# Article information:

山西吕梁古元古代袁家村铁矿BIF稀土元素地球化学及其对大氧化事件的指示 - 中国知网
[https://kns.cnki.net/kcms2/article/abstract?v=3uoqIhG8C44YLTlOAiTRKibYlV5Vjs7ir5D84hng\_y4D11vwp0rrtRbNtiy4PPE\_2LmzUgsKJ7u53piSf1Zl3wCPh3u\_jQYp=NZKPT](https://kns.cnki.net/kcms2/article/abstract?v=3uoqIhG8C44YLTlOAiTRKibYlV5Vjs7ir5D84hng_y4D11vwp0rrtRbNtiy4PPE_2LmzUgsKJ7u53piSf1Zl3wCPh3u_jQYp&uniplatform=NZKPT)

# Article summary:

1. The Yuanjia Village iron ore in Lüliang, Shanxi Province is an example of a suspected Superior-type BIF.

2. The geochemical characteristics of the BIF are similar to those of Superior-type BIFs, indicating that the formation of the Yuanjia Village Formation occurred between 2.3 and 2.1 Ga, after or within the time frame of the Great Oxidation Event (GOE).

3. The geochemical features suggest that the source material for mineralization was mainly from high-temperature hydrothermal fluids and seawater, with little or no mixing from continental debris; partial Ce anomalies, small Y/Ho ratios, and large Ce anomalies were also observed.

# Article rating:

Appears well balanced: The article presents the information in a reliable and balanced way, without biases and prejudices. The claims made in the article are well supported and, where applicable, all sides of the argument are given opportunity to present their point of view. The article appears trustworthy and reliable.

# Article analysis:

The article is generally reliable and trustworthy as it provides detailed information on the geochemistry of a suspected Superior-type BIF in Lüliang, Shanxi Province. It presents evidence for its claims in terms of geochemical characteristics such as La, Y and Eu elements being positively anomalous after being normalized by post-Archaean average shale (PAAS), suggesting that mineralization was mainly sourced from high-temperature hydrothermal fluids and seawater with little or no mixing from continental debris. Partial Ce anomalies, small Y/Ho ratios, and large Ce anomalies were also observed.

The article does not appear to be biased or one-sided as it presents both sides equally without any promotional content or partiality towards either side. It also does not appear to have any unsupported claims or missing points of consideration as all claims are backed up by evidence provided in the article itself. Furthermore, there are no unexplored counterarguments present in the article as it provides a comprehensive overview of the topic at hand without leaving out any important details or considerations.

In conclusion, this article is reliable and trustworthy due to its comprehensive coverage of the topic at hand without any bias or one-sidedness present in its reporting.

# Topics for further research:

* Superior-type BIF geochemistry
* High-temperature hydrothermal fluids
* Seawater mixing with continental debris
* Partial Ce anomalies
* Y/Ho ratios
* Ce anomalies in Lüliang, Shanxi Province

# Report location:

<https://www.fullpicture.app/item/77597499694b1b06d6f73d49d3f34848>