

1 General

1.1 Customer Information

Company	PICEANCE HL
Representative	Eric Kolstad
Address	1515 Arapahoe St., Suite 1000 Denver, CO 80202

1.2 Well Information

Well	TR 332-32-597	Wellbore No.	
Well Name	CHEVRON TR 332-32-597	Common Name	TR 332-32-597
Project	TR 32-05S-097W	Site	TR 41-32-597 Pad
Vertical Section Azimuth	195.80 (°)	North Reference	True
Origin N/S		Origin E/W	
Spud Date	8/12/2011	UWI	TR 332-32-597
Active Datum	KB @8,283.0ft (above Mean Sea Level)		

2 Survey Name

2.1 Survey Name: Survey #1

Survey Name	Survey #1	Company	
Date Started	8/12/2011	Ended	
Tool Name	MWD	Engineer	

2.1.1 Tie On Point

MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)
0.0	0.00	0.00	0.00	0.00	0.00

2.1.2 Survey Stations

Date	Type	MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLS (°/100ft)	Build Rate (°/100ft)	Turn (°/100ft)	TFace (°)
8/12/2011	Tie On	0.0	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
8/12/2011	NORMAL	89.0	0.50	301.40	89.00	0.20	-0.33	-0.10	0.56	0.56	0.00	301.40
	NORMAL	120.0	1.00	268.20	120.00	0.26	-0.72	-0.06	2.07	1.61	-107.10	301.59
	NORMAL	212.0	2.50	262.70	211.95	-0.02	-3.51	0.97	1.64	1.63	-5.98	350.86
	NORMAL	304.0	5.36	276.20	303.73	0.19	-9.77	2.48	3.25	3.11	14.67	24.74
	NORMAL	396.0	6.80	263.60	395.21	0.05	-19.46	5.25	2.13	1.57	-13.70	310.79
	NORMAL	488.0	8.60	264.50	486.38	-1.22	-31.72	9.81	1.96	1.96	0.98	4.28
	NORMAL	579.0	9.30	245.10	576.29	-4.97	-45.16	17.08	3.39	0.77	-21.32	273.35
	NORMAL	671.0	10.90	247.80	666.86	-11.38	-59.96	27.28	1.81	1.74	2.93	17.82
	NORMAL	763.0	11.60	250.20	757.09	-17.80	-76.72	38.02	0.92	0.76	2.61	34.96
8/13/2011	NORMAL	855.0	13.50	255.00	846.89	-23.72	-95.80	48.90	2.35	2.07	5.22	31.12
	NORMAL	946.0	15.90	256.90	934.91	-29.29	-118.20	60.37	2.69	2.64	2.09	12.28
	NORMAL	1,041.0	17.20	258.10	1,025.97	-35.14	-144.62	73.19	1.41	1.37	1.26	15.31
	NORMAL	1,137.0	20.10	258.30	1,116.92	-41.41	-174.67	87.40	3.02	3.02	0.21	1.36
	NORMAL	1,233.0	20.80	256.70	1,206.87	-48.68	-207.41	103.31	0.93	0.73	-1.67	320.64
	NORMAL	1,328.0	22.70	258.10	1,295.10	-56.34	-241.77	120.04	2.07	2.00	1.47	15.92
	NORMAL	1,424.0	24.70	259.70	1,383.00	-63.74	-279.63	137.47	2.19	2.08	1.67	18.56
	NORMAL	1,520.0	25.40	258.70	1,469.97	-71.36	-319.55	155.68	0.85	0.73	-1.04	328.38
	NORMAL	1,615.0	25.60	259.40	1,555.72	-79.13	-359.71	174.08	0.38	0.21	0.74	56.75
	NORMAL	1,711.0	25.10	258.30	1,642.48	-87.08	-400.03	192.71	0.72	-0.52	-1.15	222.79

