

BISB BOOTCAMP SUMMER SEMINAR SERIES

September 9th, 2021 | 12:00 PM PST – 1:00 PM PST

Zoom ID: 969 2714 6510



PRINCIPLES BEHIND GENE REGULATION AND PROTEIN-PROTEIN INTERACTIONS

Wei Wang, Ph.D.

Wei Wang is a Professor in the Department of Cellular and Molecular Medicine and Department of Chemistry and Biochemistry. His interdisciplinary group is interested in understanding the regulatory mechanisms underlying cell fate decision using multi-scale approaches that integrate computational and experimental investigation of epigenetic regulation. Using molecular modeling of protein structures to bioinformatics and statistical learning analyses, his group aims to uncover the fundamental principles that govern cell fate decision in development and cellular reprogramming and design strategies to intelligently manipulate cell state.



PROFOUND TET DEFICIENCY RESULTS IN MYELOID EXPANSION CHARACTERIZED BY HETEROCHROMATIN DYSFUNCTION

Isaac F. López-Moyado, Ph.D. (PI: Anjana Rao)

Cancer genomes are characterized by focal increases in DNA methylation that co-occur with widespread hypomethylation of heterochromatin. While the consequences of DNA hypermethylation are well-documented (e.g., silencing of tumor suppressor genes), the role of hypomethylation is not well understood. Isaac F. López-Moyado is a Postdoctoral Fellow in the Anjana Rao Laboratory at the La Jolla Institute for Immunology. His research focuses on the potential contribution of heterochromatic DNA hypomethylation as a hallmark of cancer and the consequential transcription of repeat elements to inflammation and premalignant expansion.