Special Issue

Laser Welding

Message from the Guest Editors

Laser welding is a high-energy process used in a wide range of advanced materials to obtain micro to macro sized joints in both similar and dissimilar combinations. Moreover, this technique is widely used in several industries such as automotive, aerospace, and medical industries as well as electrical devices. Although laser welding has been used for several decades now, significant and exciting innovations often arise from both the process and/or material's side. This Special Issue of *Metals* is dedicated to Laser Welding and aims to present new and recent developments related to this topic. Topics of interest include, but are not limited to: effects of laser welding on the material's microstructure and performance; development of laser welding procedures for new advanced materials; modelling and simulation of laser/material interaction, thermal effects, stresses and distortion; hybrid laser welding. Papers which combine both experimental and theoretical approaches are specially welcomed.

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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 the metallurgical field ranging from processing, mechanical behavior, phase transitions and microstructural evolution, nanostructures, as well as unique metallic properties – inspire general and scholarly interest among the scientific community.

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