

# **EXTRACTION OIL & GAS**

**SEC 19 T7N R65W**

**WAAG MIDDLE**

**WAAG 7 - Slot WAAG 7**

**Wellbore #1**

**Plan: Plan #1 09Aug14 mab**

## **Standard Planning Report - Geographic**

**11 August, 2014**

# New Tech

## Planning Report - Geographic

<b>Database:</b>	EDM 2003.16 Single User Db	<b>Local Co-ordinate Reference:</b>	Well WAAG 7 - Slot WAAG 7
<b>Company:</b>	EXTRACTION OIL & GAS	<b>TVD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Project:</b>	SEC 19 T7N R65W	<b>MD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Site:</b>	WAAG MIDDLE	<b>North Reference:</b>	True
<b>Well:</b>	WAAG 7	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Plan #1 09Aug14 mab		

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

Site		WAAG MIDDLE			
Site Position:		Northing:	1,448,275.07 ft	Latitude:	40° 33' 40.356 N
From:	Lat/Long	Easting:	3,220,338.91 ft	Longitude:	104° 42' 25.092 W
Position Uncertainty:	0.0 ft	Slot Radius:	"	Grid Convergence:	0.51 °

Well	WAAG 7 - Slot WAAG 7					
Well Position	+N/-S	0.0 ft	Northing:	1,448,417.17 ft	Latitude:	40° 33' 41.760 N
	+E/-W	0.0 ft	Easting:	3,220,340.41 ft	Longitude:	104° 42' 25.056 W
Position Uncertainty		0.0 ft	Wellhead Elevation:	ft	Ground Level:	4,886.0 ft

<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</b>
			(°)	(°)	(nT)
	IGRF2010	8/9/2014	8.42	67.08	52,889

<b>Design</b>	Plan #1 09Aug14 mab				
<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)</b>	<b>+N/-S</b>	<b>+E/-W</b>	<b>Direction</b>	
	(ft)	(ft)	(ft)	(°)	
	0.0	0.0	0.0	282.98	

<b>Plan Sections</b>										
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	
1,475.5	11.51	18.34	1,471.7	54.7	18.1	2.00	2.00	0.00	18.34	
6,260.4	11.51	18.34	6,160.3	961.0	318.6	0.00	0.00	0.00	0.00	
6,836.0	0.00	0.00	6,732.0	1,015.7	336.7	2.00	-2.00	0.00	180.00	
6,866.0	0.00	0.00	6,762.0	1,015.7	336.7	0.00	0.00	0.00	0.00	
7,766.0	90.00	270.80	7,335.0	1,023.7	-236.2	10.00	10.00	0.00	270.80	
12,242.3	90.00	270.80	7,335.0	1,086.1	-4,712.1	0.00	0.00	0.00	0.00	TD / PBHL WAAG MI

