

Date of Excavation	Joint No.	Relative Distance to U/S GW (m)	Length of Excavation (m)	Purpose	Repair Type	Existing Stress concentrator	Location of Concentrator relative to GW	Comments	Lat: deg, min, s	Lon: deg, min, s	Altitude/ m	Latitude	Longitude	Northing [UTM Zone 47N]	Easting [UTM Zone 47N]
2010	780	790.5	0.8	Corrosion	Recoat	20 DEG BEND-COLD RIGHT	796.11	Excavation length to be confirmed	58° 26' 29.348"	-119° 12' 12.760"	453.11	58.44148546	-119.20354444	6479971.875	371371.560
2010	10340	14446.8	2.2	Corrosion	Recoat	no		Excavation length to be confirmed	58° 21' 42.091"	-119° 1' 36.620"	485.11	58.36169208	-119.02683893	6470765.611	381416.715
2011	19750	28833.51	2.40	Corrosion	Recoat	no			58° 16' 5.523"	-118° 51' 34.152"	507.48	58.26820084	-118.85948670	6460076.106	390918.795
2011	23040	33797.56	2.00	Corrosion	Recoat	no			58° 14' 8.350"	-118° 48' 7.124"	493.03	58.23565273	-118.80197896	6456361.383	394194.881
2009	24000	35113.5	15.7	Corrosion	Petro-Sleeve	no			58° 13' 37.781"	-118° 47' 11.271"	504.56	58.22716134	-118.78646414	6455391.921	395080.654
2009	24710	36185.8	3.0	Corrosion	Petro-Sleeve	no			58° 13' 12.849"	-118° 46' 25.832"	511.97	58.22023572	-118.77384224	6454601.424	395801.538
2009	24720	36198.6	7.0	Corrosion	Recoat	GROUND ANCHOR	36199.75		58° 13' 12.551"	-118° 46' 25.290"	511.93	58.22015311	-118.77369156	6454591.996	395810.146
2009	60130	88397.0	5.5	Corrosion	Recoat	no			57° 53' 3.602"	-118° 9' 37.638"	411.10	57.88433398	-118.16045497	6416423.073	431187.424
2009	60140	88415.3	2.0	Corrosion	Recoat	no			57° 53' 3.369"	-118° 9' 36.623"	410.52	57.88426908	-118.16017319	6416415.562	431204.008
2009	94930	142464.1	3.3	Corrosion	Recoat	no			57° 34' 14.904"	-117° 28' 33.275"	484.25	57.57080662	-117.47590968	6381028.145	471533.708
2009	94940	142477.8	8.8	Corrosion	Petro-Sleeve	15 DEG BEND-COLD RIGHT	142486.46		57° 34' 14.927"	-117° 28' 32.451"	484.59	57.57081300	-117.47568073	6381028.759	471547.407
2009	94950	142490.9	6.8	Corrosion	Recoat	15 DEG BEND-COLD RIGHT	142495.45		57° 34' 14.904"	-117° 28' 31.678"	484.67	57.57080656	-117.47546601	6381027.952	471560.245
2011	105750	157107.7	1.70	Corrosion	Recoat	no		Concrete weight noted in report	57° 28' 2.313"	-117° 19' 43.223"	450.86	57.46730908	-117.32867300	639454.211	480284.788
2011	106460	158202.4	5.5	Corrosion	Recoat	no		3 separate holes largest 2.2 m	57° 27' 32.551"	-117° 19' 7.951"	448.82	57.45904189	-117.31887532	6368531.083	480868.174
2011	106480	158238.43	3.00	Corrosion	Recoat	no		2 separate bellholes - largest 1.9m	57° 27' 31.576"	-117° 19' 6.773"	449.01	57.41854792	-117.31854792	6368500.851	480887.676
2011	106500	158275.02	1.40	Corrosion	Recoat	no		Swamp Weight	57° 27' 30.581"	-117° 19' 5.581"	448.78	57.45849481	-117.31821698	6368469.996	480907.388
2011	106940	158926.46	7.00	Corrosion	Recoat	no		3 separate bellholes largest 2.6 m	57° 27' 12.879"	-117° 18' 44.575"	448.55	57.45357763	-117.31238194	6367920.977	481254.966
2011	108070	160730.80	2.40	Corrosion	Recoat	no			57° 26' 23.859"	-117° 17' 46.333"	446.53	57.43996097	-117.29620349	6366400.788	482219.173
2009	108680	161701.0	8.4	Corrosion	Petro-Sleeve	no			57° 25' 57.503"	-117° 17' 15.033"	446.13	57.43263976	-117.28750930	6365583.532	482737.629
2011	108740	161810.12	1.90	Corrosion	Recoat	no		2 separate bellholes - largest 1.1m	57° 25' 54.521"	-117° 17' 11.541"	445.81	57.43818152	-117.28653923	6365491.084	482795.484

