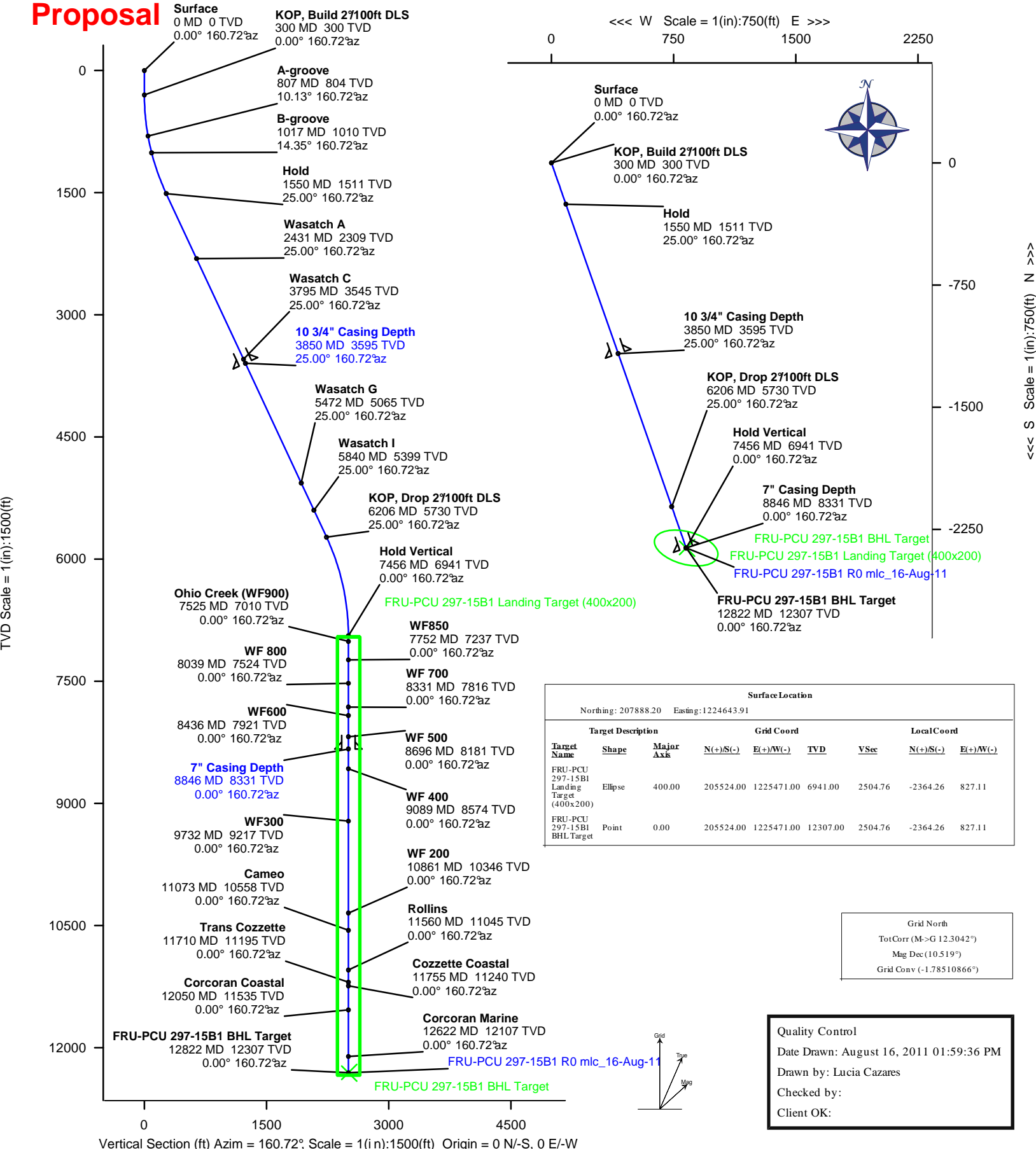


WELL	FRU-PCU 297-15B1	FIELD	CO, Rio Blanco County	STRUCTURE	15-2S-97W H&P 215
Magnetic Parameters Model: BGGM 2011 Dip: 65.989° Mag Dec: 10.519°		Surface Location Lat: N 39 52 15.171 Lon: W 108 15 45.919		Miscellaneous Slot: FRU-PCU 297-15B1 Plan: FRU-PCU 297-15B1 R0 mlc_16-Aug-11	
Date: August 16, 2011 FS: 52366.9m		NAD27 Colorado State Plane, Northern Zone, US Feet Northing: 207888.20 IUS Easting: 1224643.91 IUS Grid Conv: -1.78510866° Scale Fact: 0.99997869		TVD Ref: KB(6670ft above MSL) August 16, 2011	

