Supplement S1. Quality control and accurance for the sediment metal analyses.
OREAS 45 certified reference material (https://www.ore.com.au/crm/oreas-45e/) was used to verify precision and reproducibility of the results.

Reference Materials	Cu	RPD	Expected	Pb	RPD	Expected	Zn	RPD	Expected
STD OREAS45EA	671.06	5.498311668	709	13.19	8.075663878	14.3	31.2	7.65391015	28.9
STD OREAS45EA	653.29	8.178875276		12.92	10.13960323		26.9	7.168458781	
STD OREAS45EA	690.54	2.638009632		14.41	0.766283525		29.4	1.715265866	
STD OREAS45EA	706.49	0.354647507		15.17	5.904309467		32.1	10.49180328	
Mean	680.345	4.167461021		13.9225	6.221465026		29.9	6.757359519	
STDV	23.13499009	2.947005947		1.054431126	3.487458001		2.293468988	3.175751259	

Reference Materials	S	RPD	Expected	Fe	RPD	Expected	Ca	RPD	Expected
STD OREAS45EA	0.04	199.938471	0.036	21.05	89.09212286	23.51	0.04	197.9204332	0.036
STD OREAS45EA	0.03	199.9538515		21.91	92.27300205		0.03	198.4382951	
STD OREAS45EA	0.03	199.9538515		22.65	94.86750998		0.04	197.9204332	
STD OREAS45EA	0.03	199.9538515		23.02	96.11845678		0.03	198.4382951	
Mean	0.0325	199.9500064		22.1575	93.08777291		0.035	198.1793642	
STDV	0.005	0.006659941		0.870684597	2.691727124		0.005773503	0.258930951	

Reference Materials	As	RPD	Expected	Sb	RPD	Expected	Mn	RPD	Expected
STD OREAS45EA	8.2	6.88902416	9.1	0.22	189.3920485	0.2	387	194.3966009	400
STD OREAS45EA	8.8	13.93091174		0.26	187.5234892		402	194.6028619	
STD OREAS45EA	10	26.57869934		0.24	188.4555218		423	194.8673668	
STD OREAS45EA	12.5	48.09081527		0.21	189.8620073		426	194.9030515	
Mean	9.875	23.87236263		0.2325	188.8082667		409.5	194.6924703	
STDV	1.903286631	15.66144899		0.022173558	0.898088591		18.41195264	0.206459177	

Reference Materials	Mg	RPD	Expected	P	RPD	Expected	K	RPD	Expected
STD OREAS45EA	0.09	199.9492307	0.095	0.026	198.1293608	0.029	0.05	199.3091537	0.053
STD OREAS45EA	0.09	199.9492307		0.025	198.2009848		0.05	199.3091537	
STD OREAS45EA	0.09	199.9492307		0.027	198.0577624		0.05	199.3091537	
STD OREAS45EA	0.09	199.9492307		0.029	197.914643		0.05	199.3091537	
Mean	0.09	199.9492307		0.02675	198.0756878		0.05	199.3091537	
STDV	0	0		0.001707825	0.105873586		0	0	

Reference Materials	Au	RPD	Expected	Ni	RPD	Expected	Ag	RPD	Expected
STD OREAS45EA	44.6	155.8491935	53	380.8	185.5226525	381	246	5.533596838	260
STD OREAS45EA	45.6	156.7126337		358.7	184.6648794		217	18.0293501	
STD OREAS45EA	61.1	166.7819412		386.5	185.7285429		235	10.1010101	
STD OREAS45EA	61.7	167.0783828		397.7	186.1165049		266	2.281368821	
Mean	53.25	161.6055378		380.925	185.5081449		241	8.986331466	
STDV	9.422844581	5.334397714		16.39560409	0.531503614		20.51016008	5.913894551	

Supplement S1 cont.

Reference Materials	Hg	RPD	Expected	Cd	RPD	Expected	Na	RPD	Expected
STD OREAS45EA	16	200	10	0.01	199.2738247	0.02	0.02	199.4413408	0.02
STD OREAS45EA	11	200		0.05	196.3952998		0.017	199.5250402	
STD OREAS45EA	22	200		0.02	198.5502812		0.009	199.7484101	
STD OREAS45EA	22	200		0.005	199.6365825		0.008	199.7763489	
Mean	17.75	200		0.02125	198.463997		0.0135	199.622785	
STDV	5.315072906	0		0.020155644	1.256754796		0.00591608	0.143038099	

RPD = ABS((X1-X2)*100)/((X1+X2)/2)
X1 = measured
X2 = target (10.3 PPM)