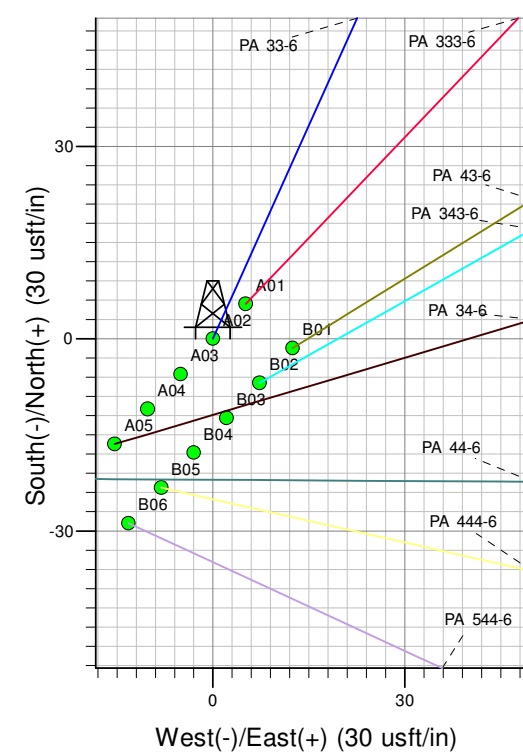
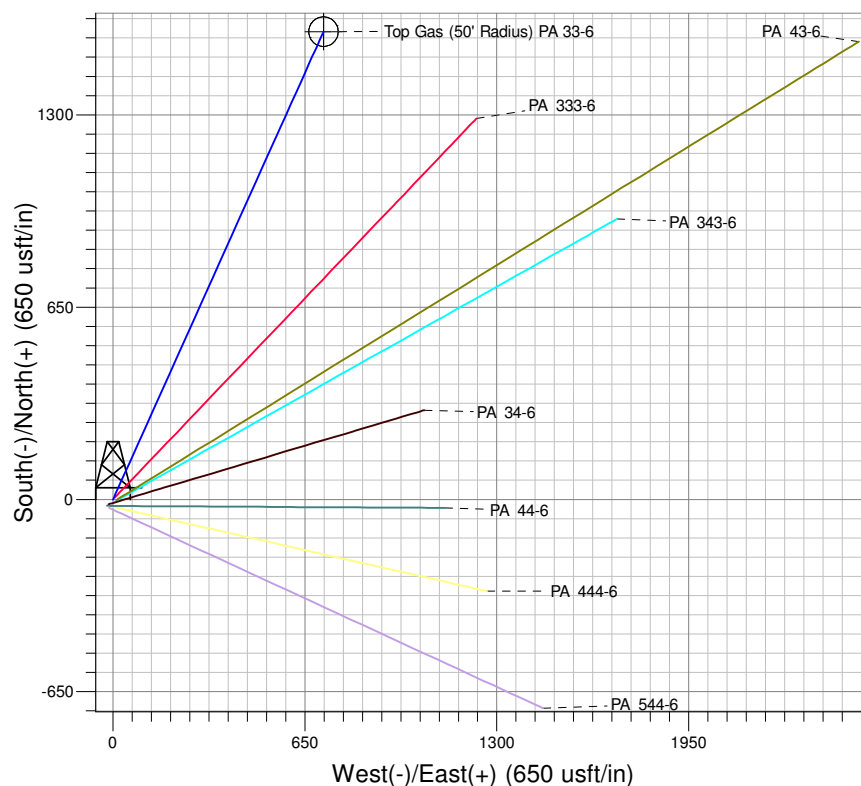
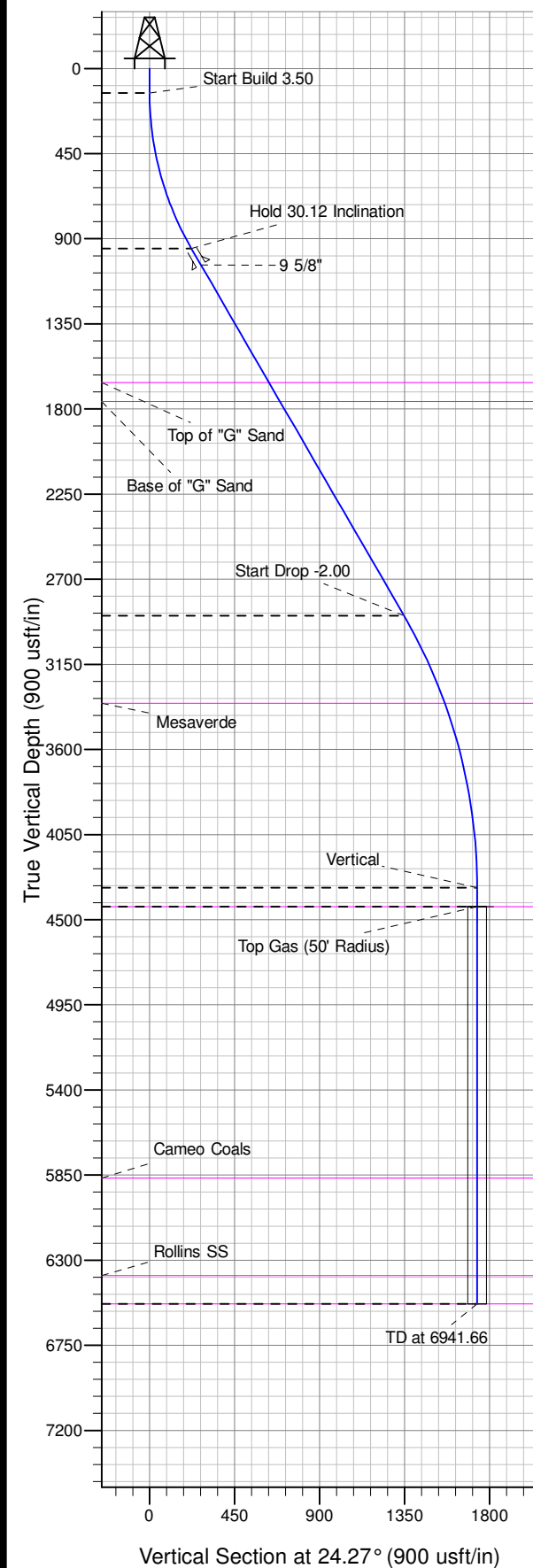




