

Special Issue

Advanced Concrete Technology and Applications in Construction Engineering

Message from the Guest Editors

Concrete is the most widely used material in construction engineering. The previous concrete can reduce surface runoff during heavy rainfall and achieve flood control in today's rapidly changing climate, but a major challenge is how to improve its strength to expand its application scope. How to enhance the sustainability and durability of concrete, and how to repair and rehabilitate existing concrete structures to extend their service life, are pressing issues that need to be addressed. Other topics such as high performance concrete (HPC), high performance grout (HPG), self-compacting concrete (SCC), inorganic geopolymer, 3D-printed concrete material, artificial intelligence applications in concrete technology, health monitoring systems in concrete, digital twin of concrete structure, conductive concrete, etc., are hot topics for future needs. We invites contributors to submit their ideas and findings related to the concrete technology and applications such that the latest developments that are currently under research can be revealed, and guidance for future directions in this field can be pointed out.

Guest Editors

Prof. Dr. Weichung Yeh

Department of Harbor and River Engineering, National Taiwan Ocean University, Keelung 20201, Taiwan

Prof. Dr. Maochieh Chi

Department of Civil Engineering Management, National Quemoy University, Kinmen County 89250, Taiwan

Deadline for manuscript submissions

closed (20 April 2024)



Applied Sciences

an Open Access Journal
by MDPI

Impact Factor 2.5
CiteScore 5.5



mdpi.com/si/173199

Applied Sciences
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
appls@mdpi.com

mdpi.com/journal/

[appls](https://appls.mdpi.com)





Applied Sciences

an Open Access Journal
by MDPI

Impact Factor 2.5
CiteScore 5.5



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



About the Journal

Message from the Editor-in-Chief

As the world of science becomes ever more specialized, researchers may lose themselves in the deep forest of the ever increasing number of subfields being created. This open access journal Applied Sciences has been started to link these subfields, so researchers can cut through the forest and see the surrounding, or quite distant fields and subfields to help develop his/her own research even further with the aid of this multi-dimensional network.

Editor-in-Chief

Prof. Dr. Giulio Nicola Cerullo
Dipartimento di Fisica, Politecnico di Milano, Piazza L. da Vinci 32,
20133 Milano, Italy

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, Inspec, CAPlus / SciFinder, and other databases.

Journal Rank:

JCR - Q2 (Engineering, Multidisciplinary) / CiteScore - Q1 (General Engineering)