

GEOSTATS PTY LTD

Mining Industry Consultants
Reference Material Manufacture and Sales

Certified Base Metal Reference Material Product Code

GBM301-1

Certified Control Values

Base Metal Analyses

Element	Grade	Standard Deviation	No of Analyses	Confidence Interval
Nickel (ppm)	26560	1410	119	+/- 257.1
Copper (ppm)	561	39	148	+/- 6.4
Zinc (ppm)	236	33	137	+/- 5.6
Lead (ppm)	368	37	135	+/- 6.3
Arsenic (ppm)	56	11	97	+/- 2.2
Cobalt (ppm)	50	9	115	+/- 1.6
Silver (ppm)	1.2	0.6	97	+/- 0.1

CRM Details

Control Statistic Details

Control statistics were produced from results accumulated in the :
April-2004 Geostats Pty Ltd Laboratory Round Robin Program.
97 laboratories (at least) tested this material for base metal content.

Source Material

Prior to homogenisation and testing, this material was sourced from Nickel Sulphide Ore ex. S.West Mineral field

Colour Designation

Medium dark gray

Usage

This product is for use in the mining industry as reference materials for monitoring and testing the accuracy of laboratory assaying.

Preparation and Packaging

All standards are dried in an oven for a minimum of 12 hours at 110C. 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.

Assay Testwork

All standards are tested thoroughly in the Geostats bi-annual laboratory survey. This involves assaying by a minimum of 50 reputable laboratories selected from across the world using a variety of methods (including AR, 3AD, 4AD and ICP, AAS and XRF). 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.

Neutron Activation

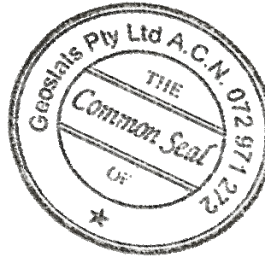
Analysis Results (ppm)

Antimony	1.06
Arsenic	60.25
Barium	<100
Bromine	<2
Cadmium	nr
Cerium	15.2
Caesium	6.29
Chromium	664
Cobalt	50.25
Europium	0.69
Gold ppb	1380
Hafnium	1.635
Iridium ppb	<20
Iron %	17.65
Lanthanum	6.275
Lutetium	<0.2
Molybdenum	7.7
Nickel	nr
Rubidium	<30
Samarium	1.79
Scandium	9.775
Selenium	<5
Sodium %	0.2485
Tantalum	<1
Tellurium	<5
Terbium	nr
Thorium	0.935
Tin	nr
Tungsten	<3
Uranium	<2
Ytterbium	0.815
Zinc	270.5
Zirconium	<500
Calcium%	3.675
Potassium %	<0.2
Silver	<5
Mercury	nr
Neodymium	nr
Strontium	nr

Major Elements

Fusion / XRF (%)

Fe	nr
SiO ₂	nr
Al ₂ O ₃	nr
TiO ₂	nr
MnO	nr
CaO	nr
P	nr
S	nr
MgO	nr
K ₂ O	nr
Na ₂ O	nr
LOI1000	nr



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