Special Issue

Performance and Properties of Reinforced-Cement-Based Materials in Aggressive Environments

Message from the Guest Editors

The degradation mechanisms of cement-based materials under various aggressive environments and the development of strategies to reinforce those materials and increase their durability have increasingly attracted the attention of scientists, engineers, and technologists. The maintenance of structures suffering these kinds of environments is costly and may disturb human activities inside or near the structures for a time. The frequency and cost of repair and maintenance can be minimized by means of composite design strategies based on selecting the reinforcement material and the composition of the matrix or coating strategies that avoid direct exposure of the material to the aggressive environment. In this Special Issue, degradation mechanisms, kinetics, and analyses, as well as different approaches aiming to increase the durability of cement-based materials in aggressive environments are highlighted and discussed. It is our pleasure to invite you to submit a manuscript for this Special Issue. Full papers, communications, and reviews are all welcome.

Guest Editors

Prof. Dr. Elena de la Fuente González

Department of Chemical Engineering and Materials, Universidad Complutense de Madrid, 28040 Madrid, Spain

Prof. Dr. Gustavo Tonoli

Department of Forest Science, Universidade Federal de Lavras, Lavras, CEP 37200-900, Brazil

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

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Materials (ISSN 1996-1944) was launched in 2008. The journal covers twenty-five comprehensive topics: biomaterials, energy materials, advanced composites, advanced materials characterization, porous materials, manufacturing processes and systems, advanced nanomaterials and nanotechnology, smart materials, thin films and interfaces, catalytic materials, carbon materials, materials chemistry, materials physics, optics and photonics, corrosion, construction and building materials, materials simulation and design, electronic materials, advanced and functional ceramics and glasses, metals and alloys, soft matter, polymeric materials, quantum materials, mechanics of materials, green materials, general. *Materials* provides a unique opportunity to contribute high quality articles and to take advantage of its large readership.

Editors-in-Chief

Prof. Dr. Maryam Tabrizian
1. Department of Biomedical Engineering, Faculty of Medicine and Health Sciences, McGill University, Montreal, QC H3A 2B6, Canada
2. Faculty of Dentistry and Oral Health Sciences, McGill University, 3640 Rue University, Montreal, QC H3A 0C7, Canada

Prof. Dr. Yuguang Ma
State Key Laboratory of Luminescent Materials and Devices, South China University of Technology, Guangzhou 510640, China

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