

Special Issue

Advances in Molecular Biophysics of Protein-Protein Interactions

Message from the Guest Editors

Protein–protein interactions (PPIs) play a critical role in biological processes and can be mapped experimentally or theoretically. Curated binary PPI networks (PINs), such as the BioGRID and STRING databases, often contain thousands or even millions of PPIs within a proteome or a set of proteins. Recent developments in molecular biophysics have enabled spatial and temporal PPI detection in cells. With the release of AlphaFold2 (AF2), the AF2 database (AFDB), and other tools (e.g., RoseTTAFold), accurate structure models of proteins and protein complexes have also become available. This Special Issue focuses on recent advances in molecular biophysics regarding protein–protein interactions. Possible topics include, but are not limited to: single-molecular PPI detection, single-cell PPI mapping, the protein interaction network, the protein complex, protein aggregation, protein–protein docking, protein–protein binding affinity, and the evolution of PPIs. We welcome experimental and theoretical contributions reports, reviews, and perspectives.

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The International Journal of Molecular Sciences (*IJMS*, ISSN 1422-0067) is an open access journal, which was established in 2000. The journal aims to provide a forum for scholarly research on a range of topics, including biochemistry, molecular and cell biology, molecular biophysics, molecular medicine, and all aspects of molecular research in chemistry. *IJMS* publishes both original research and review articles, and regularly publishes special issues to highlight advances at the cutting edge of research. We invite you to read recent articles published in *IJMS* and consider publishing your next paper with us.

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