



Advances in Lanthanide Coordination Chemistry

Guest Editor:

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Message from the Guest Editor

Dear Colleagues,

Lanthanides, due to their specific electronic properties, making them suitable candidates for the design of single-molecule/chain magnets, photoluminescent compounds or catalysts having a wide range of potential applications. The coordination chemistry of lanthanide is central to obtaining the requested electronic properties and to reaching the targeted physical properties. Chemists, physicists, and theorists are working hand in hand to enhance the performances of lanthanide-based materials through the coordination chemistry of lanthanide. For example, coordination of organic chromophore is able to overcome the Laporte forbidden rules allowing the observation of efficient photoluminescence sensitization and exclusive axial coordination of strong Lewis basis ligands, leading to high blocking temperature in SMMs.

This Special Issue aims at publishing a collection of research contributions highlighting the recent achievements in lanthanide coordination chemistry to favor specific ingredients such as crystal field splitting, magnetic anisotropy, etc. for the observation of photoluminescence, slow magnetic relaxation, MOFs, catalytic reaction, etc.