Proposal





FRU-PCU 297-15B1 R0 mlc_16-Aug-11 Proposal Report
(Non-Def Plan)



Report Date: August 16, 2011 - 02:57 PM
Client: ExxonMobil
Field: CO, Rio Blanco County (NAD 27 NZ) Exxon Mobil 2011
Structure / Slot: ExxonMobil 15-2S-97W (FRU-PCU 297-15B) / FRU-PCU 297-15B1
Well: FRU-PCU 297-15B1
Borehole: Original Borehole
UWI / API#: Unknown / Unknown
Survey Name: FRU-PCU 297-15B1 R0 mlc_16-Aug-11
Survey Date: August 16, 2011
Tort / AHD / DDI / ERD Ratio: 50.002 ° / 2504.539 ft / 5.116 / 0.204
Coordinate Reference System: NAD27 Colorado State Plane, Northern Zone, US Feet
Location Lat / Long: N 39° 52' 15.17096", W 108° 15' 45.91920"
Location Grid N/E Y/X: N 207888.202 ftUS, E 1224643.913 ftUS
CRS Grid Convergence Angle: -1.78510866 °
Grid Scale Factor: 0.99997869

Survey / DLS Computation: Minimum Curvature / Lubinski
Vertical Section Azimuth: 160.719 ° (Grid North)
Vertical Section Origin: 0.000 ft, 0.000 ft
TVD Reference Datum: KB
TVD Reference Elevation: 6670.000 ft above MSL
Seabed / Ground Elevation: 6643.000 ft above MSL
Magnetic Declination: 10.519 °
Total Field Strength: 52366.923 nT
Magnetic Dip Angle: 65.989 °
Declination Date: August 16, 2011
Magnetic Declination Model: BGGM 2011
North Reference: Grid North
Grid Convergence Used: -1.785 °
Total Corr Mag North->Grid North: 12.304 °
Local Coord Referenced To: Structure Reference Point

