



## Dongjae Shin

Postdoctoral Scholar, Photon Science, SLAC

### Bio

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#### BIO

My current research focuses on the design of catalytic materials. I have studied atomistic phenomena on catalytic surfaces to develop materials with improved catalytic capability under the philosophy of rational design. To achieve this goal, I use computational approaches, e.g., first-principles calculations and artificial intelligence (AI). Applications include heterogeneous catalysis for exhaust emission control, hydrogen production, and utilization of emission gas to realize carbon neutralization.

#### PROFESSIONAL EDUCATION

- Bachelor of Science, University of Seoul (2016)
- Doctor of Philosophy, Pohang University of Science and Technology (2023)
- Master of Science, Korean Advanced Institute of Science & Technology (2018)
- Ph.D., Pohang University of Science and Technology (POSTECH) , Chemical Engineering (2023)
- M.S., Korea Advanced Institute of Science and Technology (KAIST) , Energy, Environment, Water and Sustainability (2018)

#### STANFORD ADVISORS

- Kirsten Winther, Postdoctoral Research Mentor
- Thomas Jaramillo, Postdoctoral Faculty Sponsor