



Application of Emerging Technology in Mining Operations

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Message from the Guest Editors

Dear Colleagues,

The most recent technological developments in the mining industry point to a significant change in favour of sustainability. A fully modern, safe, and productive mine that meets the rising demand for extracted resources, while also exceeding consumer expectations and contributing to global sustainability programs, is now more possible than ever thanks to digital technology. Rapid technological change is being implemented in the mining industry in order to reinvent itself. This Special Issue is organized into the following sections:

- Internet of Things (IoT);
- Mine digitization and automation;
- Spatial data visualisation;
- 3D imaging technologies for mineral exploration;
- Application of artificial intelligence in the mineral industry.

This Special Issue aims to see how technology plays a critical role in the mining industry to improve the efficiency of its processes, to reduce costs, and meet the increasing social and environmental concerns among communities and authorities.





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Message from the Editor-in-Chief

Minerals welcomes submissions that report basic and applied research in mineralogy. Research areas of traditional interest are mineral deposits, mining, mineral processing and environmental mineralogy. The journal footprint also includes novel uses of elemental and isotopic analyses of minerals for petrology, geochronology and thermochronology, thermobarometry, ore genesis and sedimentary provenance. Contributions are encouraged in emerging research areas such as applications of quantitative mineralogy to the oil and gas, manufacturing, forensic science, climate change, geohazard and health sectors.

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