

## 이형진 (Hyeongjin Lee)

Assistant Professor Korea University

## Educational Background & Professional Experience

2023-Present	Assistant professor, Department of Biotechnology and
	Bioinformatics, Korea University
2020-2023	Senior Researcher, Institute of Biotechnology and Bioengineering, SungKyunKwan
	University (SKKU), South Korea
2017-2020	Postdoctoral Fellow, Wake Forest Institute for Regenerative Medicine, Wake Forest
	School of Medicine, USA
2016-2017	Postdoctoral Fellow, Institute of Biotechnologt and Bioengineering, SungKyunKwar
	University (SKKU), South Korea
2012-2013	Scientist, Biomedical Engineering, Cornell University, USA
2011-2016	Ph.D. Biomechatronic Engineering, Sungkyunkwan University, South Korea

## Research Interests

My research interests encompass various disciplines, including electro/mechanical/bio convergence, 3D microenvironment design for tissue engineering applications, 3D bioprinting systems for composite tissues and organs, bio-conjugation and bio-integration between biomaterials and cells/tissues, drug/protein delivery systems, natural polymer synthesis, bioreactor systems for pretreatment.

## Publications

- H. Hwangbo<sup>+</sup>, H. Lee<sup>+</sup>, E-J Jin, Y. Jo, J. Son, H. M. Woo<sup>\*</sup>, D. Ryu<sup>\*</sup>, G. H. Kim<sup>\*</sup>, Photosynthetic Cyanobacteria can Clearly Induce Efficient Muscle Tissue Regeneration of Bioprinted Cell-Constructs, Adv. Funct. Mater., 2209157, 2022. (†co-first author) (IF=19.924, JCR 4.66% (Top 5%)).
- H. Hwangbo<sup>+</sup>, H. Lee<sup>+</sup>, E. J. Jin, J. Y. Lee, Y. Jo, D. Ryu<sup>\*</sup>, G. H. Kim<sup>\*</sup>, Bio-printing of aligned GelMa-based cell-laden structure for muscle tissue regeneration, Bioact. Mater., 8, 57, 2022. (†co-first author) (IF=16.874, JCR 1.14% (Top 5%)).
- J.Y. Kim<sup>+</sup>, H. Lee<sup>+</sup>, E.-J. Jin, Y. Jo, B. E. Kang, D. Ryu, G. H. Kim<sup>\*</sup>, A Microfluidic device to fabricate one-step cell bead-laden hydrogel struts for tissue engineering, Small, 18, 2106487, 2021. (†co-first author) (IF=15.153, JCR 6.52% (Top 10%)).
- 4. W. Kim<sup>+</sup>, H. Lee<sup>+</sup>, C. K. Lee<sup>+</sup>, J. W. Kyung, S. B. An, I.-B. Han<sup>\*</sup>, G. H. Kim<sup>\*</sup>, A Bioprinting Process Supplemented with In Situ Electrical Stimulation Directly Induces Significant Myotube Formation and Myogenesis, Adv. Funct. Mater., 2105170, 2021. (<sup>+</sup>co-first author, Selected as a cover article) (IF=19.924, JCR 4.66% (Top 5%)).
- 5. H. Lee<sup>+</sup>, W. Kim<sup>+</sup>, J. Lee, K. S. Park, J. J. Yoo, A. Atala, G. H. Kim<sup>\*</sup>, S. J. Lee<sup>\*</sup>, Self-aligned myofibers in 3D bioprinted extracellular matrix-based construct accelerate skeletal muscle function restoration, Appl. Phys. Rev., 8, 021405, 2021. († co-first author, Selected as a featured article) (IF=19.527, JCR 5.28% (Top 10%)).



**Curriculum Vitae**