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
Surface	0.00	0.00	160.72	0.00	0.00	0.00	0.00	N/A	207888.20	1224643.91	N 39 52 15.17	W 108 15 45.92
Marker MudLine	27.00	0.00	160.72	27.00	0.00	0.00	0.00	0.00	207888.20	1224643.91	N 39 52 15.17	W 108 15 45.92
	100.00	0.00	160.72	100.00	0.00	0.00	0.00	0.00	207888.20	1224643.91	N 39 52 15.17	W 108 15 45.92
	200.00	0.00	160.72	200.00	0.00	0.00	0.00	0.00	207888.20	1224643.91	N 39 52 15.17	W 108 15 45.92
KOP, Build 2°/100ft DLS	300.00	0.00	160.72	300.00	0.00	0.00	0.00	0.00	207888.20	1224643.91	N 39 52 15.17	W 108 15 45.92
	400.00	2.00	160.72	399.98	1.75	-1.65	0.58	2.00	207886.55	1224644.49	N 39 52 15.15	W 108 15 45.91
	500.00	4.00	160.72	499.84	6.98	-6.59	2.30	2.00	207881.62	1224646.22	N 39 52 15.11	W 108 15 45.89
	600.00	6.00	160.72	599.45	15.69	-14.81	5.18	2.00	207873.39	1224649.10	N 39 52 15.03	W 108 15 45.85
	700.00	8.00	160.72	698.70	27.88	-26.32	9.21	2.00	207861.89	1224653.12	N 39 52 14.91	W 108 15 45.79
	800.00	10.00	160.72	797.47	43.52	-41.08	14.37	2.00	207847.12	1224658.28	N 39 52 14.77	W 108 15 45.72
A-groove	806.64	10.13	160.72	804.00	44.68	-42.18	14.75	2.00	207846.03	1224658.67	N 39 52 14.76	W 108 15 45.71
	900.00	12.00	160.72	895.62	62.60	-59.09	20.67	2.00	207829.11	1224664.58	N 39 52 14.59	W 108 15 45.63
	1000.00	14.00	160.72	993.06	85.10	-80.32	28.10	2.00	207807.88	1224672.01	N 39 52 14.39	W 108 15 45.53
B-groove	1017.48	14.35	160.72	1010.00	89.38	-84.36	29.51	2.00	207803.84	1224673.43	N 39 52 14.35	W 108 15 45.51
	1100.00	16.00	160.72	1089.64	110.98	-104.75	36.65	2.00	207783.45	1224680.56	N 39 52 14.15	W 108 15 45.41
	1200.00	18.00	160.72	1185.27	140.21	-132.35	46.30	2.00	207755.86	1224690.21	N 39 52 13.88	W 108 15 45.27
	1300.00	20.00	160.72	1279.82	172.77	-163.08	57.05	2.00	207725.13	1224700.96	N 39 52 13.58	W 108 15 45.12
	1400.00	22.00	160.72	1373.17	208.60	-196.90	68.88	2.00	207691.30	1224712.79	N 39 52 13.25	W 108 15 44.96
	1500.00	24.00	160.72	1465.21	247.67	-233.78	81.78	2.00	207654.43	1224725.70	N 39 52 12.89	W 108 15 44.78
Hold	1550.06	25.00	160.72	1510.76	268.43	-253.38	88.64	2.00	207634.83	1224732.55	N 39 52 12.70	W 108 15 44.68
	1600.00	25.00	160.72	1556.03	289.54	-273.30	95.61	0.00	207614.91	1224739.52	N 39 52 12.50	W 108 15 44.58
	1700.00	25.00	160.72	1646.66	331.80	-313.19	109.56	0.00	207575.02	1224753.47	N 39 52 12.11	W 108 15 44.39
	1800.00	25.00	160.72	1737.29	374.07	-353.09	123.52	0.00	207535.12	1224767.43	N 39 52 11.72	W 108 15 44.19
	1900.00	25.00	160.72	1827.92	416.33	-392.98	137.48	0.00	207495.23	1224781.39	N 39 52 11.33	W 108 15 44.00
	2000.00	25.00	160.72	1918.55	458.59	-432.87	151.43	0.00	207455.34	1224795.34	N 39 52 10.94	W 108 15 43.81
	2100.00	25.00	160.72	2009.18	500.86	-472.76	165.39	0.00	207415.45	1224809.30	N 39 52 10.55	W 108 15 43.61
	2200.00	25.00	160.72	2099.81	543.12	-512.66	179.34	0.00	207375.56	1224823.25	N 39 52 10.16	W 108 15 43.42
	2300.00	25.00	160.72	2190.44	585.39	-552.55	193.30	0.00	207335.66	1224837.21	N 39 52 9.77	W 108 15 43.22
	2400.00	25.00	160.72	2281.07	627.65	-592.44	207.25	0.00	207295.77	1224851.16	N 39 52 9.38	W 108 15 43.03
Wasatch A	2430.82	25.00	160.72	2309.00	640.68	-604.74	211.56	0.00	207283.48	1224855.46	N 39 52 9.26	W 108 15 42.97
	2500.00	25.00	160.72	2371.70	669.91	-632.34	221.21	0.00	207255.88	1224865.12	N 39 52 8.99	W 108 15 42.83
	2600.00	25.00	160.72	2462.33	712.18	-672.23	235.17	0.00	207215.99	1224879.07	N 39 52 8.60	W 108 15 42.64
	2700.00	25.00	160.72	2552.96	754.44	-712.12	249.12	0.00	207176.10	1224893.03	N 39 52 8.21	W 108 15 42.44
