

Stanford



Chaitanya K. Joshi

Postdoctoral Scholar, Biochemistry

CONTACT INFORMATION

- **Alternate Contact**

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Bio

BIO

I'm a Stanford Data Science Fellow and Postdoc at the Department of Biochemistry, working with Prof. Rhiju Das. I'm building lab-in-the-loop AI for RNA biology, bridging deep learning and high-throughput wet lab experiments at scale.

Previously, I completed my PhD in Computer Science at the University of Cambridge with Prof. Pietro Liò. My doctoral work focused on Geometric Deep Learning for molecular modelling and design. As a highlight, I developed gRNAd, a generative RNA inverse design framework that we used to create completely new-to-nature RNA structures and experimentally validated ribozymes in collaboration with Dr. Phil Holliger's group at MRC LMB. My research has been recognized by the Qualcomm Innovation Fellowship and the A*STAR National Science Scholarship. I've also been a research scientist intern at Prescient Design (Genentech) and FAIR Chemistry (Meta AI) during my PhD.

HONORS AND AWARDS

- Stanford Data Science Fellowship, Stanford Data Science (2025)
- Qualcomm Innovation Fellowship, Qualcomm Inc. (2024)
- National Science Scholarship, A*STAR, Singapore (2021)

PROFESSIONAL EDUCATION

- Ph.D., University of Cambridge, UK , Computer Science (2026)
- B.Eng., Nanyang Technological University, Singapore , Computer Science, Valedictorian (2019)

STANFORD ADVISORS

- Rhiju Das, Postdoctoral Faculty Sponsor

LINKS

- Personal Site: <https://www.chaitjo.com/>
- Stanford Data Science: <https://datascience.stanford.edu/people/chaitanya-krishna-joshi>
- Google Scholar: <https://scholar.google.com/citations?hl=en&user=cwxVFVgAAAAJ>
- Substack Blog: <https://chaitjo.substack.com/>
- X: <https://x.com/chaitjo/>

Publications

PUBLICATIONS

- **Template-based RNA structure prediction advanced through a blind code competition.** *bioRxiv : the preprint server for biology*
Lee, Y., He, S., Oda, T., Rao, G. J., Kim, Y., Kim, R., Kim, H., Heng, C. K., Kowanko, D., Li, H., Nguyen, H., Sampathkumar, A., Gómez, et al
2025