

Saturated Tailings + PAG Rock Porewater Chemistry

pH	SO4	Nitrate, as N	Nitrite, as N	Nitrogen, Ammonia as N	Cl	F	Hardness	Al	Sb	As	Ba	Be	Bi	B	Cd	Ca	Cr	Co	Cu	Fe	Pb	Li	Mg	Mn	Hg	Mo	Ni	P	K	Se	Si	Ag	Na	Sr	S	Tl	Sn	Ti	U	V	Zn	Zr
	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mgCaCO ₃ /L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	ug/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
7.84	2000	1.30	NS	1.35	20	0.41	1860	1.247	0.0235	0.027	0.080	0.00192	0.00932	0.33	0.0010	700	0.0026	0.0055	0.10	19	0.0054	0.014	92	5.79	0.132	0.12	0.036	0.53	31	0.0187	14.1	0.00026	51	9.5	596	0.00048	0.0074	0.032	0.0036	0.0137	0.040	0.030

Source: \\Van-svr0\Projects\01_SITES\Prosperity\1CT013.001_Revise_MLARD_Characterization\Water_Quality_Prediction\SourceTerms\Tailings\Saturated_tails_(porewater)\Saturated tailings+PAG porewater_UpdatedPrediction_20120628

Note: 'NS' indicates value not specified

Tailings Beach Runoff Chemistry

pH	SO4	Nitrate, as N	Nitrite, as N	Nitrogen, Ammonia as N	Cl	F	Hardness	Al	Sb	As	Ba	Be	Bi	B	Cd	Ca	Cr	Co	Cu	Fe	Pb	Li	Mg	Mn	Hg	Mo	Ni	P	K	Se	Si	Ag	Na	Sr	S	Tl	Sn	Ti	U	V	Zn	Zr		
	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mgCaCO ₃ /L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	ug/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
NS	1681	NS	NS	NS	0.50	0.20	1850	0.006	0.0013	0.001	0.052	0.00030	0.00030	0.17	0.0001	638	0.0010	0.0026	0.00	0.01	0.0001	0.011	53	0.39	0.050	0.06	0.006	0.10	28	0.0030	4.6	0.00005	5	8.6	569	0.00030	0.0003	0.003	0.0029	0.0003	0.003	0.005		

Source: \\Van-svr0\Projects\01_SITES\Prosperity\1CT013.001_Revise_MLARD_Characterization\Water_Quality_Prediction\SourceTerms\Tailings\Unsat tails\Beach_Runoff_20120424

Note: 'NS' indicates value not specified

Tailings Beach Infiltration Chemistry

pH	SO4	Nitrate, as N	Nitrite, as N	Nitrogen, Ammonia as N	Cl	F	Hardness	Al	Sb	As	Ba	Be	Bi	B	Cd	Ca	Cr	Co	Cu	Fe	Pb	Li	Mg	Mn	Hg	Mo	Ni	P	K	Se	Si	Ag	Na	Sr	S	Tl	Sn	Ti	U	V	Zn	Zr		
	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mgCaCO ₃ /L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	ug/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L
NS	1681	NS	NS	NS	0.5	0.20	1850	0.023	0.0100	0.006	0.052	0.00030	0.00030	0.17	0.0001	638	0.0010	0.0026	0.02	0.04	0.0001	0.011	53	0.71	0.050	0.06	0.006	0.10	28	0.0589	4.6	0.00005	5	8.6	569	0.00030	0.0003	0.003	0.0029	0.0003	0.031	0.005		

Notes: 1) \\Van-svr0\Projects\01_SITES\Prosperity\1CT013.001_Revise_MLARD_Characterization\Water_Quality_Prediction\SourceTerms\Tailings\Unsat tails\Beach_Infiltration_20120424

Grey shading indicates concentrations which were extracted from the BC porphyry database (Day and Rees 2006), using median values for neutral conditions
Therefore, source term values are the greater of EITHER the Prosperity tailings porewater prediction OR the median value for neutral conditions from the BC porphyry database
2) 'NS' indicates value not specified