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Laser-Induced Surface Modification

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Deadline for manuscript submissions:
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Message from the Guest Editors

Dear Colleagues,

Due to the unique properties of laser, since its development in the middle of the 20th century, it has been widely used in science and technology research and industrial production. Laser surface modification is a new application of laser in the field of surface technology which can greatly improve the hardness, wear resistance, and corrosion resistance of metal materials' surfaces. The microstructure formed after laser melting has high chemical uniformity and a very fine grain, which strengthens the alloy and greatly improves wear resistance. Therefore, in the field of surface treatment, the research and development of laser surface modification is quite active. After decades of development, laser surface modification technology, such as laser shock processing, laser quenching, femtosecond laser processing, and laser cladding, has been widely applied to aerospace, petrochemical, energy, transportation, metallurgy, and other fields. In this Special Issue, studies on recent advances in laser-induced surface modification of metallic parts formed through conventional or additive manufacturing is welcome.

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Editor-in-Chief

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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.

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