84	2,990.7	124.5	147.6	1,445,886.30	3,220,399.47	40° 33' 16.746 N	104° 42' 24.584 W
3,100.0	5.66	49.84	3,090.2	130.9	155.1	1,445,892.72	3,220,406.94	40° 33' 16.809 N	104° 42' 24.487 W
3,200.0	5.66	49.84	3,189.7	137.2	162.6	1,445,899.15	3,220,414.42	40° 33' 16.872 N	104° 42' 24.389 W
3,300.0	5.66	49.84	3,289.2	143.6	170.2	1,445,905.57	3,220,421.90	40° 33' 16.935 N	104° 42' 24.291 W
3,400.0	5.66	49.84	3,388.7	150.0	177.7	1,445,911.99	3,220,429.37	40° 33' 16.998 N	104° 42' 24.194 W
3,500.0	5.66	49.84	3,488.3	156.3	185.2	1,445,918.42	3,220,436.85	40° 33' 17.061 N	104° 42' 24.096 W
3,600.0	5.66	49.84	3,587.8	162.7	192.8	1,445,924.84	3,220,444.33	40° 33' 17.123 N	104° 42' 23.999 W
3,622.3	5.66	49.84	3,610.0	164.1	194.5	1,445,926.28	3,220,446.00	40° 33' 17.137 N	104° 42' 23.977 W
PARKMAN									
3,700.0	5.66	49.84	3,687.3	169.0	200.3	1,445,931.27	3,220,451.81	40° 33' 17.186 N	104° 42' 23.901 W
3,800.0	5.66	49.84	3,786.8	175.4	207.8	1,445,937.69	3,220,459.28	40° 33' 17.249 N	104° 42' 23.803 W
3,900.0	5.66	49.84	3,886.3	181.7	215.4	1,445,944.12	3,220,466.76	40° 33' 17.312 N	104° 42' 23.706 W
4,000.0	5.66	49.84	3,985.8	188.1	222.9	1,445,950.54	3,220,474.24	40° 33' 17.375 N	104° 42' 23.608 W
4,100.0	5.66	49.84	4,085.3	194.5	230.4	1,445,956.97	3,220,481.71	40° 33' 17.438 N	104° 42' 23.511 W
4,200.0	5.66	49.84	4,184.8	200.8	238.0	1,445,963.39	3,220,489.19	40° 33' 17.500 N	104° 42' 23.413 W
4,300.0	5.66	49.84	4,284.4	207.2	245.5	1,445,969.82	3,220,496.67	40° 33' 17.563 N	104° 42' 23.315 W
4,352.9	5.66	49.84	4,337.0	210.5	249.5	1,445,973.21	3,220,500.62	40° 33' 17.596 N	104° 42' 23.264 W
SUSSEX									

