

Special Issue

The Confinement Period and Its Potential Impact on Urban Heat Island and Surface Temperature Using Remote Sensing

Message from the Guest Editor

Aerosols strongly influence climate by affecting the Earth's energy budget. On one hand, aerosols impact cloud properties. On the other hand, aerosols interact with solar radiation by scattering, reflecting and absorbing it. Additionally, chemical atmospheric composition influences the land surface temperature (LST). As an urban climate indicator, surface urban heat island (SUHI) is computed based on the LST and characterized by the temperature difference between that of an urban city and that of the surrounding rural area.

The lockdown effect from the COVID-19 pandemic on both the surface and the canopy UHI is still uncertain and needs to be further studied as different hypotheses can be put forward:

- (i) an increase in evapotranspiration;
- (ii) a greenhouse effect reduction, which results from the decrease in pollution levels;
- (iii) reduced anthropogenic heat fluxes.

The objective of this Special Issue is to publish results related to the evolution of surface and canopy urban heat island in global cities based on observational and/or modelling studies.

Guest Editor

Dr. Rafiq Hamdi
Royal Meteorological Institute of Belgium, B1180 Brussels, Belgium

Deadline for manuscript submissions

closed (30 September 2023)



Remote Sensing

an Open Access Journal
by MDPI

Impact Factor 4.1
CiteScore 8.6



mdpi.com/si/131309

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

[mdpi.com/journal/
remotesensing](https://mdpi.com/journal/remotesensing)





Remote Sensing

an Open Access Journal
by MDPI

Impact Factor 4.1
CiteScore 8.6



[mdpi.com/journal/
remotesensing](https://mdpi.com/journal/remotesensing)



About the Journal

Message from the Editorial Board

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.

Editors-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

Prof. Dr. Dongdong Wang

Institute of Remote Sensing and Geographic Information Systems, Peking University, Beijing, China

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)