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2009	1950	2134.5	4.8	Corrosion	Recoat	no			56° 51' 48.078"	-116° 32' 17.259"	656.80700000	56.86335487	-116.53812739	6302270.43488253	528160.41162482
2009	3880	4322.3	3.18	Corrosion	Recoat	METAL OBJECT	4330.8	Metal Object Not exposed	56° 50' 50.49881"	-116° 31' 2.933"	671.89200000	56.84718906	-116.51748140	6300479.68704556	529431.87629336
2009	3890	4334.5	0.6	Corrosion	Recoat	no		Exposed with 3880	56° 50' 49.554"	-116° 31' 2.524"	672.02800000	56.84709844	-116.51736789	6300469.64886407	529438.87106221
2009	4010	4469.4	3.1	Corrosion	Petro-Sleeve	No			56° 50' 45.951"	-116° 30' 57.955"	674.67700000	56.84609747	-116.51609871	6300358.7768650	529517.07370590
2009	10450	11918.6	3.1	Corrosion	Petro-Sleeve	no			56° 47' 28.707"	-116° 26' 46.925"	673.74636795	56.79130748	-116.44636795	6294292.34530557	533819.79219487
2009	11650	13311.1	2	Corrosion	Recoat	GROUND ANCHOR	13311.8	Ground Anchor not exposed	56° 46' 50.234"	-116° 26' 2.340"	664.89200000	56.78062048	-116.43398328	6293108.96744887	534586.15839352
2009	12000	13706.8	5.3	Corrosion	Recoat	GROUND ANCHOR	13718.9	Ground Anchor not exposed	56° 46' 39.160"	-116° 25' 50.094"	666.55500000	56.77754446	-116.43058169	6292768.30118018	534796.85477051
2009	12870	14725.2	2.5	Corrosion	Petro-Sleeve	no			56° 46' 10.683"	-116° 25' 18.656"	669.95000000	56.76963419	-116.42184894	6291892.28767244	535337.93374461
2009	12950	14823.3	4.6	Corrosion	Petro-Sleeve	GROUND ANCHOR	14827.8	Ground Anchor not exposed	56° 46' 7.937"	-116° 25' 15.639"	670.23500000	56.76887127	-116.42101086	6291807.80055985	535389.87627406
2009	14060	16086.5	1.6	Corrosion	Petro-Sleeve	no			56° 45' 32.665"	-116° 24' 36.763"	659.93900000	56.75907372	-116.41021204	6290722.87901792	536059.31923627
2009	14160	16196.8	2	Corrosion	Recoat	no			56° 45' 29.810"	-116° 24' 32.850"	659.22100000	56.75828063	-116.40912496	6290635.17399640	536126.54322961
2009	17430	19964.8	3.1	Corrosion	Recoat	no			56° 44' 0.322"	-116° 22' 0.001"	671.12700000	56.73342274	-116.36666698	6287891.48558212	538747.99243014
2009	20220	23023.7	5.4	Corrosion	Petro-Sleeve	no			56° 42' 45.781"	-116° 20' 0.326"	644.20100000	56.71271702	-116.33423398	6285606.07764693	540804.21642338
2009	27170	30700.8	3	Corrosion	Petro-Sleeve	GROUND ANCHOR	30710.7	Ground Anchor not exposed	56° 39' 33.409"	-116° 15' 11.905"	674.25800000	56.65928031	-116.25330699	6279708.81702417	545873.22510751
2009	28510	32170.2	2.2	Corrosion	Recoat	GROUND ANCHOR	32173.7	Ground Anchor not exposed	56° 38' 56.555"	-116° 14' 16.868"	667.01700000	56.64904304	-116.23801897	6278579.66347611	546723.03816915
2009	28520	32182.5	1.8	Corrosion	Recoat	GROUND ANCHOR	32185.8	Removed Ground Anchor	56° 38' 56.250"	-116° 14' 14.033"	667.00500000	56.64895823	-116.23788960	6278570.31182177	546731.07556486
2009	28860	32580.8	2.93	Corrosion	Petro-Sleeve	GROUND ANCHOR	32600.6	Ground Anchor not exposed	56° 38' 45.960"	-116° 14' 1.052"	664.95200000	56.64609989	-116.23362556	6278255.07738425	546996.08659453
2009	30480	34505.5	3.7	Corrosion	Recoat	no			56° 37' 57.960"	-116° 12' 49.574"	664.21500000	56.63276673	-116.21377062	6276784.81377386	548230.62371214
2009	33150	37589.6	3.3	Corrosion	Recoat	no			56° 36' 40.539"	-116° 10' 54.408"	650.96100000	56.61126087	-116.18178008	6274414.07262915	550021.55377985