2.1.2 Survey Stations (Continued)

Date	Type	MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLS (°/100ft)	Build Rate (°/100ft)	Turn (°/100ft)	TFace (°)
8/13/2011	NORMAL	1,807.0	24.90	258.80	1,729.48	-95.13	-439.80	211.29	0.30	-0.21	0.52	133.65
	NORMAL	1,901.0	24.30	258.10	1,814.95	-102.96	-478.13	229.26	0.71	-0.64	-0.74	205.59
	NORMAL	1,997.0	23.40	257.60	1,902.75	-111.13	-516.08	247.45	0.96	-0.94	-0.52	192.43
	NORMAL	2,093.0	23.60	258.18	1,990.79	-119.16	-553.51	265.37	0.32	0.21	0.60	49.41
	NORMAL	2,188.0	23.00	259.20	2,078.04	-126.53	-590.35	282.49	0.76	-0.63	1.07	146.55
	NORMAL	2,284.0	23.70	258.30	2,166.18	-133.96	-627.67	299.80	0.82	0.73	-0.94	332.58
8/16/2011	NORMAL	2,379.0	23.40	255.70	2,253.27	-142.49	-664.65	318.08	1.14	-0.32	-2.74	252.70
	NORMAL	2,474.0	24.40	256.90	2,340.12	-151.60	-702.04	337.02	1.17	1.05	1.26	26.48
	NORMAL	2,570.0	24.80	256.80	2,427.41	-160.69	-740.96	356.37	0.42	0.42	-0.10	354.01
	NORMAL	2,666.0	25.10	256.20	2,514.45	-170.15	-780.33	376.19	0.41	0.31	-0.63	319.57
	NORMAL	2,761.0	25.10	253.40	2,600.48	-180.71	-819.21	396.94	1.25	0.00	-2.95	268.73
	NORMAL	2,857.0	24.40	255.80	2,687.67	-191.39	-857.95	417.76	1.28	-0.73	2.50	125.95
	NORMAL	2,914.0	23.98	257.23	2,739.66	-196.84	-880.66	429.19	1.26	-0.74	2.51	126.28
	NORMAL	2,972.0	23.77	256.12	2,792.70	-202.25	-903.50	440.61	0.86	-0.36	-1.91	244.44
	NORMAL	3,036.0	22.46	257.62	2,851.56	-207.96	-927.96	452.77	2.24	-2.05	2.34	156.48
	NORMAL	3,132.0	21.45	261.22	2,940.60	-214.57	-963.23	468.73	1.75	-1.05	3.75	128.54
	NORMAL	3,227.0	23.99	263.51	3,028.22	-219.41	-999.59	483.29	2.83	2.67	2.41	20.26
	NORMAL	3,323.0	26.85	264.03	3,114.92	-223.87	-1,040.55	498.73	2.99	2.98	0.54	4.70
	NORMAL	3,418.0	26.81	263.86	3,199.69	-228.39	-1,083.19	514.70	0.09	-0.04	-0.18	242.39
	NORMAL	3,514.0	25.66	259.60	3,285.81	-234.46	-1,125.16	531.96	2.30	-1.20	-4.44	236.69
	NORMAL	3,609.0	23.64	258.50	3,372.15	-241.97	-1,164.06	549.78	2.18	-2.13	-1.16	192.30
	NORMAL	3,705.0	22.06	257.36	3,460.61	-249.76	-1,200.52	567.20	1.71	-1.65	-1.19	195.13
	NORMAL	3,800.0	20.17	257.18	3,549.23	-257.30	-1,233.90	583.54	1.99	-1.99	-0.19	181.88
	NORMAL	3,896.0	19.25	256.83	3,639.61	-264.57	-1,265.44	599.13	0.97	-0.96	-0.36	187.15
	NORMAL	3,992.0	18.24	256.74	3,730.51	-271.63	-1,295.48	614.10	1.05	-1.05	-0.09	181.60
	NORMAL	4,087.0	17.23	256.65	3,821.00	-278.28	-1,323.64	628.17	1.06	-1.06	-0.09	181.51
	NORMAL	4,182.0	17.40	260.34	3,911.69	-283.92	-1,351.33	641.13	1.17	0.18	3.88	82.97
	NORMAL	4,278.0	16.61	260.08	4,003.50	-288.69	-1,379.00	653.26	0.83	-0.82	-0.27	185.37
