



# POWDER GEOLOGICAL

## REFERENCE MATERIALS

**Industrial**  
VHG | ARMI | MBH  
Paragon Scientific

**The Material Difference**

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**LGC Quality** | [lgcstandards.com/industrial](https://lgcstandards.com/industrial) | ISO 17034 | ISO/IEC 17025 | ISO 9001



# Introduction

LGC Industrials Powder Certified Reference Materials are manufactured to exacting standards in our state of the art powder processing facility. Our production process is based on the process which was used by the USGS for many years, which has been proven to generate the most homogenous material. In addition, LGC Industrial verifies the homogeneity of each batch of powders that are produced. All of the data is then analyzed

according to the requirements of ISO 17034 and ISO guide 35. All of this gives you the utmost confidence in your results.

Additionally, our powders certificates include both major and minor element compositions, making it easier to identify unknowns in your sample and saving you precious time and effort.

And as always, our team of geological scientists, with over 50 years of experience in the industry, are available to assist with method development and answer any questions you may have.

To view our most updated range of powder CRMs please visit us [online](#).

## Current Range:

Common name	Product/ ID code	Description	Pack size
Gold Ore	MBH-AU-ORE1-21- P	Carlin-type gold ore with Au certified at 8.9ppm	200g
Fish Canyon Tuff	MBH-FCT-21- P	Fish Canyon Tuff Creede, CO (Dacite)	75g
Norite	MBH-NSC-21- P	Norite from Stillwater Complex, MT	75g
Anorthosite	MBH-ASC-21- P	Anorthosite from Stillwater Complex, MT	75g
Merriam Crater Basalt	MBH-BAS-MC-22- P	Merriam Crater Basalt	75g



# Products and Descriptions

## Gold Ore

- Sourced from carlin-type gold deposits in the Western United States
- High concentration of gold particles (8.9ppm)
- **64 minor and trace elements** including key indicator elements As, Ba, Hg, Sb, Tl, and W.
- Certified to ISO 17034

## Fish Canyon Tuff

- Sourced from Creede, Colorado
- Dacite is a hard to find Certified Reference Material
- **56 minor and trace elements**
- Certified to ISO 17034

## Norite

- Sourced from Stillwater Complex, Montana
- Contains moderate concentrations of  $Al_2O_3$ , Cr and Ni which provide additional calibration materials, making your data analysis more reliable
- Provides difficult to find calibration points in geological matrices
- Certified to ISO 17034

## Anorthosite

- Sourced from Stillwater Complex, Montana
- Certified at 30.5 wt.%  $Al_2O_3$ , which makes it an excellent high-Al end member for silicate rock analysis
- **42 minor and trace elements**
- Certified to ISO 17034

## Meriam Crater Basalt

- Sourced from the Merriam Crater Cinder Cone volcano in Northern Arizona
- **32 minor and trace elements**
- Zeolites in our Basalt reference material make it untypically rich in trace elements of Ce, La, Nb, Pr, Sm, Sr, and Ta.
- Certified to ISO 17034





**A LGC Industrial Geological Powder Processing Facility**  
Bedford, New Hampshire

**B Gold Ore – MBH-AU-ORE-21**  
Western United States

**C Fish Canyon Tuff – MBH-FCT-21**  
Creede, Colorado

**D Norite – MBH-NSC-21-P**  
**Anorthosite – MBH-ASC-21-P**  
Stillwater, Montana

**E Merriam Crater Basalt – MBH-BAS-MC-22**  
Merriam Crater, Arizona

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We leverage an extensive distributor network where there is no sales office represented.

\* Indicates a Centre of Excellence