# New Tech

## Planning Report - Geographic

<b>Database:</b>	EDM 2003.16 Single User Db	<b>Local Co-ordinate Reference:</b>	Well WAAG 7 - Slot WAAG 7
<b>Company:</b>	EXTRACTION OIL & GAS	<b>TVD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Project:</b>	SEC 19 T7N R65W	<b>MD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Site:</b>	WAAG MIDDLE	<b>North Reference:</b>	True
<b>Well:</b>	WAAG 7	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Plan #1 09Aug14 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	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
100.0	0.00	0.00	100.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
200.0	0.00	0.00	200.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
300.0	0.00	0.00	300.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
400.0	0.00	0.00	400.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
500.0	0.00	0.00	500.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
600.0	0.00	0.00	600.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
700.0	0.00	0.00	700.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
800.0	0.00	0.00	800.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
850.0	0.00	0.00	850.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
<b>9 5/8"</b>									
900.0	0.00	0.00	900.0	0.0	0.0	1,448,417.17	3,220,340.41	40° 33' 41.760 N	104° 42' 25.056 W
<b>Start Build 2.00</b>									
1,000.0	2.00	18.34	1,000.0	1.7	0.5	1,448,418.83	3,220,340.95	40° 33' 41.776 N	104° 42' 25.049 W
1,100.0	4.00	18.34	1,099.8	6.6	2.2	1,448,423.82	3,220,342.55	40° 33' 41.825 N	104° 42' 25.028 W
1,200.0	6.00	18.34	1,199.5	14.9	4.9	1,448,432.11	3,220,345.22	40° 33' 41.907 N	104° 42' 24.992 W
1,300.0	8.00	18.34	1,298.7	26.5	8.8	1,448,443.71	3,220,348.95	40° 33' 42.021 N	104° 42' 24.942 W
1,400.0	10.00	18.34	1,397.5	41.3	13.7	1,448,458.60	3,220,353.74	40° 33' 42.168 N	104° 42' 24.879 W
1,475.5	11.51	18.34	1,471.7	54.7	18.1	1,448,472.02	3,220,358.05	40° 33' 42.300 N	104° 42' 24.821 W
<b>Hold 11.51° Inc, 18.34° Az</b>									
1,500.0	11.51	18.34	1,495.6	59.3	19.7	1,448,476.67	3,220,359.55	40° 33' 42.346 N	104° 42' 24.801 W
1,600.0	11.51	18.34	1,593.6	78.3	25.9	1,448,495.67	3,220,365.66	40° 33' 42.533 N	104° 42' 24.720 W
1,700.0	11.51	18.34	1,691.6	97.2	32.2	1,448,514.66	3,220,371.77	40° 33' 42.721 N	104° 42' 24.638 W
1,800.0	11.51	18.34	1,789.6	116.1	38.5	1,448,533.66	3,220,377.88	40° 33' 42.908 N	104° 42' 24.557 W
1,900.0	11.51	18.34	1,887.6	135.1	44.8	1,448,552.66	3,220,383.99	40° 33' 43.095 N	104° 42' 24.476 W
2,000.0	11.51	18.34	1,985.6	154.0	51.1	1,448,571.65	3,220,390.10	40° 33' 43.282 N	104° 42' 24.394 W
2,100.0	11.51	18.34	2,083.6	173.0	57.3	1,448,590.65	3,220,396.20	40° 33' 43.469 N	104° 42' 24.313 W
2,200.0	11.51	18.34	2,181.6	191.9	63.6	1,448,609.65	3,220,402.31	40° 33' 43.656 N	104° 42' 24.232 W
2,300.0	11.51	18.34	2,279.6	210.9	69.9	1,448,628.64	3,220,408.42	40° 33' 43.844 N	104° 42' 24.150 W
2,400.0	11.51	18.34	2,377.5	229.8	76.2	1,448,647.64	3,220,414.53	40° 33' 44.031 N	104° 42' 24.069 W
2,500.0	11.51	18.34	2,475.5	248.7	82.5	1,448,666.64	3,220,420.64	40° 33' 44.218 N	104° 42' 23.988 W
2,600.0	11.51	18.34	2,573.5	267.7	88.7	1,448,685.63	3,220,426.75	40° 33' 44.405 N	104° 42' 23.906 W
2,700.0	11.51	18.34	2,671.5	286.6	95.0	1,448,704.63	3,220,432.86	40° 33' 44.592 N	104° 42' 23.825 W
2,800.0	11.51	18.34	2,769.5	305.6	101.3	1,448,723.63	3,220,438.97	40° 33' 44.779 N	104° 42' 23.744 W
2,900.0	11.51	18.34	2,867.5	324.5	107.6	1,448,742.62	3,220,445.08	40° 33' 44.967 N	104° 42' 23.662 W
3,000.0	11.51	18.34	2,965.5	343.4	113.9	1,448,761.62	3,220,451.19	40° 33' 45.154 N	104° 42' 23.581 W
3,100.0	11.51	18.34	3,063.5	362.4	120.1	1,448,780.62	3,220,457.30	40° 33' 45.341 N	104° 42' 23.499 W
3,200.0	11.51	18.34	3,161.5	381.3	126.4	1,448,799.61	3,220,463.41	40° 33' 45.528 N	104° 42' 23.418 W
3,300.0	11.51	18.34	3,259.4	400.3	132.7	1,448,818.61	3,220,469.52	40° 33' 45.715 N	104° 42' 23.337 W
3,400.0	11.51	18.34	3,357.4	419.2	139.0	1,448,837.61	3,220,475.63	40° 33' 45.902 N	104° 42' 23.255 W
3,500.0	11.51	18.34	3,455.4	438.1	145.2	1,448,856.60	3,220,481.73	40° 33' 46.090 N	104° 42' 23.174 W
3,600.0	11.51	18.34	3,553.4	457.1	151.5	1,448,875.60	3,220,487.84	40° 33' 46.277 N	104° 42' 23.093 W
3,657.8	11.51	18.34	3,610.0	468.0	155.1	1,448,886.57	3,220,491.37	40° 33' 46.385 N	104° 42' 23.046 W
<b>PARKMAN</b>									
3,700.0	11.51	18.34	3,651.4	476.0	157.8	1,448,894.60	3,220,493.95	40° 33' 46.464 N	104° 42' 23.011 W
3,800.0	11.51	18.34	3,749.4	495.0	164.1	1,448,913.59	3,220,500.06	40° 33' 46.651 N	104° 42' 22.930 W
3,900.0	11.51	18.34	3,847.4	513.9	170.4	1,448,932.59	3,220,506.17	40° 33' 46.838 N	104° 42' 22.849 W
4,000.0	11.51	18.34	3,945.4	532.9	176.6	1,448,951.59	3,220,512.28	40° 33' 47.025 N	104° 42' 22.767 W
4,100.0	11.51	18.34	4,043.4	551.8	182.9	1,448,970.58	3,220,518.39	40° 33' 47.213 N	104° 42' 22.686 W
4,200.0	11.51	18.34	4,141.3	570.7	189.2	1,448,989.58	3,220,524.50	40° 33' 47.400 N	104° 42' 22.605 W
4,300.0	11.51	18.34	4,239.3	589.7	195.5	1,449,008.58	3,220,530.61	40° 33' 47.587 N	104° 42' 22.523 W
4,399.7	11.51	18.34	4,337.0	608.6	201.7	1,449,027.51	3,220,536.70	40° 33' 47.774 N	104° 42' 22.442 W
<b>SUSSEX</b>									

