



an Open Access Journal by MDPI

Advanced High-Strength Steels (AHSS) Prepared as Bulk and Powder Metal

Guest Editor:

Prof. Dr. Tibor Kvačkaj

Bodva Industry and Innovation Cluster (BIIC), Budulov 174,04501 Moldava nad Bodvou, Kosice, Slovakia

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

Message from the Guest Editor

Dear Colleagues,

Advanced High Strength Steels (AHSS) are characterized by selected chemical composition, final microstructures, and physical properties that can be formed in bulk or powdered steel materials.

This Special Issue aims to present the latest works in the research and development of AHSS steels. We invite you to submit a manuscript to this Special Issue. Full papers, communications, and reviews are welcome for submission.

Potential topics include, but are not limited to:

(a) Materials base: AHSS steels prepared in bulk and PM form (introduction and characterization);

(b) Experimental techniques: controlled rolling and cooling, additive manufacturing, SPD techniques, plastic deformations at cryogenic temperatures, and heat treatment;

(c) Strengthening mechanisms to increase mechanical properties;

(d) New trends to increase mechanical properties;

(e) Application of AHSS.





mdpi.com/si/190630





an Open Access Journal by MDPI

Editor-in-Chief

Prof. Dr. Maryam Tabrizian

 Department of Biomedical Engineering, Faculty of Medicine and Health Sciences, McGill University, Montreal, QC H3A 2B6, Canada
Faculty of Dentistry and Oral Health Sciences, McGill University, 3640 Rue University, Montreal, QC H3A 0C7, Canada

Message from the Editor-in-Chief

Materials (ISSN 1996-1944) was launched in 2008. The iournal covers twenty-five comprehensive topics: biomaterials, energy materials, advanced composites. advanced materials characterization, porous materials, manufacturing processes and svstems. advanced nanomaterials and nanotechnology, smart materials, thin films and interfaces, catalytic materials, carbon materials, materials chemistry, materials physics, optics and photonics, corrosion, construction and building materials. materials simulation and design, electronic materials, advanced and functional ceramics and glasses, metals and alloys, soft matter, polymeric materials, quantum materials, mechanics of materials, green materials, general. Materials provides a unique opportunity to contribute high quality articles and to take advantage of its large readership.

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), PubMed, PMC, Ei Compendex, CaPlus / SciFinder, Inspec, Astrophysics Data System, and other databases.

Journal Rank: JCR - Q1 (Metallurgy and Metallurgical Engineering) / CiteScore - Q2 (*Condensed Matter Physics*)

Contact Us

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