

## Special Issue

# Metallic Foundry/Casting and Gating System Optimization

### Message from the Guest Editors

Foundry engineering remains one of the leading manufacturing techniques. However, to keep up with new and current trends, including ecological and resource optimization, it is necessary to continuously develop foundry science and practice. This Special Issue will serve as a forum for specialists in foundry engineering to share and explore the latest research results, mainly (but not only) in the field of optimization of foundry technologies: Design and manufacture of casting molds in any technology;

Using computer simulations to optimize the shapes of the mold cavity and gating systems with technological and machining allowances;

Results of model, semi-industrial, and industrial tests to improve the efficiency of using liquid metal (yield);

The processes of crystallization and solidification of castings in terms of limitations resulting from manufacturing conditions; valuable case studies are welcome;

Ecological aspects of implementing new and optimized technologies, materials and processes, including waste management;

Metallurgy of casting alloys, to obtain the highest quality liquid metal, which is a key requirement for the production of high-quality castings

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### Guest Editors

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### Deadline for manuscript submissions

closed (10 October 2023)



## Materials

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## About the Journal

### Message from the Editor-in-Chief

*Materials* (ISSN 1996-1944) was launched in 2008. The journal covers twenty-five comprehensive topics: biomaterials, energy materials, advanced composites, advanced materials characterization, porous materials, manufacturing processes and systems, 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.

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### Editor-in-Chief

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