2009	33200	37651.0	4.6	Corrosion	Petro-Sleeve	GROUND ANCHOR	37660.2	Ground Anchor exposed	56° 36' 38.984"	-116° 10' 52.144"	650.89200000	56.61082892	-116.18151122	6274366.45535900	550260.72531147
2009	33280	37749.1	3.3	Corrosion	Petro-Sleeve	GROUND ANCHOR	37758.6	Ground Anchor not exposed	56° 36' 36.532"	-116° 10' 48.455"	650.93200000	56.61014787	-116.18012642	6274291.40296994	550324.53131841
2009	33410	37908.7	2.27	Corrosion	Recoat	no			56° 36' 32.533"	-116° 10' 42.500"	649.79300000	56.60903693	-116.17847217	6274168.96553856	550425.54826236
2009	34280	38945.0	2	Corrosion	Recoat	no			56° 36' 6.497"	-116° 10' 3.832"	644.62500000	56.60180481	-116.16773102	6273371.94942822	551096.61323330
2009	39830	45312.1	4	Corrosion	Recoat	DENT (measured 0.53%)	45315.7	Not on weld, no gouges	56° 33' 26.941"	-116° 6' 5.982"	615.85500000	56.55748372	-116.10166156	6268490.05134725	555217.34032098
2009	40600	46220.3	3.5	Corrosion	Recoat	no			56° 33' 4.275"	-116° 5' 31.959"	599.54300000	56.55118755	-116.09212081	6267796.91635034	555877.48713451
2009	40690	46330.6	3	Corrosion	Recoat	no			56° 33' 1.529"	-116° 5' 27.840"	608.81500000	56.55042468	-116.09106677	6267712.93796726	555878.94011121
2009	40720	46367.3	3.7	Corrosion	Petro-Sleeve	no			56° 33' 0.607"	-116° 5' 26.465"	605.56700000	56.55016870	-116.09068466	6267684.75796176	555902.80781234
2009	40740	46391.9	4.5	Corrosion	Petro-Sleeve	no			56° 32' 59.992"	-116° 5' 25.540"	603.98600000	56.54999785	-116.09042782	6267665.95118681	555918.84917802
2009	40760	46416.5	3.5	Corrosion	Recoat	no			56° 32' 59.376"	-116° 5' 24.612"	604.64800000	56.54982666	-116.09016991	6267647.10750152	555934.95696624
2009	40780	46441.1	2.8	Corrosion	Recoat	no			56° 32' 58.762"	-116° 5' 23.685"	605.92600000	56.54965615	-116.08991248	6267628.33917143	555951.03438469
2009	40800	46465.6	2	Corrosion	Petro-Sleeve	no			56° 32' 58.147"	-116° 5' 22.757"	606.39800000	56.54948534	-116.08965476	6267609.53774810	555967.13021553
2009	40810	46477.9	2.5	Corrosion	Recoat	no			56° 32' 57.838"	-116° 5' 22.296"	606.60100000	56.54939945	-116.08952666	6267600.08245846	555975.13217727
2009	40820	46490.2	3.1	Corrosion	Recoat	no			56° 32' 57.528"	-116° 5' 21.836"	606.78700000	56.54931345	-116.08939880	6267590.61474505	555983.11958228
2009	40860	46531.6	4.7	Corrosion	Recoat	no		SCC Found and Removed	56° 32' 56.484"	-116° 5' 20.289"	606.71700000	56.54902331	-116.08896904	6267558.67212477	556009.96851127
2009	42320	48276.2	6	Corrosion	Recoat	no			56° 32' 12.795"	-116° 4' 14.783"	589.93800000	56.53688763	-116.07077310	6266222.94431254	557146.89036120
2011	49680	56668.9	11.12	Corrosion	Petro-Sleeve	no			56° 28' 40.572"	-115° 59' 5.991"	561.38200000	56.47793653	-115.98499744	6259736.37696211	562518.77822561
2010	52710	60310.8	3.3	Corrosion	Recoat	no			56° 27' 7.211"	-115° 56' 54.545"	558.52400000	56.45200307	-115.94848480	6256883.83792203	564811.82597353
2010	52840	60470.4	3.5	Corrosion	Petro-Sleeve	no			56° 27' 3.139"	-115° 56' 48.791"	557.22200000	56.45087192	-115.94688644	6256759.45111223	564912.26788190
2011	52990	60654.7	3.2	Corrosion	Petro-Sleeve	no			56° 26' 58.402"	-115° 56' 42.157"	557.01500000	56.44955617	-115.94504351	6256614.75235594	565028.10560385
