

Special Issue

Advanced Green Building Materials: Synthesis, Characterization and Sustainable Development Technologies

Message from the Guest Editors

This Special Issue calls for contributions that explore both theoretical and practical approaches to sustainable building materials and technologies. We invite research that delves into the development and application of green materials. Of particular interest are studies that focus on material innovations, carbon footprint reduction, energy-efficient building practices, and the recycling of industrial by-products for use in construction. Key topics of this Special Issue include, but are not limited to, the following:

- Innovative uses of renewable materials in construction, such as certified timber and hemp insulation;
- Development and application of low-carbon cement and concrete technologies;
- Integration of recycled industrial materials (e.g., wind turbine blades, etc.) into new building components;
- Energy-efficient building materials and technologies (e.g., photovoltaic panels, advanced insulation, etc.);
- Reduction in CO₂ emissions through sustainable material use;
- Health-focused construction materials, including low-VOC options;
- Case studies demonstrating the economic viability of sustainable building technologies.

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About the Journal

Message from the Editorial Board

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.

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