

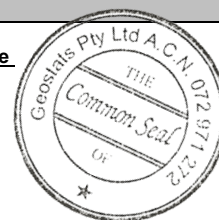
GEOSTATS PTY LTD

Mining Industry Consultants
Reference Material Manufacture and Sales

Certified Geochem Base Metal Reference Material Product Code

GBM313-9

Certified Control Values



GBM313-9

Total Digest

Element	Grade	Standard Deviation	Num of Analyses	Confidence Interval
Nickel (ppm)	120	8	51	+/- 2.3
Copper (ppm)	3313	118	55	+/- 32.2
Zinc (ppm)	3394	164	58	+/- 43.4
Lead (ppm)	2560	104	54	+/- 28.8
Arsenic (ppm)	112	7	42	+/- 2.4
Cobalt (ppm)	32	4	59	+/- 1
Silver (ppm)	6.6	1.2	53	+/- 0.33

Partial Digest

Element	Grade	Standard Deviation	Num of Analyses	Confidence Interval
Nickel (ppm)	112	10	49	+/- 2.9
Copper (ppm)	3372	166	67	+/- 40.7
Zinc (ppm)	3444	155	57	+/- 41.5
Lead (ppm)	2641	108	53	+/- 30
Arsenic (ppm)	110	12	55	+/- 3.2
Cobalt (ppm)	23	6	48	+/- 1.8
Silver (ppm)	6.9	0.9	59	+/- 0.22

CRM Details

Control Statistic Details	Neutron Activation Analysis Results (ppm, unless otherwise noted)		Major Elements by Fusion / XRF (%)	
	Control statistics were produced from results accumulated in the April-2013 round robin. The number of results used to certify each analyte is shown in the table above.	Antimony	64.6	Fe
Material Description This material is described as a Low Cu Pb Zn Cuttings milled.	Arsenic	118	SiO ₂	59.1
	Barium	389	Al ₂ O ₃	14.38
Colour Designation (ISCC-NBS, SP440) This material is light gray in colour.	Bromine	0.857	TiO ₂	1.111
	Cadmium	<6.76	MnO	0.13
Usage This product is for use in the mining industry as a reference material for monitoring and testing the accuracy of laboratory assaying.	Caesium	2.27	CaO	6.15
	Calcium (%)	nr	P	0.057
Preparation and Packaging All CRMs are dried in an oven for a minimum of 12 hours at 110°C. The dry material is then pulverised to better than 75 micron (nominal mean of 45 micron) using an air classifier. The material is then homogenised and stored in a sealed, stable container ready for final packaging. Materials are statistically sampled from stores, then packaged into either heat sealed, air tight, plastic pulp packets or screw top sealed plastic containers ready for distribution. All packaging has been chosen to ensure minimal contamination from outside sources during shipment, use and storage.	Cerium	32.8	S	0.506
	Chromium	89.7	MgO	3.52
Assay Testwork All standards are tested thoroughly in the Geostats bi-annual laboratory survey. This involves assaying by multiple laboratories from around the world. Results are compiled into a comprehensive report detailing statistics for each standard. Assay distributions are checked and processed statistically, producing monitoring statistics for these standards. Materials are tested regularly to ensure stability and homogeneity.	Cobalt	34.6	K ₂ O	1.94
	Europium	<0.947	Na ₂ O	3.258
Stability This product remains stable in its original packaging, away from direct sunlight.	Gold (ppb)	1210	LOI1000	0.66
	Hafnium	3.48	Neutron Activation Analyses and Fusion / XRF Analyses are single results and are indicative only. These are provided for matrix identification purposes.	
Material Safety This product is not hazardous and non-toxic.	Iridium (ppb)	<11.6	'nr': Not Reported	
	Iron (%)	5.96		
	Lanthanum	19.1		
	Lutetium	0.342		
	Mercury	nr		
	Molybdenum	11		
	Neodymium	nr		
	Nickel	146		
	Potassium (%)	nr		
	Rubidium	92.8		
	Samarium	4.43		
	Scandium	16.9		
	Selenium	<3.44		
	Silver	20.7		
	Sodium (%)	2.42		
	Strontium	nr		
	Tantalum	1.09		
	Tellurium	<5.14		
	Terbium	0.785		
	Thorium	12.1		
	Tin	<73.4		
	Tungsten	31.3		
	Uranium	6.33		
	Ytterbium	2.2		
	Zinc	3700		
	Zirconium	<320		

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Geostats Pty Ltd, Certified Geochem Base Metal Reference Material, Product Code: