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# High Capacity Electrode Materials for Advanced Lithium Ion Batteries

Guest Editor:

### Dr. Gaind P. Pandey

Giner Inc., Newton, MA 02466,

Deadline for manuscript submissions:

closed (31 July 2019)

# **Message from the Guest Editor**

Dear Colleagues,

High energy density LIBs need both anode and cathode materials with high capacities for hosting Li-ions. In response to this demand, considerable research efforts have been directed toward improving the energy density of batteries by developing high-capacity electrode materials such as Li-rich (or Li-excess) cathodes, Ni-rich cathodes, and Si anodes, and other high-capacity anode and cathode materials. High-capacity anode research, in particular, has been active, and materials such as silicon (Si), tin (Sn), germanium (Ge) and tin oxides (SnOx) have received significant attention. To address the most state-of-the-art in the research and development of high capacity electrodes (both anode and cathode) for lithium-ion batteries. The contents of the manuscripts will include, but are not limited to, the following topics:

- High capacity cathode materials for lithium-ion batteries
- High capacity anode materials for lithium-ion batteries
- Alloying anode (e.g., Si. Sn, Ge, etc.)
- New design and concept for high capacity electrodes
- Methods for performance analysis and material characterization
- Various cell design with different combination of anode and cathode.
   Specialsue









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## **Editor-in-Chief**

# **Prof. Dr. Giulio Nicola Cerullo**Dipartimento di Fisica, Politecnico di Milano, Piazza L. da Vinci 32, 20133 Milano, Italy

# **Message from the Editor-in-Chief**

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