Well Name: PA 33-6  
Surface Location: PA 24-6 Pad  
North American Datum 1983 , US State Plane 1983 , Colorado Central Zone  
Ground Elevation: 5135.00

+N/-S	+E/-W	Northing	Easting	Latitude	Longitude	Slot
0.00	0.00	1603201.70	2282583.30	39.46201	-108.04133	A02

KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)



Project: PA 06-07S-095W  
Site: PA 24-6 Pad  
Well: PA 33-6  
Design #4 26Feb14 kjs



Azimuths to True North  
Magnetic North: 10.19°  
Magnetic Field  
Strength: 52088.0snT  
Dip Angle: 65.66°  
Date: 11/19/2012  
Model: IGRF2010

#### ANNOTATIONS

TVD	MD	Inc	Azi	+N/-S	+E/-W	Vsect	Departure	Annotation
130.00	130.00	0.00	0.00	0.00	0.00	0.00	0.00	Start Build 3.50
951.50	990.60	30.12	24.27	201.52	90.85	221.05	221.05	Hold 30.12 Inclination
2893.37	3235.62	30.12	24.27	1228.57	553.89	1347.66	1347.66	Start Drop -2.00
4331.00	4741.66	0.00	0.00	1581.23	712.89	1734.50	1734.50	Vertical
4431.00	4841.66	0.00	0.00	1581.23	712.89	1734.50	1734.50	Top Gas
6531.00	6941.66	0.00	0.00	1581.23	712.89	1734.50	1734.50	TD at 6941.66