New Tech
Planning Report - Geographic

Database:	EDM 2003.16 Single User Db	Local Co-ordinate Reference:	Well WAAG 22 - Slot WAAG 22
Company:	EXTRACTION OIL & GAS	TVD Reference:	WELL @ 4884.0ft (Xtreme 7)
Project:	SEC 19 T7N R65W	MD Reference:	WELL @ 4884.0ft (Xtreme 7)
Site:	WAAG SOUTH	North Reference:	True
Well:	WAAG 22	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Plan #1 03Aug14 mab		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Map Northing (ft)	Map Easting (ft)	Latitude	Longitude
4,400.0	5.66	49.84	4,383.9	213.5	253.0	1,445,976.24	3,220,504.14	40° 33' 17.626 N	104° 42' 23.218 W
4,500.0	5.66	49.84	4,483.4	219.9	260.6	1,445,982.67	3,220,511.62	40° 33' 17.689 N	104° 42' 23.120 W
4,600.0	5.66	49.84	4,582.9	226.2	268.1	1,445,989.09	3,220,519.10	40° 33' 17.752 N	104° 42' 23.022 W
4,700.0	5.66	49.84	4,682.4	232.6	275.6	1,445,995.51	3,220,526.57	40° 33' 17.814 N	104° 42' 22.925 W
4,747.8	5.66	49.84	4,730.0	235.6	279.2	1,445,998.59	3,220,530.15	40° 33' 17.844 N	104° 42' 22.878 W
SHANNON									
4,800.0	5.66	49.84	4,781.9	239.0	283.2	1,446,001.94	3,220,534.05	40° 33' 17.877 N	104° 42' 22.827 W
4,900.0	5.66	49.84	4,881.4	245.3	290.7	1,446,008.36	3,220,541.53	40° 33' 17.940 N	104° 42' 22.730 W
5,000.0	5.66	49.84	4,980.9	251.7	298.2	1,446,014.79	3,220,549.00	40° 33' 18.003 N	104° 42' 22.632 W
5,100.0	5.66	49.84	5,080.5	258.0	305.8	1,446,021.21	3,220,556.48	40° 33' 18.066 N	104° 42' 22.534 W
5,200.0	5.66	49.84	5,180.0	264.4	313.3	1,446,027.64	3,220,563.96	40° 33' 18.129 N	104° 42' 22.437 W
5,300.0	5.66	49.84	5,279.5	270.7	320.8	1,446,034.06	3,220,571.44	40° 33' 18.191 N	104° 42' 22.339 W
5,400.0	5.66	49.84	5,379.0	277.1	328.4	1,446,040.49	3,220,578.91	40° 33' 18.254 N	104° 42' 22.242 W
5,500.0	5.66	49.84	5,478.5	283.5	335.9	1,446,046.91	3,220,586.39	40° 33' 18.317 N	104° 42' 22.144 W
5,600.0	5.66	49.84	5,578.0	289.8	343.5	1,446,053.34	3,220,593.87	40° 33' 18.380 N	104° 42' 22.046 W
5,700.0	5.66	49.84	5,677.5	296.2	351.0	1,446,059.76	3,220,601.34	40° 33' 18.443 N	104° 42' 21.949 W
5,800.0	5.66	49.84	5,777.1	302.5	358.5	1,446,066.19	3,220,608.82	40° 33' 18.505 N	104° 42' 21.851 W
5,900.0	5.66	49.84	5,876.6	308.9	366.1	1,446,072.61	3,220,616.30	40° 33' 18.568 N	104° 42' 21.754 W
6,000.0	5.66	49.84	5,976.1	315.2	373.6	1,446,079.03	3,220,623.77	40° 33' 18.631 N	104° 42' 21.656 W
6,100.0	5.66	49.84	6,075.6	321.6	381.1	1,446,085.46	3,220,631.25	40° 33' 18.694 N	104° 42' 21.558 W
6,200.0	5.66	49.84	6,175.1	328.0	388.7	1,446,091.88	3,220,638.73	40° 33' 18.757 N	104° 42' 21.461 W
6,300.0	5.66	49.84	6,274.6	334.3	396.2	1,446,098.31	3,220,646.20	40° 33' 18.820 N	104° 42' 21.363 W
6,400.0	5.66	49.84	6,374.1	340.7	403.7	1,446,104.73	3,220,653.68	40° 33' 18.882 N	104° 42' 21.266 W
6,475.8	5.66	49.84	6,449.6	345.5	409.4	1,446,109.61	3,220,659.35	40° 33' 18.930 N	104° 42' 21.192 W
Start Drop -2.00									
6,500.0	5.17	49.84	6,473.7	347.0	411.2	1,446,111.09	3,220,661.08	40° 33' 18.945 N	104° 42' 21.169 W
6,600.0	3.17	49.84	6,573.4	351.7	416.7	1,446,115.84	3,220,666.60	40° 33' 18.991 N	104° 42' 21.097 W
6,700.0	1.17	49.84	6,673.3	354.1	419.6	1,446,118.31	3,220,669.48	40° 33' 19.015 N	104° 42' 21.059 W
6,758.7	0.00	0.00	6,732.0	354.5	420.1	1,446,118.70	3,220,669.93	40° 33' 19.019 N	104° 42' 21.053 W
Vertical									
6,788.7	0.00	0.00	6,762.0	354.5	420.1	1,446,118.70	3,220,669.93	40° 33' 19.019 N	104° 42' 21.053 W
KOP 10°/100									
6,800.0	1.13	270.62	6,773.3	354.5	420.0	1,446,118.70	3,220,669.82	40° 33' 19.019 N	104° 42' 21.055 W
6,900.0	11.13	270.62	6,872.6	354.6	409.3	1,446,118.72	3,220,659.16	40° 33' 19.020 N	104° 42' 21.193 W
7,000.0	21.13	270.62	6,968.5	354.9	381.6	1,446,118.77	3,220,631.41	40° 33' 19.023 N	104° 42' 21.552 W
7,043.0	25.43	270.62	7,008.0	355.1	364.6	1,446,118.80	3,220,614.44	40° 33' 19.025 N	104° 42' 21.772 W
NIOBRARA									
7,100.0	31.13	270.62	7,058.2	355.4	337.6	1,446,118.85	3,220,587.43	40° 33' 19.028 N	104° 42' 22.122 W
7,200.0	41.13	270.62	7,138.9	356.0	278.7	1,446,118.97	3,220,528.54	40° 33' 19.034 N	104° 42' 22.885 W
7,212.2	42.35	270.62	7,148.0	356.1	270.6	1,446,118.98	3,220,520.40	40° 33' 19.035 N	104° 42' 22.991 W
NIO B TARGET									
7,300.0	51.13	270.62	7,208.1	356.8	206.7	1,446,119.10	3,220,456.54	40° 33' 19.042 N	104° 42' 23.818 W
7,400.0	61.13	270.62	7,263.7	357.7	123.8	1,446,119.26	3,220,373.61	40° 33' 19.051 N	104° 42' 24.892 W
7,465.4	67.67	270.62	7,292.0	358.3	64.8	1,446,119.37	3,220,314.65	40° 33' 19.057 N	104° 42' 25.656 W
FORT HAYS									
7,500.0	71.13	270.62	7,304.2	358.7	32.5	1,446,119.43	3,220,282.28	40° 33' 19.060 N	104° 42' 26.075 W
7,581.7	79.30	270.62	7,325.0	359.5	-46.5	1,446,119.58	3,220,203.33	40° 33' 19.069 N	104° 42' 27.098 W
CODELL									
7,600.0	81.13	270.62	7,328.1	359.7	-64.5	1,446,119.61	3,220,185.32	40° 33' 19.071 N	104° 42' 27.331 W
7,688.7	90.00	270.62	7,335.0	360.7	-152.8	1,446,119.78	3,220,096.98	40° 33' 19.080 N	104° 42' 28.476 W
Landing Pt 90° Inc, 270.62° Az - 7"									
7,700.0	90.00	270.62	7,335.0	360.8	-164.1	1,446,119.80	3,220,085.68	40° 33' 19.081 N	104° 42' 28.622 W
7,800.0	90.00	270.62	7,335.0	361.9	-264.1	1,446,119.99	3,219,985.68	40° 33' 19.092 N	104° 42' 29.918 W