	NORMAL	4,374.0	14.77	260.78	4,095.92	-293.01	-1,404.60	664.39	1.93	-1.92	0.73	174.46
	NORMAL	4,469.0	14.15	260.61	4,187.91	-296.85	-1,428.01	674.45	0.65	-0.65	-0.18	183.83
	NORMAL	4,565.0	14.65	258.59	4,280.89	-301.17	-1,451.48	685.00	0.74	0.52	-2.10	313.88
	NORMAL	4,660.0	13.71	258.23	4,372.99	-305.84	-1,474.28	695.70	0.99	-0.99	-0.38	185.19
	NORMAL	4,756.0	13.01	259.11	4,466.40	-310.20	-1,496.03	705.82	0.76	-0.73	0.92	164.23
	NORMAL	4,851.0	12.04	258.94	4,559.13	-314.12	-1,516.25	715.10	1.02	-1.02	-0.18	182.09
	NORMAL	4,947.0	11.21	258.06	4,653.16	-317.97	-1,535.21	723.97	0.88	-0.86	-0.92	191.63
	NORMAL	5,042.0	8.57	261.57	4,746.74	-320.92	-1,551.25	731.17	2.85	-2.78	3.69	168.86
	NORMAL	5,138.0	8.09	261.49	4,841.73	-322.97	-1,565.01	736.89	0.50	-0.50	-0.08	181.34
	NORMAL	5,233.0	6.64	256.92	4,935.95	-325.20	-1,576.97	742.29	1.65	-1.53	-4.81	199.74
	NORMAL	5,329.0	5.88	254.51	5,031.37	-327.77	-1,587.11	747.53	0.84	-0.79	-2.51	197.88
	NORMAL	5,333.0	5.58	252.50	5,035.35	-327.88	-1,587.50	747.74	9.02	-7.50	-50.25	212.78
	NORMAL	5,425.0	4.43	247.42	5,127.00	-330.59	-1,595.04	752.40	1.34	-1.25	-5.52	198.56
8/17/2011	NORMAL	5,520.0	1.32	213.41	5,221.87	-332.92	-1,599.03	755.72	3.60	-3.27	-35.80	192.49
	NORMAL	5,616.0	0.80	95.99	5,317.87	-333.91	-1,598.98	756.66	1.91	-0.54	-122.31	202.81
	NORMAL	5,712.0	1.01	271.42	5,413.86	-333.96	-1,599.16	756.76	1.88	0.22	182.74	177.45
	NORMAL	5,807.0	1.32	252.87	5,508.84	-334.26	-1,601.04	757.56	0.51	0.33	-19.53	299.90
	NORMAL	5,894.0	1.50	244.26	5,595.82	-335.05	-1,603.02	758.86	0.32	0.21	-9.90	305.99
	NORMAL	5,989.0	1.01	315.89	5,690.80	-334.99	-1,604.73	759.27	1.60	-0.52	75.40	140.95
	NORMAL	6,085.0	1.58	56.79	5,786.78	-333.66	-1,604.21	757.84	2.11	0.59	105.10	130.14
	NORMAL	6,180.0	1.76	51.95	5,881.74	-332.04	-1,601.96	755.68	0.24	0.19	-5.09	319.48
	NORMAL	6,276.0	0.57	148.55	5,977.73	-331.54	-1,600.55	754.81	1.99	-1.24	100.63	162.76
	NORMAL	6,372.0	0.75	165.07	6,073.72	-332.55	-1,600.14	755.68	0.27	0.19	17.21	55.05
	NORMAL	6,467.0	0.62	132.02	6,168.71	-333.50	-1,599.60	756.44	0.43	-0.14	-34.79	235.74
	NORMAL	6,562.0	1.01	308.50	6,263.71	-333.32	-1,599.87	756.34	1.72	0.41	185.77	177.82
	NORMAL	6,658.0	0.79	287.15	6,359.70	-332.60	-1,601.17	756.00	0.41	-0.23	-22.24	226.37
	NORMAL	6,753.0	0.66	300.60	6,454.69	-332.13	-1,602.26	755.84	0.22	-0.14	14.16	133.97
	NORMAL	6,849.0	0.62	288.29	6,550.68	-331.68	-1,603.23	755.68	0.15	-0.04	-12.82	247.68
	NORMAL	6,944.0	0.57	271.07	6,645.68	-331.51	-1,604.19	755.78	0.19	-0.05	-18.13	245.88

