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Research Progress on Two-Dimensional Materials

Guest Editor:

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Message from the Guest Editor

The field of two-dimensional (2D) materials has seen significant advances in both fundamental science and applications. The tremendous variety of 2D materials, such as graphene, hexagonal boron nitride, transition metal dichalcogenides and phosphorene, and their van der Waals heterostructures produce diverse electronic, optical and mechanical properties according to their unique bandgap structures. Such diversity is a rich source for novel phenomena, such as valleytronics, twistrionics and topology, together with novel electro-optical devices, which cannot be achieved using conventional technologies based on bulk materials. Therefore, this Special Issue aims to introduce recent progress in 2D materials, as well as their applications, for a wide range of topics.

All topics related to 2D materials, including novel physics, fabrication methods, ab initio calculations, biological and chemical sensors and electronic and/or optical devices, are welcome.

I hope this Special Issue inspires both academic and industrial communities towards breaking new ground.



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Special Issue



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Message from the Editor-in-Chief

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