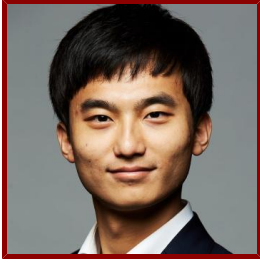


# Stanford

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## YoungJu Jo

Ph.D. Student in Applied Physics, admitted Autumn 2018

### Bio

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#### HONORS AND AWARDS

- Bio-X Bowes Fellowship, Stanford University (2020)
- Asan Foundation Biomedical Science Scholarship, Asan Foundation (2018)
- KAIST Creativity and Challenge Award, KAIST (2018)
- Samsung HumanTech Paper Award (Silver), Samsung Electronics (2017)
- Talent Award of Korea, Republic of Korea Government (2015)
- SPIE Optics and Photonics Education Scholarship, SPIE (2014)
- KAIST Presidential Fellowship, KAIST (2013)

#### EDUCATION AND CERTIFICATIONS

- M.S., Stanford , Biology (2020)
- B.S., KAIST , Physics and Mathematics (2018)

#### STANFORD ADVISORS

- Karl Deisseroth, Doctoral Dissertation Advisor (AC)

#### LINKS

- Personal Website: <https://sites.google.com/view/youngjujo>

### Publications

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#### PUBLICATIONS

- **Label-Free Tomographic Imaging of Lipid Droplets in Foam Cells for Machine-Learning-Assisted Therapeutic Evaluation of Targeted Nanodrugs.** *ACS nano*  
Park, S., Ahn, J. W., Jo, Y., Kang, H. Y., Kim, H. J., Cheon, Y., Kim, J. W., Park, Y., Lee, S., Park, K.  
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- **Optogenetic activation of intracellular antibodies for direct modulation of endogenous proteins.** *Nature methods*  
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- **Cycle-consistent deep learning approach to coherent noise reduction in optical diffraction tomography** *OPTICS EXPRESS*  
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- **Intensimetric biosensors visualize the activity of multiple small GTPases in vivo** *NATURE COMMUNICATIONS*  
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- **Learning-based screening of hematologic disorders using quantitative phase imaging of individual red blood cells** *BIOSENSORS & BIOELECTRONICS*  
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- **Deep-Learning-Based Label-Free Segmentation of Cell Nuclei in Time-Lapse Refractive Index Tomograms** *IEEE ACCESS*  
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- **Quantitative Phase Imaging and Artificial Intelligence: A Review** *IEEE JOURNAL OF SELECTED TOPICS IN QUANTUM ELECTRONICS*  
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- **Label-Free Identification of Lymphocyte Subtypes Using Three-Dimensional Quantitative Phase Imaging and Machine Learning.** *Journal of visualized experiments : JoVE*  
Yoon, J., Jo, Y., Kim, Y. S., Yu, Y., Park, J., Lee, S., Park, W. S., Park, Y.  
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- **Holographic deep learning for rapid optical screening of anthrax spores** *SCIENCE ADVANCES*  
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- **Identification of non-activated lymphocytes using three-dimensional refractive index tomography and machine learning** *SCIENTIFIC REPORTS*  
Yoon, J., Jo, Y., Kim, M., Kim, K., Lee, S., Kang, S., Park, Y.  
2017; 7: 6654
- **Collaborative effects of wavefront shaping and optical clearing agent in optical coherence tomography** *JOURNAL OF BIOMEDICAL OPTICS*  
Yu, H., Lee, P., Jo, Y., Lee, K., Tuchin, V. V., Jeong, Y., Park, Y.  
2016; 21 (12): 121510
- **Label-free identification of individual bacteria using Fourier transform light scattering** *OPTICS EXPRESS*  
Jo, Y., Jung, J., Kim, M., Park, H., Kang, S., Park, Y.  
2015; 23 (12): 15792–805
- **Angle-resolved light scattering of individual rod-shaped bacteria based on Fourier transform light scattering** *SCIENTIFIC REPORTS*  
Jo, Y., Jung, J., Lee, J., Shin, D., Park, H., Nam, K., Park, J., Park, Y.  
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- **Quantitative Phase Imaging Techniques for the Study of Cell Pathophysiology: From Principles to Applications** *SENSORS*  
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