New Tech

Planning Report - Geographic

Database:	EDM 2003.16 Single User Db	Local Co-ordinate Reference:	Well WAAG 22 - Slot WAAG 22
Company:	EXTRACTION OIL & GAS	TVD Reference:	WELL @ 4884.0ft (Xtreme 7)
Project:	SEC 19 T7N R65W	MD Reference:	WELL @ 4884.0ft (Xtreme 7)
Site:	WAAG SOUTH	North Reference:	True
Well:	WAAG 22	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Plan #1 03Aug14 mab		

Planned Survey									
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Map Northing (ft)	Map Easting (ft)	Latitude	Longitude
7,900.0	90.00	270.62	7,335.0	363.0	-364.1	1,446,120.18	3,219,885.68	40° 33' 19.103 N	104° 42' 31.213 W
8,000.0	90.00	270.62	7,335.0	364.1	-464.1	1,446,120.36	3,219,785.68	40° 33' 19.114 N	104° 42' 32.509 W
8,100.0	90.00	270.62	7,335.0	365.2	-564.1	1,446,120.55	3,219,685.68	40° 33' 19.124 N	104° 42' 33.804 W
8,200.0	90.00	270.62	7,335.0	366.2	-664.1	1,446,120.74	3,219,585.68	40° 33' 19.135 N	104° 42' 35.100 W
8,300.0	90.00	270.62	7,335.0	367.3	-764.1	1,446,120.93	3,219,485.68	40° 33' 19.146 N	104° 42' 36.395 W
8,400.0	90.00	270.62	7,335.0	368.4	-864.1	1,446,121.12	3,219,385.68	40° 33' 19.156 N	104° 42' 37.691 W
8,500.0	90.00	270.62	7,334.9	369.5	-964.1	1,446,121.31	3,219,285.68	40° 33' 19.167 N	104° 42' 38.986 W
8,600.0	90.00	270.62	7,334.9	370.6	-1,064.1	1,446,121.49	3,219,185.68	40° 33' 19.177 N	104° 42' 40.282 W
8,700.0	90.00	270.62	7,334.9	371.6	-1,164.1	1,446,121.68	3,219,085.68	40° 33' 19.188 N	104° 42' 41.577 W
8,800.0	90.00	270.62	7,334.9	372.7	-1,264.1	1,446,121.87	3,218,985.68	40° 33' 19.199 N	104° 42' 42.873 W
8,900.0	90.00	270.62	7,334.9	373.8	-1,364.1	1,446,122.06	3,218,885.68	40° 33' 19.209 N	104° 42' 44.168 W
9,000.0	90.00	270.62	7,334.9	374.9	-1,464.0	1,446,122.25	3,218,785.68	40° 33' 19.220 N	104° 42' 45.464 W
9,100.0	90.00	270.62	7,334.9	376.0	-1,564.0	1,446,122.43	3,218,685.68	40° 33' 19.231 N	104° 42' 46.759 W
9,200.0	90.00	270.62	7,334.9	377.1	-1,664.0	1,446,122.62	3,218,585.68	40° 33' 19.241 N	104° 42' 48.055 W
9,300.0	90.00	270.62	7,334.9	378.1	-1,764.0	1,446,122.81	3,218,485.68	40° 33' 19.252 N	104° 42' 49.350 W
9,400.0	90.00	270.62	7,334.9	379.2	-1,864.0	1,446,123.00	3,218,385.68	40° 33' 19.263 N	104° 42' 50.646 W
9,500.0	90.00	270.62	7,334.9	380.3	-1,964.0	1,446,123.19	3,218,285.68	40° 33' 19.273 N	104° 42' 51.941 W
9,600.0	90.00	270.62	7,334.9	381.4	-2,064.0	1,446,123.38	3,218,185.68	40° 33' 19.284 N	104° 42' 53.237 W
9,700.0	90.00	270.62	7,334.9	382.5	-2,164.0	1,446,123.56	3,218,085.68	40° 33' 19.294 N	104° 42' 54.532 W
9,800.0	90.00	270.62	7,334.9	383.5	-2,264.0	1,446,123.75	3,217,985.68	40° 33' 19.305 N	104° 42' 55.827 W
