Special Issue

Preparation, Microstructure Evolution and Mechanical Study of the Brazed Joints

Message from the Guest Editors

Joining is an important approach to fabricate components with complex shapes. For some specific materials, such as ceramics or ceramic matrix composites, brittle intermetallics or large area joining, brazing is often the best option. It can combine the advantages of two different materials and repair the expensive substrates such as engine blades instead of overall replacement, which can save a great deal in costs. For brazing of different materials, the wetting of the braze filler on the substrates, the control of the interfacial reactions and its mechanism as well as the residual stress of the brazed joints are still the main issues that need to be addressed. Recently, new materials are emerging and the harsh service conditions require brazed joints with stronger reliability. New approaches, mechanisms and technologies need to be developed to meet the application demands and promote the development of brazing. The Special Issue aims to collect the state-of-the-art research achievements, such as the preparation, microstructure evolution and mechanical study of brazed joints, and help researchers to better follow the newest research progress.

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Message from the Editor-in-Chief

Welcome to *Crystals*, the journal dedicated to the fascinating world of crystallographic research! Crystals are more than mere decorative elements; they hold the key to understanding the fundamental structure of matter. Our mission is to explore the crucial significance of this research across various fields. From medicine to technology, chemistry to geology, crystals play a vital role. Their structure provides insights into new advanced materials, innovative drugs, and groundbreaking technologies. Through *Crystals*, we delve into the microscopic world to discover solutions that will shape the future. Join us on a journey through the *Crystals*, where science merges with beauty and innovation.

Editor-in-Chief

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