



an Open Access Journal by MDPI

Metamaterials and Phononic Crystals

Guest Editors:

Dr. Jihong Ma

Department of Mechanical Engineering, University of Vermont, Burlington, VT 05405, USA

Dr. Yanyu Chen

Department of Mechanical Engineering, University of Louisville, Louisville, KY 40292, USA

Deadline for manuscript submissions: **20 September 2024**

Message from the Guest Editors

Phononic crystals (PnCs) and acoustic metamaterials (AMMs) are artificially architected materials endowed with the capabilities of wave manipulation, such as mechanical filtering and wave directionality, waveguiding, acoustic cloaking, and energy trapping. As unit cell characteristics determine the bulk wave propagation, the symmetry and topology of a unit cell can yield many more exotic features, such as the manifestation of bulk characteristics on edges or corners, also known as the bulk edge correspondence.

In this Special Issue of *Crystals*, we aim to solicit original research articles, letters, communications, and literature reviews on the development of phononic crystals and metamaterials.



Specialsue





an Open Access Journal by MDPI

Editor-in-Chief

Prof. Dr. Alessandra Toncelli Department of Physics, University of Pisa, 56126 Pisa, PI, Italy

Message from the Editor-in-Chief

Welcome to *Crystals*, the journal dedicated to the fascinating world of crystallographic research! Crystals are more than mere decorative elements; they hold the key to understanding the fundamental structure of matter. Our mission is to explore the crucial significance of this research across various fields. From medicine to technology, chemistry to geology, crystals play a vital role. Their structure provides insights into new advanced materials, innovative drugs, and groundbreaking technologies. Through *Crystals*, we delve into the microscopic world to discover solutions that will shape the future. Join us on a journey through the *Crystals*, where science merges with beauty and innovation.

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), Inspec, CAPlus / SciFinder, and other databases. **Journal Rank:** JCR - Q2 (*Crystallography*) / CiteScore - Q2 (*Condensed Matter Physics*)

Contact Us

Crystals Editorial Office MDPI, St. Alban-Anlage 66 4052 Basel, Switzerland Tel: +41 61 683 77 34 www.mdpi.com mdpi.com/journal/crystals crystals@mdpi.com X@Crystals_MDPI