



Chemo-Physical Evolution, Microstructural Modifications and Hydro-Mechanical Behaviour of Treated Soils of Different Mineralogical Composition

Guest Editors:

Prof. Dr. Giacomo Russo

Department of Earth Science,
Environment and Resources,
University of Napoli Federico II,
80126 Napoli, Italy

Dr. Enza Vitale

Department of Earth Science,
Environment and Resources,
University of Napoli Federico II,
80126 Napoli, Italy

Prof. Dr. Manuela Cecconi

Department of Engineering,
University of Perugia, 06125
Perugia, Italy

Deadline for manuscript
submissions:

closed (31 May 2024)

Message from the Guest Editors

The treatment of waste soils of different mineralogical composition is an increasingly common practice in many fields of geotechnical engineering, and responds to the demand for sustainability of the built environment, as an essential condition for constructions in the perspective of environmental protection. We are happy to invite researchers involved in this field to submit their contributions on the multiscale analysis of the effects induced by traditional and non-traditional binders on the treatment of soils of different origin and mineralogical nature, in order to improve their physical and hydro-mechanical properties. The aspects of interest will concern both the chemical–physical evolution induced by the treatment and the microstructural reorganisation of the treated soils, up to the analysis of the hydro-mechanical behaviour (water retention, hydraulic conductivity, stiffness, shear strength, etc.) in static and dynamic conditions. Contributions will be particularly welcome on the durability of the properties induced by the treatment under environmental loads (wetting/drying, freezing/thawing, leaching, etc.) with reference to the different scales of the problem.





an Open Access Journal by MDPI

Editor-in-Chief

Prof. Dr. Leonid Dubrovinsky
Bayerisches Geoinstitut,
University Bayreuth, D-95440
Bayreuth, Germany

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.

Author Benefits

Open Access: free for readers, with article processing charges (APC) paid by authors or their institutions.

High Visibility: indexed within Scopus, SCIE (Web of Science), GeoRef, CaPlus / SciFinder, Inspec, Astrophysics Data System, AGRIS, and other databases.

Journal Rank: JCR - Q2 (*Mining & Mineral Processing*) / CiteScore - Q2 (*Geology*)

Contact Us

Minerals Editorial Office
MDPI, St. Alban-Anlage 66
4052 Basel, Switzerland

Tel: +41 61 683 77 34
www.mdpi.com

mdpi.com/journal/minerals
minerals@mdpi.com
[X@Minerals_MDPI/](https://twitter.com/Minerals_MDPI/)