# **PICEANCE VLY NAD 83**

**PA 06-07S-095W**

**PA 24-6 Pad**

**PA 33-6 - Slot A02**

**Wellbore #1**

**Plan: Design #4 26Feb14 kjs**

## **Standard Planning Report - Geographic**

**13 March, 2014**

**WPX**  
Planning Report - Geographic

<b>Database:</b>	COMPASS-PICEANCE	<b>Local Co-ordinate Reference:</b>	Well PA 33-6 - Slot A02
<b>Company:</b>	PICEANCE VLY NAD 83	<b>TVD Reference:</b>	KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)
<b>Project:</b>	PA 06-07S-095W	<b>MD Reference:</b>	KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)
<b>Site:</b>	PA 24-6 Pad	<b>North Reference:</b>	True
<b>Well:</b>	PA 33-6	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4 26Feb14 kjs		

<b>Project</b>	PA 06-07S-095W, Garfield County, CO, 06-07S-095W		
<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 Central Zone		Using geodetic scale factor

<b>Site</b>	PA 24-6 Pad			
<b>Site Position:</b>		<b>Northing:</b>	1,603,207.00 usft	<b>Latitude:</b> 39.46203
<b>From:</b> Map		<b>Easting:</b>	2,282,588.60 usft	<b>Longitude:</b> -108.04131
<b>Position Uncertainty:</b>	0.00 usft	<b>Slot Radius:</b>	13.200 in	<b>Grid Convergence:</b> -1.603 °

<b>Well</b>	PA 33-6 - Slot A02			
<b>Well Position</b>	<b>+N/-S</b>	0.00 usft	<b>Northing:</b>	1,603,201.70 usft
	<b>+E/-W</b>	0.00 usft	<b>Easting:</b>	2,282,583.30 usft
<b>Position Uncertainty</b>	0.00 usft		<b>Wellhead Elevation:</b>	
			<b>Ground Level:</b>	5,135.00 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>
	IGRF2010	11/19/2012	10.185	65.664	52,088

<b>Design</b>	Design #4 26Feb14 kjs			
<b>Audit Notes:</b>				
<b>Version:</b>	<b>Phase:</b>	PLAN	<b>Tie On Depth:</b>	0.00
<b>Vertical Section:</b>	<b>Depth From (TVD) (usft)</b>	<b>+N/-S (usft)</b>	<b>+E/-W (usft)</b>	<b>Direction (°)</b>
	0.00	0.00	0.00	24.27

<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
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.000	
130.00	0.00	0.00	130.00	0.00	0.00	0.00	0.00	0.00	0.000	
990.60	30.12	24.27	951.50	201.52	90.85	3.50	3.50	0.00	24.268	
3,235.62	30.12	24.27	2,893.37	1,228.57	553.89	0.00	0.00	0.00	0.000	
4,741.66	0.00	0.00	4,331.00	1,581.23	712.89	2.00	-2.00	0.00	180.000	
4,841.66	0.00	0.00	4,431.00	1,581.23	712.89	0.00	0.00	0.00	0.000	Top Gas (50' Radius)
6,941.66	0.00	0.00	6,531.00	1,581.23	712.89	0.00	0.00	0.00	0.000	

