Dr. Hyun Kil Shin

Department of AI Drug Discovery,
Duksung Women's University, Republic of Korea

Dr. Hyun Kil Shin is an Assistant Professor in the Department of AI Drug Discovery at Duksung Women's University, Republic of Korea. His research centers on chemoinformatics, QSAR, artificial intelligence, toxicity prediction, and nanotoxicity, with emphasis on in silico and new-approach methodologies for chemical and nanomaterial safety assessment. He earned his Ph.D. in Biotechnology from Yonsei University in 2018, where his dissertation focused on in silico methods for nanotoxicity analysis, including cytotoxicity classification modeling and meta-analysis of Daphnia magna experiments, and received his B.S. in Biology/Computer Engineering from Ajou University in 2011.

Before joining Duksung Women's University, Dr. Shin served as a Senior Researcher at Korea Institute of Toxicology (KIT) and as an Assistant Professor at UST. He has contributed to national R&D programs on AI-based pharmaceutical safety and efficacy prediction, alternative test methods, environmental hazard management, and nano-QSAR approaches for nanomaterial regulation and risk assessment.

His recent publications include work in ACS Nanoscience Au, RSC Advances, Toxicology and Applied Pharmacology, Food and Chemical Toxicology, Nano Today, Chemosphere, NanoImpact, and Journal of Cheminformatics. His recent research includes NanoToxRadar, a multitarget nano-QSAR model for cytotoxicity prediction of multicomponent nanoparticles, and QSAR/NAM frameworks for chemical toxicity and safety evaluation.