	2800.00	25.00	160.72	2643.59	796.70	-752.02	263.08	0.00	207136.20	1224906.98	N 39 52 7.82	W 108 15 42.25
	2900.00	25.00	160.72	2734.22	838.97	-791.91	277.03	0.00	207096.31	1224920.94	N 39 52 7.43	W 108 15 42.05
	3000.00	25.00	160.72	2824.85	881.23	-831.80	290.99	0.00	207056.42	1224934.90	N 39 52 7.04	W 108 15 41.86
	3100.00	25.00	160.72	2915.48	923.49	-871.69	304.95	0.00	207016.53	1224948.85	N 39 52 6.65	W 108 15 41.66
	3200.00	25.00	160.72	3006.11	965.76	-911.59	318.90	0.00	206976.64	1224962.81	N 39 52 6.26	W 108 15 41.47
	3300.00	25.00	160.72	3096.74	1008.02	-951.48	332.86	0.00	206936.74	1224976.76	N 39 52 5.87	W 108 15 41.27
	3400.00	25.00	160.72	3187.37	1050.29	-991.37	346.81	0.00	206896.85	1224990.72	N 39 52 5.48	W 108 15 41.08
	3500.00	25.00	160.72	3278.00	1092.55	-1031.27	360.77	0.00	206856.96	1225004.67	N 39 52 5.10	W 108 15 40.88
	3600.00	25.00	160.72	3368.63	1134.81	-1071.16	374.72	0.00	206817.07	1225018.63	N 39 52 4.71	W 108 15 40.69
	3700.00	25.00	160.72	3459.26	1177.08	-1111.05	388.68	0.00	206777.18	1225032.58	N 39 52 4.32	W 108 15 40.49
Wasatch C	3794.61	25.00	160.72	3545.00	1217.06	-1148.79	401.88	0.00	206739.43	1225045.79	N 39 52 3.95	W 108 15 40.31
	3800.00	25.00	160.72	3549.89	1219.34	-1150.94	402.64	0.00	206737.28	1225046.54	N 39 52 3.93	W 108 15 40.30
10 3/4" Casing Depth	3849.78	25.00	160.72	3595.00	1240.38	-1170.80	409.58	0.00	206717.43	1225053.49	N 39 52 3.73	W 108 15 40.20
	3900.00	25.00	160.72	3640.52	1261.60	-1190.84	416.59	0.00	206697.39	1225060.50	N 39 52 3.54	W 108 15 40.10
	4000.00	25.00	160.72	3731.15	1303.87	-1230.73	430.55	0.00	206657.50	1225074.45	N 39 52 3.15	W 108 15 39.91
	4100.00	25.00	160.72	3821.78	1346.13	-1270.62	444.50	0.00	206617.61	1225088.41	N 39 52 2.76	W 108 15 39.71
	4200.00	25.00	160.72	3912.41	1388.39	-1310.52	458.46	0.00	206577.72	1225102.36	N 39 52 2.37	W 108 15 39.52
	4300.00	25.00	160.72	4003.04	1430.66	-1350.41	472.41	0.00	206537.82	1225116.32	N 39 52 1.98	W 108 15 39.32
	4400.00	25.00	160.72	4093.67	1472.92	-1390.30	486.37	0.00	206497.93	1225130.27	N 39 52 1.59	W 108 15 39.13
	4500.00	25.00	160.72	4184.30	1515.19	-1430.20	500.33	0.00	206458.04	1225144.23	N 39 52 1.20	W 108 15 38.93
	4600.00	25.00	160.72	4274.93	1557.45	-1470.09	514.28	0.00	206418.15	1225158.18	N 39 52 0.81	W 108 15 38.74
	4700.00	25.00	160.72	4365.56	1599.71	-1509.98	528.24	0.00	206378.26	1225172.14	N 39 52 0.42	W 108 15 38.54
	4800.00	25.00	160.72	4456.19	1641.98	-1549.87	542.19	0.00	206338.36	1225186.09	N 39 52 0.03	W 108 15 38.35
	4900.00	25.00	160.72	4546.82	1684.24	-1589.77	556.15	0.00	206298.47	1225200.05	N 39 51 59.64	W 108 15 38.16
	5000.00	25.00	160.72	4637.45	1726.50	-1629.66	570.11	0.00	206258.58	1225214.01	N 39 51 59.25	W 108 15 37.96
	5100.00	25.00	160.72	4728.07	1768.77	-1669.55	584.06	0.00	206218.69	1225227.96	N 39 51 58.86	W 108 15 37.77
	5200.00	25.00	160.72	4818.70	1811.03	-1709.45	598.02	0.00	206178.80	1225241.92	N 39 51 58.47	W 108 15 37.57
	5300.00	25.00	160.72	4909.33	1853.29	-1749.34	611.97	0.00	206138.90	1225255.87	N 39 51 58.08	W 108 15 37.38
	5400.00	25.00	160.72	4999.96	1895.56	-1789.23	625.93	0.00	206099.01	1225269.83	N 39 51 57.69	W 108 15 37.18
Wasatch G	5471.76	25.00	160.72	5065.00	1925.89	-1817.86	635.94	0.00	206070.38	1225279.84	N 39 51 57.41	W 108 15 37.04
	5500.00	25.00	160.72	5090.59	1937.82	-1829.13	639.88	0.00	206059.12	1225283.78	N 39 51 57.30	W 108 15 36.99
	5600.00	25.00	160.72	5181.22	1980.09	-1869.02	653.84	0.00	206019.23	1225297.74	N 39 51 56.91	W 108 15 36.79