**WPX**  
Planning Report - Geographic

<b>Database:</b>	COMPASS-PICEANCE	<b>Local Co-ordinate Reference:</b>	Well PA 33-6 - Slot A02
<b>Company:</b>	PICEANCE VLY NAD 83	<b>TVD Reference:</b>	KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)
<b>Project:</b>	PA 06-07S-095W	<b>MD Reference:</b>	KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)
<b>Site:</b>	PA 24-6 Pad	<b>North Reference:</b>	True
<b>Well:</b>	PA 33-6	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4 26Feb14 kjs		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
0.00	0.00	0.00	0.00	0.00	0.00	1,603,201.70	2,282,583.30	39.46201	-108.04133
100.00	0.00	0.00	100.00	0.00	0.00	1,603,201.70	2,282,583.30	39.46201	-108.04133
130.00	0.00	0.00	130.00	0.00	0.00	1,603,201.70	2,282,583.30	39.46201	-108.04133
Start Build 3.50									
200.00	2.45	24.27	199.98	1.36	0.62	1,603,203.04	2,282,583.95	39.46202	-108.04133
300.00	5.95	24.27	299.69	8.04	3.62	1,603,209.63	2,282,587.15	39.46203	-108.04132
400.00	9.45	24.27	398.78	20.25	9.13	1,603,221.68	2,282,592.99	39.46207	-108.04130
500.00	12.95	24.27	496.86	37.96	17.11	1,603,239.16	2,282,601.47	39.46212	-108.04127
600.00	16.45	24.27	593.57	61.09	27.54	1,603,261.99	2,282,612.54	39.46218	-108.04123
700.00	19.95	24.27	688.55	89.56	40.38	1,603,290.08	2,282,626.16	39.46226	-108.04119
800.00	23.45	24.27	781.45	123.26	55.57	1,603,323.35	2,282,642.29	39.46235	-108.04113
900.00	26.95	24.27	871.92	162.07	73.07	1,603,361.65	2,282,660.87	39.46246	-108.04107
990.60	30.12	24.27	951.50	201.52	90.85	1,603,400.58	2,282,679.75	39.46256	-108.04101
Hold 30.12 Inclination									
1,000.00	30.12	24.27	959.63	205.82	92.79	1,603,404.83	2,282,681.81	39.46258	-108.04100
1,091.00	30.12	24.27	1,038.35	247.45	111.56	1,603,445.92	2,282,701.73	39.46269	-108.04094
9 5/8"									
1,100.00	30.12	24.27	1,046.13	251.57	113.42	1,603,449.98	2,282,703.70	39.46270	-108.04093
1,200.00	30.12	24.27	1,132.63	297.31	134.04	1,603,495.13	2,282,725.60	39.46283	-108.04086
1,300.00	30.12	24.27	1,219.12	343.06	154.67	1,603,540.28	2,282,747.50	39.46295	-108.04078
1,400.00	30.12	24.27	1,305.62	388.81	175.29	1,603,585.43	2,282,769.39	39.46308	-108.04071
1,500.00	30.12	24.27	1,392.12	434.56	195.92	1,603,630.59	2,282,791.29	39.46320	-108.04064
1,600.00	30.12	24.27	1,478.61	480.31	216.54	1,603,675.74	2,282,813.18	39.46333	-108.04056
