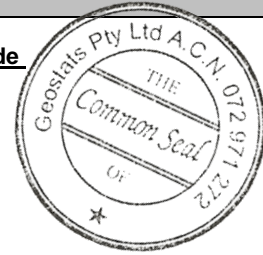


# GEOSTATS PTY LTD

Mining Industry Consultants  
Reference Material Manufacture and Sales

**Certified Ore Grade Base Metal Reference Material Product Code**

## GBM917-16



### Certified Control Values

Element	Grade	Standard Deviation	Num of Analyses	Confidence Interval
Nickel (ppm)	47437	2259	92	+/- 470
Copper (ppm)	61345	1915	119	+/- 349
Zinc (ppm)	101	16	83	+/- 3
Lead (ppm)	320	38	102	+/- 8
Cobalt (ppm)	nr	nr	nr	nr
Silver (ppm)	66.5	3.3	112	+/- 0.63
Sulphur (%)	7.39	0.31	89	+/- 0.07

### 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 October-2017 round robin. The number of results used to certify each analyte is shown in the table above.	Antimony	nr	Fe
<b>Material Description</b> This material is described as a Nickel filtercake concentrate.	Arsenic	nr	SiO <sub>2</sub>	1.03
	Barium	nr	Al <sub>2</sub> O <sub>3</sub>	0.26
<b>Colour Designation (ISCC-NBS, SP440)</b> This material is moderate brown in colour.	Bromine	nr	TiO <sub>2</sub>	0.097
	Cadmium	nr	MnO	0.295
<b>Usage</b> This product is for use in the mining industry as a reference material for monitoring and testing the accuracy of laboratory assaying.	Caesium	nr	CaO	0.271
	Calcium (%)	nr	P	0.03
<b>Preparation and Packaging</b> 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	nr	S	7.42
	Chromium	nr	MgO	0.247
<b>Assay Testwork</b> 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	nr	K <sub>2</sub> O	0.02
	Europium	nr	Na <sub>2</sub> O	0.14
<b>Stability</b> This product remains stable in its original packaging, away from direct sunlight.	Gold (ppb)	nr	LOI1000	25.87
	Hafnium	nr	Neutron Activation Analyses and Fusion / XRF Analyses are single results and are indicative only. These are provided for matrix identification purposes.	
<b>Material Safety</b> This product is not hazardous and non-toxic.	Iridium (ppb)	nr	nr: Not Reported	
	Iron (%)	nr		
	Lanthanum	nr		
	Lutetium	nr		
	Mercury	nr		
	Molybdenum	nr		
	Neodymium	nr		
	Nickel	>20000		
	Potassium (%)	nr		
	Rubidium	nr		
	Samarium	nr		
	Scandium	nr		
	Selenium	nr		
	Silver	<100		
	Sodium (%)	nr		
	Strontium	nr		
	Tantalum	nr		
	Tellurium	nr		
	Terbium	nr		
	Thorium	nr		
	Tin	nr		
	Tungsten	nr		
	Uranium	nr		
	Ytterbium	nr		
	Zinc	<200		
	Zirconium	nr		

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