



Smart Nanogenerators

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Message from the Guest Editors

Dear Colleagues,

Since 2012, the development of triboelectric nanogenerator (proposed by Prof. Zhong Lin Wang) has demonstrated itself as an efficient power source to directly drive microelectronics or charge capacitor/battery for a self-powered sensing system. In addition to the benefits of cost-effectiveness, easy fabrication, and robust capability, nanogenerators are “smart” in their versatility to function beyond energy harvesting and work as active/self-powered nanosensors with no external input power, which are mini-sized and eco-friendly to eliminate the use of environmentally harmful materials in battery. The development of these nanogenerators has pushed its feasible applications in a wide range of fields. This Special Issue of Nanomaterials will attempt to cover the recent achievements in the fields of nanogenerators and self-powered nanosensors.

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Message from the Editor-in-Chief

Nanoscience and nanotechnology are exciting fields of research and development, with wide applications to electronic, optical, and magnetic devices, biology, medicine, energy, and defense. At the heart of these fields are the synthesis, characterization, modeling, and applications of new materials with lower nanometer-scale dimensions, which we call “nanomaterials”. These materials can exhibit unusual mesoscopic properties and include nanoparticles, coatings and thin films, metal-organic frameworks, membranes, nano-alloys, quantum dots, self-assemblies, 2D materials such as graphene, and nanotubes. Our journal, *Nanomaterials*, has the goal of publishing the highest quality papers on all aspects of nanomaterial science to an interdisciplinary scientific audience. All of our articles are published with rigorous refereeing and open access.

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