1,700.00	30.12	24.27	1,565.11	526.06	237.17	1,603,720.89	2,282,835.08	39.46346	-108.04049
1,800.00	30.12	24.27	1,651.61	571.80	257.79	1,603,766.04	2,282,856.98	39.46358	-108.04042
1,810.86	30.12	24.27	1,661.00	576.77	260.03	1,603,770.94	2,282,859.35	39.46359	-108.04041
Top of "G" Sand									
1,900.00	30.12	24.27	1,738.11	617.55	278.42	1,603,811.19	2,282,878.87	39.46371	-108.04034
1,926.47	30.12	24.27	1,761.00	629.66	283.88	1,603,823.14	2,282,884.67	39.46374	-108.04033
Base of "G" Sand									
2,000.00	30.12	24.27	1,824.60	663.30	299.04	1,603,856.34	2,282,900.77	39.46383	-108.04027
2,100.00	30.12	24.27	1,911.10	709.05	319.67	1,603,901.49	2,282,922.66	39.46396	-108.04020
2,200.00	30.12	24.27	1,997.60	754.80	340.29	1,603,946.65	2,282,944.56	39.46408	-108.04013
2,300.00	30.12	24.27	2,084.09	800.54	360.92	1,603,991.80	2,282,966.45	39.46421	-108.04005
2,400.00	30.12	24.27	2,170.59	846.29	381.55	1,604,036.95	2,282,988.35	39.46433	-108.03998
2,500.00	30.12	24.27	2,257.09	892.04	402.17	1,604,082.10	2,283,010.25	39.46446	-108.03991
2,600.00	30.12	24.27	2,343.58	937.79	422.80	1,604,127.25	2,283,032.14	39.46459	-108.03983
2,700.00	30.12	24.27	2,430.08	983.54	443.42	1,604,172.40	2,283,054.04	39.46471	-108.03976
2,800.00	30.12	24.27	2,516.58	1,029.29	464.05	1,604,217.55	2,283,075.93	39.46484	-108.03969
2,900.00	30.12	24.27	2,603.07	1,075.03	484.67	1,604,262.71	2,283,097.83	39.46496	-108.03961
3,000.00	30.12	24.27	2,689.57	1,120.78	505.30	1,604,307.86	2,283,119.72	39.46509	-108.03954
3,100.00	30.12	24.27	2,776.07	1,166.53	525.92	1,604,353.01	2,283,141.62	39.46521	-108.03947
3,200.00	30.12	24.27	2,862.56	1,212.28	546.55	1,604,398.16	2,283,163.52	39.46534	-108.03939
3,235.62	30.12	24.27	2,893.37	1,228.57	553.89	1,604,414.24	2,283,171.32	39.46538	-108.03937
Start Drop -2.00									
3,300.00	28.83	24.27	2,949.42	1,257.45	566.91	1,604,442.75	2,283,185.14	39.46546	-108.03932
3,400.00	26.83	24.27	3,037.85	1,300.02	586.10	1,604,484.75	2,283,205.51	39.46558	-108.03925
3,500.00	24.83	24.27	3,127.85	1,339.74	604.01	1,604,523.96	2,283,224.52	39.46569	-108.03919
3,600.00	22.83	24.27	3,219.32	1,376.57	620.62	1,604,560.31	2,283,242.15	39.46579	-108.03913
3,700.00	20.83	24.27	3,312.14	1,410.48	635.90	1,604,593.77	2,283,258.38	39.46588	-108.03908
3,746.79	19.90	24.27	3,356.00	1,425.32	642.60	1,604,608.42	2,283,265.48	39.46592	-108.03905
Mesaverde									