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)		Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
Wasatch I	5700.00	25.00	160.72	5271.85	2022.35	-1908.91	667.80	0.00	205979.33	1225311.69	N	39 51 56.52	W 108 15 36.60
	5800.00	25.00	160.72	5362.48	2064.61	-1948.80	681.75	0.00	205939.44	1225325.65	N	39 51 56.13	W 108 15 36.40
	5840.29	25.00	160.72	5399.00	2081.64	-1964.88	687.37	0.00	205923.37	1225331.27	N	39 51 55.97	W 108 15 36.32
	5900.00	25.00	160.72	5453.11	2106.88	-1988.70	695.71	0.00	205899.55	1225339.60	N	39 51 55.74	W 108 15 36.21
	6000.00	25.00	160.72	5543.74	2149.14	-2028.59	709.66	0.00	205859.66	1225353.56	N	39 51 55.35	W 108 15 36.01
KOP, Drop 2°/100ft DLS	6100.00	25.00	160.72	5634.37	2191.40	-2068.48	723.62	0.00	205819.77	1225367.52	N	39 51 54.96	W 108 15 35.82
	6200.00	25.00	160.72	5725.00	2233.67	-2108.38	737.58	0.00	205779.87	1225381.47	N	39 51 54.57	W 108 15 35.62
	6205.77	25.00	160.72	5730.24	2236.11	-2110.68	738.38	0.00	205777.57	1225382.28	N	39 51 54.55	W 108 15 35.61
	6300.00	23.12	160.72	5816.27	2274.52	-2146.94	751.06	2.00	205741.31	1225394.96	N	39 51 54.19	W 108 15 35.43
	6400.00	21.12	160.72	5908.91	2312.17	-2182.47	763.50	2.00	205705.78	1225407.39	N	39 51 53.85	W 108 15 35.26
	6500.00	19.12	160.72	6002.81	2346.56	-2214.94	774.85	2.00	205673.32	1225418.75	N	39 51 53.53	W 108 15 35.10
	6600.00	17.12	160.72	6097.84	2377.65	-2244.28	785.12	2.00	205643.97	1225429.01	N	39 51 53.24	W 108 15 34.96
	6700.00	15.12	160.72	6193.91	2405.41	-2270.49	794.29	2.00	205617.77	1225438.18	N	39 51 52.99	W 108 15 34.83
	6800.00	13.12	160.72	6290.88	2429.80	-2293.51	802.34	2.00	205594.75	1225446.23	N	39 51 52.76	W 108 15 34.72
	6900.00	11.12	160.72	6388.65	2450.79	-2313.32	809.27	2.00	205574.94	1225453.16	N	39 51 52.57	W 108 15 34.62
	7000.00	9.12	160.72	6487.09	2468.35	-2329.90	815.07	2.00	205558.36	1225458.96	N	39 51 52.41	W 108 15 34.54
	7100.00	7.12	160.72	6586.08	2482.47	-2343.22	819.73	2.00	205545.03	1225463.63	N	39 51 52.28	W 108 15 34.48
	7200.00	5.12	160.72	6685.51	2493.12	-2353.28	823.25	2.00	205534.98	1225467.14	N	39 51 52.18	W 108 15 34.43
	7300.00	3.12	160.72	6785.25	2500.30	-2360.06	825.62	2.00	205528.20	1225469.51	N	39 51 52.11	W 108 15 34.39
	7400.00	1.12	160.72	6885.17	2504.00	-2363.54	826.84	2.00	205524.72	1225470.73	N	39 51 52.08	W 108 15 34.38
Hold Vertical	7455.83	0.00	160.72	6941.00	2504.54	-2364.06	827.02	2.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
Ohio Creek (WF900)	7500.00	0.00	160.72	6985.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	7524.83	0.00	160.72	7010.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	7600.00	0.00	160.72	7085.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	7700.00	0.00	160.72	7185.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
WF850	7751.83	0.00	160.72	7237.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
WF 800	7800.00	0.00	160.72	7285.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	7900.00	0.00	160.72	7385.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8000.00	0.00	160.72	7485.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8038.83	0.00	160.72	7524.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
WF 700	8100.00	0.00	160.72	7585.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8200.00	0.00	160.72	7685.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8300.00	0.00	160.72	7785.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8330.83	0.00	160.72	7816.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8400.00	0.00	160.72	7885.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
WF600	8435.83	0.00	160.72	7921.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
WF 500	8500.00	0.00	160.72	7985.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8600.00	0.00	160.72	8085.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8695.83	0.00	160.72	8181.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8700.00	0.00	160.72	8185.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
7" Casing Depth	8800.00	0.00	160.72	8285.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8845.83	0.00	160.72	8331.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	8900.00	0.00	160.72	8385.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	9000.00	0.00	160.72	8485.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
WF 400	9088.83	0.00	160.72	8574.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	9100.00	0.00	160.72	8585.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	9200.00	0.00	160.72	8685.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N	39 51 52.07	W 108 15 34.37
	9300.00	0.00	160.72	8785.17	2504.54	-2364.06	827.02</						

