Special Issue

Recent Progress on Porous Carbon and Its Derivatives as Advanced Electrode Materials

Message from the Guest Editors

The wide array of possible synthesis routes to obtain carbon materials with diverse structures, chemical compositions, and physical properties, yields an excellent material class for the preparation of electrodes for a variety of electrochemical applications. Carbon-based electrode materials play a critical role in these applications, for example in electrical double layer capacitors, batteries, sensors, fuel cells, etc. Carbon materials that are used vary greatly from pure carbon, in the form of fibers, nanotubes, nanohorns, and onions, to modified carbons with functional groups, active-site additives or in composites with other materials. Carbon materials with different porous structures, from macro- and mesoporous to highly ultramicroporous and closed porosity carbon materials, are of high interest and applicability for various electrochemical processes. The Special Issue will deal with the design, synthesis, characterization, and electrochemical investigation of carbon materials as electrode materials in all possible applications. We would like to invite you to submit full papers, short communications, and reviews for this Special Issue.

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Deadline for manuscript submissions

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Message from the Editor-in-Chief

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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