

Journal of Urban Planning and Development

Section 1. Introduction and Problem Statement

The COVID 19 pandemic has affected intensively on millions of people and communities. The world shaking communicable coronavirus disease has become a pandemic threat and a challenge to our health and, subsequently, to the built environment, which forced governments to enforce new and innovative commitments to public healthcare. The impacts of COVID 19 on people's health and well being have been investigated and debated by hundreds of researchers worldwide. As a result, governments and authorities have raised a few de-urbanization solutions to control COVID 19 risks, such as decentralizing services and supplies, isolating communities, and restricting social behaviors. However, these solutions are short term treatments, not long term consolidated treatments.

Through a few studies in this short period, the researchers found that COVID 19's spread and growth can be affected by

Call for Papers

Special Issue Topic: Urban Physics and COVID-19 Pandemic Risk Management

Section 4. Research Domains

Based on these premises, this special issue aims at exploring the following emerging research domains:

- a) Urban adaptation and resilience; to understand how to enhance urban resilience and adaptation capacities to ensure community health in pandemic sequences
- b) Urban climatology and geometry; to understand the impact of urban geometry, microclimate, and shared air flow dynamics on pandemic transmission and spread patterns.
- c) Urban and building materials; to understand the impact of material mixtures and compositions of buildings and urban surfaces in minimizing pandemic risks.

Section 5. Research Disciplines

Due to the interdisciplinary and complex nature of the special issue topic, a manuscript submission from a mixed range of the following research disciplines are highly welcome;

- Urban Air Quality and Ventilation
- Urban Microclimate, Climate Change
- Urban design/planning legislation and strategies
- Urban construction and material science
- Environmental Impact assessment
- Public health, immunity, and Quality of life
- Policy making and decision making
- Simulation and Modelling
- GIS (Geographic Information System)
- ICT (Information and Communications Technology)
- Transportation and infrastructure management
- Big data
- Artificial intelligence and virtual reality
- Decision Support Systems / Tools

The team of Guest Editors, particularly welcome manuscripts, critically studied practical urban planning and management, coupled with case study research, demonstrating evidence based results and the feasibility of innovative urban solutions. We strongly hope that the findings of this special issue aid the government leaders, policy makers, scientific communities, and of course, our societies to control and mitigate the COVID 19 or maybe similar diseases in the future.

Section 6. Submission Information

The authors should submit their manuscripts following the ASCE Journal of Urban Planning and Development's Author guidelines. The manuscripts should be submitted through the journal's Editorial Manager, selecting this special collection. The authors need to include the Special issue title, "Urban Physics and COVID 19 Pandemic Risk Management," and the name of the Associate Editor, Professor Dr. Arezou Shafaghat, in their cover letters.

Important Dates:

- Manuscript Submission Deadline June 29, 2022
- Author notification September 29, 2022
- Revised Manuscript Submission December 29, 2022
- Final Acceptance February 29, 2023