# New Tech

## Planning Report - Geographic

<b>Database:</b>	EDM 2003.16 Single User Db	<b>Local Co-ordinate Reference:</b>	Well WAAG 7 - Slot WAAG 7
<b>Company:</b>	EXTRACTION OIL & GAS	<b>TVD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Project:</b>	SEC 19 T7N R65W	<b>MD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Site:</b>	WAAG MIDDLE	<b>North Reference:</b>	True
<b>Well:</b>	WAAG 7	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Plan #1 09Aug14 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	11.51	18.34	4,337.3	608.6	201.8	1,449,027.57	3,220,536.72	40° 33' 47.774 N	104° 42' 22.442 W
4,500.0	11.51	18.34	4,435.3	627.6	208.0	1,449,046.57	3,220,542.83	40° 33' 47.961 N	104° 42' 22.360 W
4,600.0	11.51	18.34	4,533.3	646.5	214.3	1,449,065.57	3,220,548.94	40° 33' 48.148 N	104° 42' 22.279 W
4,700.0	11.51	18.34	4,631.3	665.4	220.6	1,449,084.56	3,220,555.05	40° 33' 48.336 N	104° 42' 22.198 W
4,800.0	11.51	18.34	4,729.3	684.4	226.9	1,449,103.56	3,220,561.16	40° 33' 48.523 N	104° 42' 22.116 W
4,800.7	11.51	18.34	4,730.0	684.5	226.9	1,449,103.70	3,220,561.20	40° 33' 48.524 N	104° 42' 22.116 W
<b>SHANNON</b>									
4,900.0	11.51	18.34	4,827.3	703.3	233.1	1,449,122.56	3,220,567.26	40° 33' 48.710 N	104° 42' 22.035 W
5,000.0	11.51	18.34	4,925.3	722.3	239.4	1,449,141.55	3,220,573.37	40° 33' 48.897 N	104° 42' 21.954 W
5,100.0	11.51	18.34	5,023.2	741.2	245.7	1,449,160.55	3,220,579.48	40° 33' 49.084 N	104° 42' 21.872 W
5,200.0	11.51	18.34	5,121.2	760.2	252.0	1,449,179.55	3,220,585.59	40° 33' 49.271 N	104° 42' 21.791 W
5,300.0	11.51	18.34	5,219.2	779.1	258.3	1,449,198.54	3,220,591.70	40° 33' 49.459 N	104° 42' 21.710 W
5,400.0	11.51	18.34	5,317.2	798.0	264.5	1,449,217.54	3,220,597.81	40° 33' 49.646 N	104° 42' 21.628 W
5,500.0	11.51	18.34	5,415.2	817.0	270.8	1,449,236.54	3,220,603.92	40° 33' 49.833 N	104° 42' 21.547 W
5,600.0	11.51	18.34	5,513.2	835.9	277.1	1,449,255.53	3,220,610.03	40° 33' 50.020 N	104° 42' 21.466 W
5,700.0	11.51	18.34	5,611.2	854.9	283.4	1,449,274.53	3,220,616.14	40° 33' 50.207 N	104° 42' 21.384 W
5,800.0	11.51	18.34	5,709.2	873.8	289.7	1,449,293.53	3,220,622.25	40° 33' 50.395 N	104° 42' 21.303 W
5,900.0	11.51	18.34	5,807.2	892.7	295.9	1,449,312.52	3,220,628.36	40° 33' 50.582 N	104° 42' 21.221 W
6,000.0	11.51	18.34	5,905.1	911.7	302.2	1,449,331.52	3,220,634.47	40° 33' 50.769 N	104° 42' 21.140 W
6,100.0	11.51	18.34	6,003.1	930.6	308.5	1,449,350.52	3,220,640.58	40° 33' 50.956 N	104° 42' 21.059 W
6,200.0	11.51	18.34	6,101.1	949.6	314.8	1,449,369.51	3,220,646.69	40° 33' 51.143 N	104° 42' 20.977 W
6,260.4	11.51	18.34	6,160.3	961.0	318.6	1,449,380.99	3,220,650.38	40° 33' 51.256 N	104° 42' 20.928 W