9,900.0	90.00	270.62	7,334.9	384.6	-2,364.0	1,446,123.94	3,217,885.68	40° 33' 19.316 N	104° 42' 57.123 W
10,000.0	90.00	270.62	7,334.9	385.7	-2,464.0	1,446,124.13	3,217,785.68	40° 33' 19.326 N	104° 42' 58.418 W
10,100.0	90.00	270.62	7,334.9	386.8	-2,564.0	1,446,124.32	3,217,685.68	40° 33' 19.337 N	104° 42' 59.714 W
10,200.0	90.00	270.62	7,334.9	387.9	-2,664.0	1,446,124.50	3,217,585.68	40° 33' 19.347 N	104° 43' 1.009 W
10,300.0	90.00	270.62	7,334.9	389.0	-2,764.0	1,446,124.69	3,217,485.68	40° 33' 19.358 N	104° 43' 2.305 W
10,400.0	90.00	270.62	7,334.9	390.0	-2,864.0	1,446,124.88	3,217,385.68	40° 33' 19.369 N	104° 43' 3.600 W
10,500.0	90.00	270.62	7,334.9	391.1	-2,964.0	1,446,125.07	3,217,285.68	40° 33' 19.379 N	104° 43' 4.896 W
10,600.0	90.00	270.62	7,334.9	392.2	-3,064.0	1,446,125.26	3,217,185.68	40° 33' 19.390 N	104° 43' 6.191 W
10,700.0	90.00	270.62	7,334.8	393.3	-3,163.9	1,446,125.45	3,217,085.68	40° 33' 19.400 N	104° 43' 7.487 W
10,800.0	90.00	270.62	7,334.8	394.4	-3,263.9	1,446,125.63	3,216,985.68	40° 33' 19.411 N	104° 43' 8.782 W
10,900.0	90.00	270.62	7,334.8	395.4	-3,363.9	1,446,125.82	3,216,885.68	40° 33' 19.421 N	104° 43' 10.078 W
11,000.0	90.00	270.62	7,334.8	396.5	-3,463.9	1,446,126.01	3,216,785.68	40° 33' 19.432 N	104° 43' 11.373 W
11,100.0	90.00	270.62	7,334.8	397.6	-3,563.9	1,446,126.20	3,216,685.68	40° 33' 19.442 N	104° 43' 12.669 W
11,200.0	90.00	270.62	7,334.8	398.7	-3,663.9	1,446,126.39	3,216,585.68	40° 33' 19.453 N	104° 43' 13.964 W
11,300.0	90.01	270.62	7,334.8	399.8	-3,763.9	1,446,126.58	3,216,485.68	40° 33' 19.464 N	104° 43' 15.260 W
11,400.0	90.01	270.62	7,334.8	400.9	-3,863.9	1,446,126.76	3,216,385.68	40° 33' 19.474 N	104° 43' 16.555 W
11,500.0	90.01	270.62	7,334.8	401.9	-3,963.9	1,446,126.95	3,216,285.68	40° 33' 19.485 N	104° 43' 17.851 W
11,600.0	90.01	270.62	7,334.8	403.0	-4,063.9	1,446,127.14	3,216,185.68	40° 33' 19.495 N	104° 43' 19.146 W
11,700.0	90.01	270.62	7,334.8	404.1	-4,163.9	1,446,127.33	3,216,085.68	40° 33' 19.506 N	104° 43' 20.442 W
11,800.0	90.01	270.62	7,334.8	405.2	-4,263.9	1,446,127.52	3,215,985.68	40° 33' 19.516 N	104° 43' 21.737 W
11,900.0	90.01	270.62	7,334.7	406.3	-4,363.9	1,446,127.70	3,215,885.68	40° 33' 19.527 N	104° 43' 23.033 W
12,000.0	90.01	270.62	7,334.7	407.4	-4,463.9	1,446,127.89	3,215,785.68	40° 33' 19.537 N	104° 43' 24.328 W
12,100.0	90.01	270.62	7,334.7	408.4	-4,563.9	1,446,128.08	3,215,685.69	40° 33' 19.548 N	104° 43' 25.624 W
12,123.8	90.00	270.61	7,335.0	408.5	-4,587.7	1,446,127.89	3,215,661.89	40° 33' 19.548 N	104° 43' 25.932 W
TD at 12123.8 - TD / PBHL WAAG SOUTH 22									

