Special Issue

Research and Application of Lithium-lon Batteries

Message from the Guest Editors

Lithium-ion batteries have been widely used in portable digital products, new energy vehicles, energy storage stations and other fields due to their advantages of high energy density, long service life, low self-discharge, and flexible shape design. At the same time, there has been a proliferation of research related to the improvement of the energy density of lithium-ion batteries to meet higher application requirements. As is widely known, the constituent materials of Li-ion batteries directly determine or influence the performance of the battery, such as electrodes, separators, electrolytes, conductive agents, binders and casing materials. In particular, by regulating the crystallization properties of materials, we can purposefully develop lithium-ion batteries with better performance. As a consequence, we are launching this Special Issue, entitled "Research and Application of Lithium-ion Battery", with the aim of publishing reports on the related aspects of lithium-ion battery research. We sincerely welcome experts and researchers to contribute relevant articles, letters and reviews to this edition of Crystals.

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Deadline for manuscript submissions

closed (30 September 2023)



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Impact Factor 2.4
CiteScore 5.0



mdpi.com/si/161910

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Impact Factor 2.4 CiteScore 5.0



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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.

Editor-in-Chief

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