<b>Start Drop -2.00</b>									
6,300.0	10.72	18.34	6,199.2	968.2	321.0	1,449,388.25	3,220,652.71	40° 33' 51.328 N	104° 42' 20.897 W
6,400.0	8.72	18.34	6,297.7	984.3	326.3	1,449,404.32	3,220,657.88	40° 33' 51.486 N	104° 42' 20.828 W
6,500.0	6.72	18.34	6,396.8	997.0	330.5	1,449,417.11	3,220,661.99	40° 33' 51.612 N	104° 42' 20.773 W
6,600.0	4.72	18.34	6,496.3	1,006.5	333.6	1,449,426.60	3,220,665.04	40° 33' 51.706 N	104° 42' 20.733 W
6,700.0	2.72	18.34	6,596.1	1,012.6	335.7	1,449,432.77	3,220,667.03	40° 33' 51.766 N	104° 42' 20.706 W
6,800.0	0.72	18.34	6,696.0	1,015.5	336.6	1,449,435.63	3,220,667.95	40° 33' 51.795 N	104° 42' 20.694 W
6,836.0	0.00	0.00	6,732.0	1,015.7	336.7	1,449,435.84	3,220,668.02	40° 33' 51.797 N	104° 42' 20.693 W
<b>Vertical</b>									
6,866.0	0.00	0.00	6,762.0	1,015.7	336.7	1,449,435.84	3,220,668.02	40° 33' 51.797 N	104° 42' 20.693 W
<b>KOP 10°/100</b>									
6,900.0	3.40	270.80	6,796.0	1,015.7	335.7	1,449,435.85	3,220,667.01	40° 33' 51.797 N	104° 42' 20.706 W
7,000.0	13.40	270.80	6,894.8	1,015.9	321.1	1,449,435.92	3,220,652.41	40° 33' 51.799 N	104° 42' 20.895 W
7,100.0	23.40	270.80	6,989.6	1,016.4	289.6	1,449,436.08	3,220,620.88	40° 33' 51.803 N	104° 42' 21.304 W
7,120.2	25.43	270.80	7,008.0	1,016.5	281.2	1,449,436.12	3,220,612.52	40° 33' 51.804 N	104° 42' 21.412 W
<b>NIOBRARA</b>									
7,200.0	33.40	270.80	7,077.4	1,017.0	242.1	1,449,436.32	3,220,573.37	40° 33' 51.810 N	104° 42' 21.920 W
7,289.5	42.35	270.80	7,148.0	1,017.8	187.2	1,449,436.59	3,220,518.48	40° 33' 51.817 N	104° 42' 22.631 W
<b>NIO B TARGET</b>									
7,300.0	43.40	270.80	7,155.7	1,017.9	180.0	1,449,436.63	3,220,511.33	40° 33' 51.818 N	104° 42' 22.723 W
7,400.0	53.40	270.80	7,222.0	1,018.9	105.3	1,449,437.00	3,220,436.64	40° 33' 51.829 N	104° 42' 23.691 W
7,500.0	63.40	270.80	7,274.3	1,020.1	20.3	1,449,437.43	3,220,351.58	40° 33' 51.840 N	104° 42' 24.793 W
7,542.7	67.67	270.80	7,292.0	1,020.7	-18.6	1,449,437.63	3,220,312.73	40° 33' 51.846 N	104° 42' 25.296 W
<b>FORT HAYS</b>									
7,600.0	73.40	270.80	7,311.1	1,021.4	-72.6	1,449,437.90	3,220,258.71	40° 33' 51.853 N	104° 42' 25.996 W
7,659.0	79.30	270.80	7,325.0	1,022.2	-129.9	1,449,438.18	3,220,201.42	40° 33' 51.861 N	104° 42' 26.739 W
<b>CODELL</b>									
7,700.0	83.40	270.80	7,331.2	1,022.8	-170.4	1,449,438.39	3,220,160.88	40° 33' 51.867 N	104° 42' 27.264 W
7,766.0	90.00	270.80	7,335.0	1,023.7	-236.2	1,449,438.72	3,220,095.07	40° 33' 51.876 N	104° 42' 28.117 W
<b>Landing Pt 90° Inc, 270.80° Az - 7"</b>									
7,800.0	90.00	270.80	7,335.0	1,024.2	-270.2	1,449,438.89	3,220,061.03	40° 33' 51.880 N	104° 42' 28.558 W

