

Laust Rask

27 years old

M.Sc. Nanoscience 2025

+45 22 90 71 49

laustrask@live.dk

Nanoscience graduate with research experience in computational chemistry, QM/MM, and high-performance computing. Strong background in scientific analysis and writing, complemented by leadership experience as chairman of the Nanoscience Study Council.



Education

University of Copenhagen 2020-2025

M.Sc. & B.Sc. Nanoscience



Projects

Master Thesis: The project involved simulation of electron transfer through a molecular junction utilising quantum master equations. Grade: 10 (B)

Bachelor Thesis: Implementation of core excitations in Cluster Perturbation Theory this was done using the core-valence separation approximation. Grade: 12 (A)



Work Experience

Nanoscience Study Council // Chairman 2021-2024

Led the council for two years, representing student interests, coordinating meetings, and facilitating communication between students and faculty.

Ankerpladsen Agersø // Bistro Manager 2020

Responsible for coordinating a small team, handling customer service and maintaining high operational standards.

Moment // Substitute worker 2019-2020

Took on a variety of temporary roles, quickly adapting to new tasks and workplaces as needed.



Languages

Fluent in **Danish** and **English**, communication level in **German** and learning **French**.



Achievements

Nanoscience Student of the Year 2022 & 2024



Skills

Computational & Programming

- Quantum Chemistry software: *Dalton*, *Orca*, *VeloxChem*, *Penguin*, *VMD*, etc.
- Programming, data processing and visualisation: Mainly in *Python* due to its flexibility

Scientific & Analytical

- Scientific writing and documentation: *LaTeX*, *Word*
- Presentation and communication skills. Especially due to my education in the Danish
- Critical analysis of both experimental and theoretical data



Publication List

Accepted:

A. E. Hillers-Bendtsen, M. B. Johansen, T. J. v. Buchwald, P. G. I. L. Dünweber, L. H. Olsen, **L. Rask**, G. I. Junker, R. M. H. Knudsen, K. V. Mikkelsen "Penguin: A Python-based Program for Electronic Structure Calculations based on Coupled Cluster Theory" *The Journal of Physical Chemistry A* (Accepted 2025)

In Progress:

L. Rask, K. V. Mikkelsen "Conductance of a SubPc Molecular Junction using Redfield Theory" *TBD* (2025)

For more information please visit:

laustrask.github.io