





an Open Access Journal by MDPI

# **Battery Safety: Challenges and Perspectives**

Guest Editor:

#### Dr. Wojciech Mrozik

School of Engineering, Newcastle University, Newcastle upon Tyne NE1 7RU, UK

Deadline for manuscript submissions:

closed (30 November 2023)

# **Message from the Guest Editor**

Dear Colleagues,

Lithium-ion batteries (LiBs) have penetrated deeply into all levels of society at a rate that has exceeded our understanding of the attendant risks and hazards. They are found in a wide range of devices of diverse sizes, from mobile phones via micromobility devices (e.g., e-bikes) to electric vehicles (EV) and grid-scale battery energy storage systems (BESS). Even though relatively safe, like all technology, LiBs fail, and the ever-growing number of LiBs is likely to result in more failures.

It is mandatory to review and progress with the safety of LiBs as the technology landscape is changing fast.

This Special Issue aims to highlight new research concerning safety on various levels, from a single cell to grid-scale BESS. You are invited to submit your original research, reviews and opinion pieces on the topics of chemistry changes, the evolution of battery management systems, pack design or ways to mitigate or combat thermal runaway. These can be experimental or modeling studies. Materials concerning legislations and standards and assessments of the impact of LiBs' failure on the surrounding environment (car parks, households, ferries) are also welcomed.











an Open Access Journal by MDPI

### **Editor-in-Chief**

#### Prof. Dr. Karim Zaghib

Department of Chemical and Materials Engineering, Concordia University, Montréal, QC H3G 1M8, Canada

## **Message from the Editor-in-Chief**

Take the opportunity to publish your original scientific work or a review paper concerning battery materials, battery technology or battery application within this new open access journal. Along with material science, the journal also addresses engineering and multidisciplinary research topics, such as cell and system design or storage system integration. Publishing proffers visibility for the benefit of other experts and facilitates discussion of the research results within the field. You are invited to publish your work, read published papers and to participate in topical discussions.

#### **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,

Ei Compendex, CAPlus / SciFinder, and other databases.

Journal Rank: JCR - Q2 (Electrochemistry) / CiteScore - Q2 (Electrical and Electronic

Engineering)

#### **Contact Us**