

Special Issue

Advances in Additive Manufacturing

Message from the Guest Editor

Dear colleagues, This Special Issue highlights the current state of the art in understanding sources and causes of process variations in additive manufacturing using a diverse set of tools. Contributions are sought that cover topics of variations in starting materials and their effects on the additive manufacturing process and part properties, including but not limited to powder pedigree and their effects on the additive manufacturing process and part properties; variations in powder delivery and in case of powder-bed additive manufacturing, powder beds and their variations with powder spreading and ramifications on powder bed melting and solidification. Also of interest are variations in energy source characteristics; variations in build chamber gas flows and gas species or other relevant variations of the additive manufacturing process. Modeling and simulation approaches are relevant as well as experimental studies, the use of sensors, and other diagnostic tools. We invite full length papers with original research contributions, review papers, and communications with significant novel research content.

Guest Editor

Prof. Dr. Rainer J. Hebert

Department of Materials Science & Engineering, University of Connecticut, Storrs, CT, USA

Deadline for manuscript submissions

closed (28 February 2021)



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

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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.

Editor-in-Chief

Prof. Dr. Maryam Tabrizian

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

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