2010	54820	62854.5	2.5	Corrosion	Recoat	no			56° 26' 2.050"	-115° 55' 22.881"	560.38000000	56.43390273	-115.92302244	6254893.60911217	566412.72774298
2010	54850	62891.4	2.5	Corrosion	Recoat	no			56° 26' 1.089"	-115° 55' 21.571"	559.19000000	56.43363594	-115.92265847	6254864.26766862	566435.63650933
2010	54860	62903.7	2.5	Corrosion	Recoat	no			56° 26' 0.770"	-115° 55' 21.131"	560.35900000	56.43354718	-115.92253645	6254854.50680853	566443.31549656
2010	54880	62928.4	3.4	Corrosion	Petro-Sleeve	no			56° 26' 0.141"	-115° 55' 20.258"	560.41800000	56.43337241	-115.92229391	6254835.28974802	566458.57628202
2010	54920	62969.3	3.15	Corrosion	Petro-Sleeve	no			56° 25' 59.101"	-115° 55' 18.801"	560.92300000	56.43308366	-115.92188926	6254803.54379148	566484.03249931
2010	55010	63079.0	4	Corrosion	Petro-Sleeve	no			56° 25' 56.308"	-115° 55' 14.902"	560.21300000	56.43230768	-115.92080609	6254718.22706157	566552.18106150
2010	55290	63390.6	4.01	Corrosion	Recoat	no		Weld on Sleeve on 55300 not exposed	56° 25' 48.317"	-115° 55' 3.686"	558.65000000	56.43008798	-115.91769065	6254474.20006493	566748.18530927
2010	55310	63415.2	7.3	Corrosion	Recoat	Weld on Sleeve	63420.6	Rupture	56° 25' 47.679"	-115° 55' 2.807"	558.05000000	56.42991091	-115.91744642	6254454.72975011	566763.55705409
2010	55340	63452.2	7.8	Corrosion	Recoat	no			56° 25' 46.736"	-115° 55' 1.494"	557.42900000	56.42964891	-115.91708159	6254425.92413701	566786.51518264
2010	55350	63464.5	2.3	Corrosion	Recoat	no			56° 25' 46.421"	-115° 55' 1.051"	557.75400000	56.42956142	-115.91695861	6254416.30618762	566794.25272294
2010	55370	63489.1	2.5	Corrosion	Recoat	no			56° 25' 45.790"	-115° 55' 0.168"	557.80400000	56.42938613	-115.91671322	6254397.03527485	566809.69329874
2010	55380	63501.4	2.0	Corrosion	Recoat	no			56° 25' 45.475"	-115° 54' 59.729"	557.68800000	56.42929854	-115.91659127	6254387.40523679	566817.36759754
2011	55920	64158.6	8.7	Corrosion	Petro-Sleeve	no			56° 25' 28.566"	-115° 54' 35.967"	552.80800000	56.42460178	-115.90999075	6253871.10246098	567232.71102023
2011	55940	64182.9	4.8	Corrosion	Petro-Sleeve	no			56° 25' 27.937"	-115° 54' 35.093"	553.09300000	56.42442689	-115.90974802	6253851.87504954	567247.99074189
2011	56070	64341.9	6.0	Corrosion	Petro-Sleeve	no			56° 25' 23.848"	-115° 54' 29.341"	549.51210000	56.42329104	-115.90815029	6253727.02184203	567348.54327995
2011	56080	64354.2	5.9	Corrosion	Petro-Sleeve	no			56° 25' 23.531"	-115° 54' 28.898"	549.15500000	56.42320298	-115.90802734	6253717.34144124	567356.28248775
2011	56230	64528.7	6.3	Corrosion	Petro-Sleeve	no			56° 25' 19.041"	-115° 54' 22.588"	546.28300000	56.42195586	-115.90627440	6253580.25902028	567466.61195226
2011	56250	64553.3	3.7	Corrosion	Petro-Sleeve	no			56° 25' 18.405"	-115° 54' 21.709"	546.35300000	56.42177912	-115.90630321	6253560.82797784	567481.98708104
2011	59880	68844.3	8.7	Corrosion	Petro-Sleeve	no			56° 23' 28.468"	-115° 51' 47.519"	541.23400000	56.39124103	-115.86319985	6250204.90860224	570180.04343118
2011	59930	68905.6	3.8	Corrosion	Petro-Sleeve	no			56° 23' 26.902"	-115° 51' 45.338"	540.94400000	56.39080614	-115.86259390	6250157.12548572	570218.25001414

2010	73930	85152.3	3	Corrosion	Petro-Sleeve	no	Weld on Sleeve on 73920 not Expose	56° 16' 39.340"	-115° 41' 42.174"	539.31000000	56.27759433	-115.69504828	6237741.15003996	580799.98073934
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