# New Tech

## Planning Report - Geographic

<b>Database:</b>	EDM 2003.16 Single User Db	<b>Local Co-ordinate Reference:</b>	Well WAAG 7 - Slot WAAG 7
<b>Company:</b>	EXTRACTION OIL & GAS	<b>TVD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Project:</b>	SEC 19 T7N R65W	<b>MD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Site:</b>	WAAG MIDDLE	<b>North Reference:</b>	True
<b>Well:</b>	WAAG 7	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Plan #1 09Aug14 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	270.80	7,335.0	1,025.6	-370.2	1,449,439.39	3,219,961.03	40° 33' 51.894 N	104° 42' 29.853 W
8,000.0	90.00	270.80	7,335.0	1,027.0	-470.2	1,449,439.89	3,219,861.03	40° 33' 51.908 N	104° 42' 31.149 W
8,100.0	90.00	270.80	7,335.0	1,028.4	-570.2	1,449,440.40	3,219,761.03	40° 33' 51.922 N	104° 42' 32.444 W
8,200.0	90.00	270.80	7,335.0	1,029.8	-670.2	1,449,440.90	3,219,661.03	40° 33' 51.936 N	104° 42' 33.740 W
8,300.0	90.00	270.80	7,335.0	1,031.2	-770.2	1,449,441.40	3,219,561.03	40° 33' 51.949 N	104° 42' 35.036 W
8,400.0	90.00	270.80	7,335.0	1,032.6	-870.2	1,449,441.90	3,219,461.04	40° 33' 51.963 N	104° 42' 36.331 W
8,500.0	90.00	270.80	7,335.0	1,033.9	-970.2	1,449,442.40	3,219,361.04	40° 33' 51.977 N	104° 42' 37.627 W
8,600.0	90.00	270.80	7,335.0	1,035.3	-1,070.2	1,449,442.91	3,219,261.04	40° 33' 51.991 N	104° 42' 38.922 W
8,700.0	90.00	270.80	7,335.0	1,036.7	-1,170.1	1,449,443.41	3,219,161.04	40° 33' 52.004 N	104° 42' 40.218 W
8,800.0	90.00	270.80	7,335.0	1,038.1	-1,270.1	1,449,443.91	3,219,061.04	40° 33' 52.018 N	104° 42' 41.514 W
8,900.0	90.00	270.80	7,335.0	1,039.5	-1,370.1	1,449,444.41	3,218,961.04	40° 33' 52.032 N	104° 42' 42.809 W
9,000.0	90.00	270.80	7,334.9	1,040.9	-1,470.1	1,449,444.91	3,218,861.04	40° 33' 52.046 N	104° 42' 44.105 W
9,100.0	90.00	270.80	7,334.9	1,042.3	-1,570.1	1,449,445.41	3,218,761.04	40° 33' 52.059 N	104° 42' 45.400 W
9,200.0	90.00	270.80	7,334.9	1,043.7	-1,670.1	1,449,445.92	3,218,661.05	40° 33' 52.073 N	104° 42' 46.696 W
9,300.0	90.00	270.80	7,334.9	1,045.1	-1,770.1	1,449,446.42	3,218,561.05	40° 33' 52.087 N	104° 42' 47.992 W
9,400.0	90.00	270.80	7,334.9	1,046.5	-1,870.1	1,449,446.92	3,218,461.05	40° 33' 52.101 N	104° 42' 49.287 W
9,500.0	90.00	270.80	7,334.9	1,047.9	-1,970.1	1,449,447.42	3,218,361.05	40° 33' 52.114 N	104° 42' 50.583 W
9,600.0	90.00	270.80	7,334.9	1,049.3	-2,070.1	1,449,447.92	3,218,261.05	40° 33' 52.128 N	104° 42' 51.879 W
9,700.0	90.00	270.80	7,334.9	1,050.7	-2,170.1	1,449,448.43	3,218,161.05	40° 33' 52.142 N	104° 42' 53.174 W
9,800.0	90.00	270.80	7,334.9	1,052.1	-2,270.0	1,449,448.93	3,218,061.05	40° 33' 52.155 N	104° 42' 54.470 W
