





an Open Access Journal by MDPI

Sustainability Approaches in the Recycling of Light Alloys

Guest Editors:

Prof. Dr. Mohamad El Mehtedi

Department of Mechanical, Chemical and Materials Engineering, University of Cagliari, Cagliari, Italy

Dr. Mauro Carta

Department of Mechanical, Chemical and Materials Engineering, University of Cagliari, Cagliari, Italy

Deadline for manuscript submissions:

30 November 2024

Message from the Guest Editors

This Special Issue aims to explore the latest advances and approaches to sustainability in light alloy recycling. Contributors to this Special Issue are invited to submit innovative research, review articles, and case studies that highlight new methods, technologies, and strategies for recycling light alloys. Topics of interest include, but are not limited to:

- 1) Advances in light alloy scrap sorting and separation technologies.
- 2) New melting and purification techniques to improve the quality of recycled alloys.
- 3) Life cycle assessment and environmental impact analysis of light alloy recycling.
- 4) Development of alloys designed to facilitate recycling at the end of the product life cycle.
- 5) Case studies on the implementation of circular economy principles in the light alloy industry.
- 6) New recycling processes for light alloy scrap (e.g., solid-state recycling processes).











an Open Access Journal by MDPI

Editors-in-Chief

Prof. Dr. Hugo F. Lopez

Department of Materials Science and Engineering, College of Engineering & Applied Science, University of Wisconsin-Milwaukee, 3200 N. Cramer Street, Milwaukee, WI 53211, USA

Prof. Dr. Yong Zhang

Beijing Advanced Innovation Center of Materials Genome Engineering, State Key Laboratory for Advanced Metals and Materials, University of Science and Technology Beijing, 30 Xueyuan Road, Beijing 100083, China

Message from the Editorial Board

Metallic materials play a vital role in the economic life of modern societies; contributions are sought on fresh developments that enhance our understanding of the fundamental aspects related to the relationships between processing, properties and microstructure - disciplines in metallurgical field the ranging from processing. and mechanical behavior. phase transitions microstructural evolution, nanostructures, as well as unique metallic properties – inspire general and scholarly interest among the scientific community.

Author Benefits

Open Access: free for readers, with <u>article processing charges (APC)</u> 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 (*Metallurgy and Metallurgical Engineering*) / CiteScore - Q1

(Metals and Alloys)

Contact Us

Metals Editorial Office MDPI, Grosspeteranlage 5 4052 Basel, Switzerland Tel: +41 61 683 77 34 www.mdpi.com mdpi.com/journal/metals metals@mdpi.com X@Metals_MDPI