New Tech

Planning Report - Geographic

Database:	EDM 2003.16 Single User Db	Local Co-ordinate Reference:	Well WAAG 22 - Slot WAAG 22
Company:	EXTRACTION OIL & GAS	TVD Reference:	WELL @ 4884.0ft (Xtreme 7)
Project:	SEC 19 T7N R65W	MD Reference:	WELL @ 4884.0ft (Xtreme 7)
Site:	WAAG SOUTH	North Reference:	True
Well:	WAAG 22	Survey Calculation Method:	Minimum Curvature
Wellbore:	Wellbore #1		
Design:	Plan #1 03Aug14 mab		

Targets									
Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (ft)	Easting (ft)	Latitude	Longitude
LP WAAG SOUTH 22 - plan hits target - Point	0.00	0.00	7,335.0	360.7	-152.8	1,446,119.75	3,220,096.97	40° 33' 19.080 N	104° 42' 28.476 W
TD / PBHL WAAG SOU - plan hits target - Point	0.00	0.00	7,335.0	408.5	-4,587.7	1,446,127.89	3,215,661.89	40° 33' 19.548 N	104° 43' 25.932 W

Casing Points				
Measured Depth (ft)	Vertical Depth (ft)	Name	Casing Diameter (")	Hole Diameter (")
850.0	850.0	9 5/8"	0	0
7,688.7	7,335.0	7"	0	0

Formations					
Measured Depth (ft)	Vertical Depth (ft)	Name	Lithology	Dip (°)	Dip Direction (°)
3622.30	3610.00	PARKMAN			
4352.90	4337.00	SUSSEX			
4747.80	4730.00	SHANNON			
7043.00	7008.00	NIOBRARA			
7212.20	7148.00	NIO B TARGET			
7465.40	7292.00	FORT HAYS			
7581.70	7325.00	CODELL			

Plan Annotations				
Measured Depth (ft)	Vertical Depth (ft)	Local Coordinates		Comment
		+N/-S (ft)	+E/-W (ft)	
900.0	900.0	0.0	0.0	Start Build 2.00
1,182.9	1,182.4	9.0	10.7	Hold 5.66° Inc, 49.84° Az
6,475.8	6,449.6	345.5	409.4	Start Drop -2.00
6,758.7	6,732.0	354.5	420.1	Vertical
6,788.7	6,762.0	354.5	420.1	KOP 10°/100
7,688.7	7,335.0	360.7	-152.8	Landing Pt 90° Inc, 270.62° Az
12,123.8	7,335.0	408.5	-4,587.7	TD at 12123.8