9,900.0	90.00	270.80	7,334.9	1,053.5	-2,370.0	1,449,449.43	3,217,961.05	40° 33' 52.169 N	104° 42' 55.765 W
10,000.0	90.00	270.80	7,334.9	1,054.9	-2,470.0	1,449,449.93	3,217,861.06	40° 33' 52.183 N	104° 42' 57.061 W
10,100.0	90.00	270.80	7,334.9	1,056.3	-2,570.0	1,449,450.43	3,217,761.06	40° 33' 52.197 N	104° 42' 58.357 W
10,200.0	90.00	270.80	7,334.9	1,057.7	-2,670.0	1,449,450.94	3,217,661.06	40° 33' 52.210 N	104° 42' 59.652 W
10,300.0	90.00	270.80	7,334.9	1,059.1	-2,770.0	1,449,451.44	3,217,561.06	40° 33' 52.224 N	104° 43' 0.948 W
10,400.0	90.00	270.80	7,334.9	1,060.5	-2,870.0	1,449,451.94	3,217,461.06	40° 33' 52.238 N	104° 43' 2.243 W
10,500.0	90.00	270.80	7,334.9	1,061.9	-2,970.0	1,449,452.44	3,217,361.06	40° 33' 52.251 N	104° 43' 3.539 W
10,600.0	90.00	270.80	7,334.9	1,063.3	-3,070.0	1,449,452.94	3,217,261.06	40° 33' 52.265 N	104° 43' 4.835 W
10,700.0	90.00	270.80	7,334.9	1,064.7	-3,170.0	1,449,453.45	3,217,161.06	40° 33' 52.279 N	104° 43' 6.130 W
10,800.0	90.00	270.80	7,334.9	1,066.1	-3,269.9	1,449,453.95	3,217,061.07	40° 33' 52.292 N	104° 43' 7.426 W
10,900.0	90.00	270.80	7,334.9	1,067.5	-3,369.9	1,449,454.45	3,216,961.07	40° 33' 52.306 N	104° 43' 8.721 W
11,000.0	90.00	270.80	7,334.9	1,068.9	-3,469.9	1,449,454.95	3,216,861.07	40° 33' 52.320 N	104° 43' 10.017 W
11,100.0	90.00	270.80	7,334.9	1,070.3	-3,569.9	1,449,455.45	3,216,761.07	40° 33' 52.333 N	104° 43' 11.313 W
11,200.0	90.00	270.80	7,334.9	1,071.6	-3,669.9	1,449,455.96	3,216,661.07	40° 33' 52.347 N	104° 43' 12.608 W
11,300.0	90.00	270.80	7,334.9	1,073.0	-3,769.9	1,449,456.46	3,216,561.07	40° 33' 52.361 N	104° 43' 13.904 W
11,400.0	90.00	270.80	7,334.9	1,074.4	-3,869.9	1,449,456.96	3,216,461.07	40° 33' 52.374 N	104° 43' 15.200 W
11,500.0	90.00	270.80	7,334.9	1,075.8	-3,969.9	1,449,457.46	3,216,361.07	40° 33' 52.388 N	104° 43' 16.495 W
11,600.0	90.00	270.80	7,334.9	1,077.2	-4,069.9	1,449,457.96	3,216,261.08	40° 33' 52.401 N	104° 43' 17.791 W
11,700.0	90.00	270.80	7,334.9	1,078.6	-4,169.9	1,449,458.47	3,216,161.08	40° 33' 52.415 N	104° 43' 19.086 W
11,800.0	90.00	270.80	7,334.9	1,080.0	-4,269.8	1,449,458.97	3,216,061.08	40° 33' 52.429 N	104° 43' 20.382 W
11,900.0	90.00	270.80	7,334.9	1,081.4	-4,369.8	1,449,459.47	3,215,961.08	40° 33' 52.442 N	104° 43' 21.678 W
12,000.0	90.00	270.80	7,334.9	1,082.8	-4,469.8	1,449,459.97	3,215,861.08	40° 33' 52.456 N	104° 43' 22.973 W
12,100.0	90.00	270.80	7,334.9	1,084.2	-4,569.8	1,449,460.47	3,215,761.08	40° 33' 52.470 N	104° 43' 24.269 W
12,200.0	90.00	270.80	7,334.9	1,085.6	-4,669.8	1,449,460.97	3,215,661.08	40° 33' 52.483 N	104° 43' 25.564 W
12,242.3	90.00	270.80	7,335.0	1,086.1	-4,712.1	1,449,461.09	3,215,618.82	40° 33' 52.488 N	104° 43' 26.112 W

