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Mechanical Behaviors of Materials: Modelling and Measurement (2nd Edition)

Guest Editor:

Prof. Dr. Ming-Tzer Lin

Graduate Institute of Precision Engineering, National Chung Hsing University, Taichung 402204, Taiwan

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Message from the Guest Editor

With advancements in modern materials, the relationship between mechanical behavior and novel material properties has become a critical issue in the field of engineering design and development.

Thanks to recent developments centered around computational power and data storage, multiscale modelling analysis has become available for the mechanical behavior study of material elements from macroscopic, microscale, and nanoscale approaches to the characterization of materials.

Moreover, novel developments of nondestructive, optical, acoustic, and image processing methods, etc., have actualized mechanical characterization and application endeavors in view of their ability to accurately measure displacements, strains, and stresses in real time and to gather full-field information without altering object conditions, making them fundamentally useful in complex fields, such as bioengineering, MEMS, high-precision metrology, etc.

This Special Issue aims to focus on multiscale advances in “Mechanical Behaviors of Materials: Modelling and Measurement”. The goal is to provide a forum on the state-of-the-art and frontier applications for modelling and characterization.



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Special Issue



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Editor-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

Message from the Editor-in-Chief

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Materials Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

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