Special Issue

Advances in Thermal Protection Composite Materials: Fabrication, Structures, Properties and Applications

Message from the Guest Editor

Thermal protection materials have been a very active field of research in the last few decades with the development of hypersonic vehicles. Significant advances in this field have been achieved as a result of interdisciplinary research related to new thermal protection materials, materials fabrication, aerodynamic heating, the ablation mechanism, and numerical methods. This Special Issue on “Advances in Thermal Protection Composite Materials: Fabrication, Structures, Properties, and Applications” intends to collect the latest developments in this field, written by well-known researchers who have contributed significantly in the numerical simulation, material fabrication, characterization of thermal protection composites, and materials properties as well as other applications. Topics addressed in this Special Issue may include, but are not limited to:

- Numerical simulation
- Aerodynamic heating
- The ablation mechanism
- Materials fabrication
- Material properties
- Industrial applications

Guest Editor

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About the Journal

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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