TD at 12242.3 - TD / PBHL WAAG MIDDLE 7

# New Tech

## Planning Report - Geographic

<b>Database:</b>	EDM 2003.16 Single User Db	<b>Local Co-ordinate Reference:</b>	Well WAAG 7 - Slot WAAG 7
<b>Company:</b>	EXTRACTION OIL & GAS	<b>TVD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Project:</b>	SEC 19 T7N R65W	<b>MD Reference:</b>	WELL @ 4902.0ft (Xtreme 7)
<b>Site:</b>	WAAG MIDDLE	<b>North Reference:</b>	True
<b>Well:</b>	WAAG 7	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Plan #1 09Aug14 mab		

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									
TD / PBHL WAAG MIDD	0.00	0.00	7,335.0	1,086.1	-4,712.1	1,449,461.09	3,215,618.82	40° 33' 52.488 N	104° 43' 26.112 W
- plan hits target									
- Point									
LP WAAG MIDDLE 7	0.00	0.00	7,335.0	1,023.7	-236.2	1,449,438.74	3,220,095.11	40° 33' 51.876 N	104° 42' 28.116 W
- plan hits target									
- Point									

Casing Points				
Measured Depth	Vertical Depth	Name	Casing Diameter	Hole Diameter
(ft)	(ft)		(")	(")
850.0	850.0	9 5/8"	0	0
7,766.0	7,335.0	7"	0	0

Formations					
Measured Depth	Vertical Depth	Name	Lithology	Dip	Dip Direction
(ft)	(ft)			(°)	(°)
3657.80	3610.00	PARKMAN			
4399.70	4337.00	SUSSEX			
4800.70	4730.00	SHANNON			
7120.20	7008.00	NIOBRARA			
7289.50	7148.00	NIO B TARGET			
7542.70	7292.00	FORT HAYS			
7659.00	7325.00	CODELL			

Plan Annotations				
Measured Depth	Vertical Depth	Local Coordinates		Comment
(ft)	(ft)	+N/-S (ft)	+E/-W (ft)	
900.0	900.0	0.0	0.0	Start Build 2.00
1,475.5	1,471.7	54.7	18.1	Hold 11.51° Inc, 18.34° Az
6,260.4	6,160.3	961.0	318.6	Start Drop -2.00
6,836.0	6,732.0	1,015.7	336.7	Vertical
6,866.0	6,762.0	1,015.7	336.7	KOP 10°/100
7,766.0	7,335.0	1,023.7	-236.2	Landing Pt 90° Inc, 270.80° Az
12,242.3	7,335.0	1,086.1	-4,712.1	TD at 12242.3