**WPX**  
Planning Report - Geographic

<b>Database:</b>	COMPASS-PICEANCE	<b>Local Co-ordinate Reference:</b>	Well PA 33-6 - Slot A02
<b>Company:</b>	PICEANCE VLY NAD 83	<b>TVD Reference:</b>	KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)
<b>Project:</b>	PA 06-07S-095W	<b>MD Reference:</b>	KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)
<b>Site:</b>	PA 24-6 Pad	<b>North Reference:</b>	True
<b>Well:</b>	PA 33-6	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4 26Feb14 kjs		

Planned Survey									
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Map Northing (usft)	Map Easting (usft)	Latitude	Longitude
3,800.00	18.83	24.27	3,406.20	1,441.41	649.85	1,604,624.30	2,283,273.18	39.46597	-108.03903
3,900.00	16.83	24.27	3,501.39	1,469.32	662.43	1,604,651.85	2,283,286.54	39.46605	-108.03898
4,000.00	14.83	24.27	3,597.59	1,494.19	673.65	1,604,676.40	2,283,298.45	39.46611	-108.03894
4,100.00	12.83	24.27	3,694.69	1,515.99	683.47	1,604,697.91	2,283,308.88	39.46617	-108.03891
4,200.00	10.83	24.27	3,792.56	1,534.68	691.90	1,604,716.36	2,283,317.82	39.46622	-108.03888
4,300.00	8.83	24.27	3,891.08	1,550.25	698.92	1,604,731.72	2,283,325.28	39.46627	-108.03886
4,400.00	6.83	24.27	3,990.15	1,562.68	704.52	1,604,743.99	2,283,331.22	39.46630	-108.03884
4,500.00	4.83	24.27	4,089.62	1,571.94	708.70	1,604,753.13	2,283,335.66	39.46633	-108.03882
4,600.00	2.83	24.27	4,189.39	1,578.03	711.45	1,604,759.15	2,283,338.57	39.46634	-108.03881
4,700.00	0.83	24.27	4,289.34	1,580.95	712.76	1,604,762.02	2,283,339.97	39.46635	-108.03881
4,741.66	0.00	0.00	4,331.00	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
<b>Vertical</b>									
4,800.00	0.00	0.00	4,389.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
4,841.66	0.00	0.00	4,431.00	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
<b>Top Gas - Approx. Top Gas</b>									
4,900.00	0.00	0.00	4,489.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,000.00	0.00	0.00	4,589.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,100.00	0.00	0.00	4,689.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,200.00	0.00	0.00	4,789.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,300.00	0.00	0.00	4,889.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,400.00	0.00	0.00	4,989.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,500.00	0.00	0.00	5,089.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,600.00	0.00	0.00	5,189.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,700.00	0.00	0.00	5,289.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,800.00	0.00	0.00	5,389.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
5,900.00	0.00	0.00	5,489.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,000.00	0.00	0.00	5,589.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,100.00	0.00	0.00	5,689.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,200.00	0.00	0.00	5,789.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,276.66	0.00	0.00	5,866.00	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
<b>Cameo Coals</b>									
6,300.00	0.00	0.00	5,889.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,400.00	0.00	0.00	5,989.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,500.00	0.00	0.00	6,089.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,600.00	0.00	0.00	6,189.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,700.00	0.00	0.00	6,289.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,791.66	0.00	0.00	6,381.00	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
<b>Rollins SS</b>									
6,800.00	0.00	0.00	6,389.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,900.00	0.00	0.00	6,489.34	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
6,941.66	0.00	0.00	6,531.00	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881
<b>TD at 6941.66 - TD</b>									

**WPX**  
Planning Report - Geographic

<b>Database:</b>	COMPASS-PICEANCE	<b>Local Co-ordinate Reference:</b>	Well PA 33-6 - Slot A02
<b>Company:</b>	PICEANCE VLY NAD 83	<b>TVD Reference:</b>	KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)
<b>Project:</b>	PA 06-07S-095W	<b>MD Reference:</b>	KELLYBUSHING @ 5160.00usft (Aztec 1000 (25' RKB) kjs)
<b>Site:</b>	PA 24-6 Pad	<b>North Reference:</b>	True
<b>Well:</b>	PA 33-6	<b>Survey Calculation Method:</b>	Minimum Curvature
<b>Wellbore:</b>	Wellbore #1		
<b>Design:</b>	Design #4 26Feb14 kjs		

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
Top Gas (50' Radius) PA - plan hits target center - Circle (radius 50.00)	0.00	0.00	4,431.00	1,581.23	712.89	1,604,762.30	2,283,340.10	39.46635	-108.03881

Casing Points					
Measured Depth (usft)	Vertical Depth (usft)	Name	Casing Diameter (in)	Hole Diameter (in)	
1,091.00	1,038.35	9 5/8"	9.625	12.250	

Formations						
Measured Depth (usft)	Vertical Depth (usft)	Name	Lithology	Dip (°)	Dip Direction (°)	
1,810.86	1,661.00	Top of "G" Sand				
1,926.47	1,761.00	Base of "G" Sand				
3,746.79	3,356.00	Mesaverde				
4,841.66	4,431.00	Approx. Top Gas				
6,276.66	5,866.00	Cameo Coals				
6,791.66	6,381.00	Rollins SS				
6,941.66	6,531.00	TD				

Plan Annotations					
Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates			
		+N/-S (usft)	+E/-W (usft)	Comment	
130.00	130.00	0.00	0.00	Start Build 3.50	
990.60	951.50	201.52	90.85	Hold 30.12 Inclination	
3,235.62	2,893.37	1,228.57	553.89	Start Drop -2.00	
4,741.66	4,331.00	1,581.23	712.89	Vertical	
4,841.66	4,431.00	1,581.23	712.89	Top Gas	
6,941.66	6,531.00	1,581.23	712.89	TD at 6941.66	