

Karen Frilya Celine

National University of Singapore | karen.celine@u.nus.edu

Education

National University of Singapore, PhD in Computer Science Aug 2021 – present

- Thesis Advisors: Warut Suksompong (Primary), Frank Stephan, and Sanjay Jain

National University of Singapore, BSc (Hons.) in Applied Math Aug 2016 – Aug 2021

- Thesis Title: Bi-immunity for Functions
- Thesis Advisors: Frank Stephan and Sanjay Jain
- CAP: 4.80/5.0

National University of Singapore, BComp (Hons.) in Computer Science Aug 2016 – Aug 2021

- CAP: 4.71/5.0

Teaching Experience

Graduate Tutor, National University of Singapore Aug 2021 - present

- Courses taught: CS1231S Discrete Structures and CS1010S Programming Methodology

Publications

1. Karen Frilya Celine, Warut Suksompong, and Sheung Man Yuen. On the fairness of additive welfarist rules. In Proceedings of the 24th International Conference on Autonomous Agents and Multiagent Systems (AAMAS), 2025. Forthcoming
2. Karen Frilya Celine, Ziyuan Gao, Sanjay Jain, Ryan Lou, Frank Stephan, and Guohua Wu. Quasi-isometric reductions between infinite strings. In Proceedings of the 49th International Symposium on Mathematical Foundations of Computer Science (MFCS), pages 37:1–37:16, 2024
3. Karen Frilya Celine, Muhammad Ayaz Dzulfikar, and Ivan Adrian Koswara. Egalitarian price of fairness for indivisible goods. In Proceedings of the 20th Pacific Rim International Conference on Artificial Intelligence (PRICAI), pages 23–28, 2023
4. Cristian S. Calude, Karen Frilya Celine, Ziyuan Gao, Sanjay Jain, Ludwig Staiger, and Frank Stephan. Bi-immunity over different size alphabets. Theoretical Computer Science, 894:31–49, 2021

Thesis

1. Karen Frilya Celine. Bi-immunity for functions. Bachelor's thesis, National University of Singapore, Singapore, 2020

Awards and Scholarships

ASEAN Undergraduate Scholarship Jul 2016 - Jun 2021

- Full scholarship awarded to high-achieving students from an ASEAN country.

Faculty of Science Dean's List Dec 2020

- Awarded to the top 5% of each cohort for academic performance in the preceding semester.

School of Computing Dean's List Dec 2020

- Awarded to the top 5% of each cohort for academic performance in the preceding semester.

Simon Marais Mathematics Competition Top Decile Individual Oct 2020

- Annual undergraduate mathematics competition across Asia Pacific region.

Dunearn Road Hostel/Sheares Hall Alumni Scholarship Sep 2018

- Awarded to residents of Sheares Hall who have done well academically while being actively involved in the hall for the preceding two academic years.