Comments	MD (ft)	Incl (°)	Azim Grid (°)	TVD (ft)	VSEC (ft)	NS (ft)	EW (ft)	DLS (°/100ft)	Northing (ftUS)	Easting (ftUS)	Latitude (N/S ° ' ")	Longitude (E/W ° ' ")
Corcoran Marine	12600.00	0.00	160.72	12085.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N 39 51 52.07	W 108 15 34.37
	12621.83	0.00	160.72	12107.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N 39 51 52.07	W 108 15 34.37
	12700.00	0.00	160.72	12185.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N 39 51 52.07	W 108 15 34.37
FRU-PCU 297-15B1 BHL Target	12800.00	0.00	160.72	12285.17	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N 39 51 52.07	W 108 15 34.37
	12821.83	0.00	160.72	12307.00	2504.54	-2364.06	827.02	0.00	205524.20	1225470.91	N 39 51 52.07	W 108 15 34.37

Survey Type: Non-Def Plan

Survey Error Model: ISCWSA Rev 0 *** 3-D 95.000% Confidence 2.7955 sigma

Survey Program:

Description	MD From (ft)	MD To (ft)	EOU Freq (ft)	Survey Tool Type	Borehole / Survey
	0.000	27.000	1/100.000	SLB_NSG+SSHOT-Depth Only	Original Borehole / FRU-PCU 297-15B1 R0 mlc_16-Aug-11
	27.000	1200.000	1/100.000	SLB_NSG+SSHOT	Original Borehole / FRU-PCU 297-15B1 R0 mlc_16-Aug-11
	1200.000	7455.830	1/100.000	SLB_MWD-STD	Original Borehole / FRU-PCU 297-15B1 R0 mlc_16-Aug-11
	7455.830	12821.830	1/100.000	SLB_INC-ONLY	Original Borehole / FRU-PCU 297-15B1 R0 mlc_16-Aug-11