Special Issue

Remote Sensing for Characterization of Fractured Rocks Masses and Landslide Monitoring

Message from the Guest Editors

Remote sensing is used for characterizing fractured rock masses in a variety of applications, including for hydrogeological, geophysical, and landslide monitoring purposes. Unmanned Aerial Vehicle (UAV) surveys are used to inform discrete fracture network models, which are used to visualize contaminant transport in shallow aquifers or provide 3D representations of the permeability of geological formations selected for geothermal energy, hydrocarbon extraction, and CO2 storage. UAV surveys are also crucial to the characterization of fractured rocks subject to slope instabilities. Such fractured rock masses require monitoring using innovative techniques, such as Interferometric Synthetic Aperture Radar (InSAR), to mitigate and forecast hazards related to landslides. InSAR can also be employed to monitor areas subject to fault activity, which represent the most heavily fractured portions of aquifers. Topics of interest in this Special Issue include, but are not limited to, UAV surveys for the management of groundwater resources; the characterization of reservoir analogues for the extraction and storage of fluids; and InSAR monitoring for seismic or landslide hazard applications.

Guest Editors

Dr. Ebrahim Ghaderpour

Dr. Elisa Mammoliti

Dr. Giacomo Medici

Prof. Dr. Paolo Mazzanti

Deadline for manuscript submissions

31 January 2026

Remote Sensing

an Open Access Journal by MDPI

Impact Factor 4.1
CiteScore 8.6

mdpi.com/si/248109

Remote Sensing
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
remotesensing@mdpi.com

mdpi.com/journal/remotesensing

MDPI

Remote Sensing

an Open Access Journal by MDPI

Impact Factor 4.1
CiteScore 8.6

mdpi.com/journal/remotesensing

About the Journal

Message from the Editor-in-Chief

Remote Sensing is now a prominent international journal of repute in the world of remote sensing and spatial sciences, as a pioneer and pathfinder in open access format. It has highly accomplished global remote sensing scientists on the editorial board and a dedicated team of associate editors. The journal emphasizes quality and novelty and has a rigorous peer-review process. It is now one of the top remote sensing journals with a significant Impact Factor, and a goal to become the best journal in remote sensing in the coming years. I strongly recommend *Remote Sensing* for your best research publications for a fast dissemination of your research.

Editor-in-Chief

Dr. Prasad S. Thenkabail
Senior Scientist (ST), U. S. Geological Survey (USGS), USGS Western Geographic Science Center (WGSC), 2255, N. Gemini Dr., Flagstaff, AZ 86001, USA

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), Ei Compendex, PubAg, GeoRef, Astrophysics Data System, Inspec, dblp, and other databases.

Journal Rank:

JCR - Q1 (Geosciences, Multidisciplinary) / CiteScore - Q1 (General Earth and Planetary Sciences)