2.1.2 Survey Stations (Continued)

Date	Type	MD (ft)	Inc (°)	Azi (°)	TVD (ft)	N/S (ft)	E/W (ft)	V. Sec (ft)	DLS (%/100ft)	Build Rate (%/100ft)	Turn (%/100ft)	TFace (°)
8/17/2011	NORMAL	7,040.0	0.62	273.00	6,741.67	-331.48	-1,605.19	756.01	0.06	0.05	2.01	22.81
	NORMAL	7,136.0	0.88	283.81	6,837.67	-331.27	-1,606.42	756.15	0.31	0.27	11.26	34.03
	NORMAL	7,231.0	1.28	249.80	6,932.65	-331.47	-1,608.13	756.80	0.78	0.42	-35.80	284.20
8/18/2011	NORMAL	7,327.0	0.62	174.91	7,028.64	-332.35	-1,609.09	757.92	1.32	-0.69	-78.01	208.16
	NORMAL	7,422.0	0.48	167.18	7,123.63	-333.25	-1,608.95	758.75	0.17	-0.15	-8.14	204.10
	NORMAL	7,517.0	1.05	200.05	7,218.63	-334.46	-1,609.16	759.97	0.73	0.60	34.60	54.80
	NORMAL	7,613.0	1.32	236.70	7,314.61	-335.89	-1,610.39	761.68	0.82	0.28	38.18	89.34
	NORMAL	7,708.0	0.92	256.21	7,409.59	-336.68	-1,612.05	762.88	0.58	-0.42	20.54	145.84
	NORMAL	7,804.0	0.83	90.10	7,505.58	-336.86	-1,612.10	763.08	1.81	-0.09	-173.03	186.59
	NORMAL	7,899.0	0.75	240.48	7,600.58	-337.17	-1,611.95	763.33	1.61	-0.08	158.29	165.96
	NORMAL	7,995.0	1.05	79.38	7,696.58	-337.32	-1,611.63	763.39	1.85	0.31	-167.81	191.04
	NORMAL	8,090.0	1.10	62.85	7,791.56	-336.74	-1,609.97	762.38	0.33	0.05	-17.40	270.83
	NORMAL	8,186.0	0.92	56.26	7,887.55	-335.89	-1,608.51	761.16	0.22	-0.19	-6.86	209.57
	NORMAL	8,282.0	0.97	40.26	7,983.53	-334.84	-1,607.34	759.84	0.28	0.05	-16.67	272.66
	NORMAL	8,377.0	0.57	28.84	8,078.52	-333.81	-1,606.59	758.65	0.45	-0.42	-12.02	195.34
	NORMAL	8,473.0	0.57	9.59	8,174.52	-332.93	-1,606.28	757.71	0.20	0.00	-20.05	260.38
	NORMAL	8,568.0	0.57	309.03	8,269.51	-332.16	-1,606.57	757.05	0.61	0.00	-63.75	239.72
	NORMAL	8,635.0	0.57	309.03	8,336.51	-331.74	-1,607.09	756.79	0.00	0.00	0.00	0.00