

Specialisations and Competencies

Areas of Specialisation:

Philosophy of Logic and Mathematics, Mathematical Logic

Areas of Competence:

Epistemology, Philosophy of Language, Philosophy of Science, Computational Methods

Education and Appointments

2024–Present: Lecturer. Department of Philosophy, National University of Singapore

2024–2025: Part-Time Associate Professor. IFIKK, University of Oslo

2022–2023: Postdoctoral Researcher. IFIKK, University of Oslo

2019–2021: Postdoctoral Researcher. Fachbereich Philosophie, University of Konstanz

2016–2019: Postdoctoral Researcher. Kurt Gödel Research Center, University of Vienna

2012–2016: PhD Philosophy. Birkbeck, University of London

2010–2012: MPhil Stud. Philosophy. University College London

2007–2010: BA Philosophy. University College London.

Visiting Positions:

UC Irvine, LPS Visiting Scholar, March–July 2021. (Cancelled due to pandemic.)

Kurt Gödel Research Center, University of Vienna, Visiting Researcher, December 2014.

Harvard University, Visiting Research Fellow, January–May 2014.

Publications

Monographs:

1. (2024) *Iterative Conceptions of Set*, Cambridge University Press (part of the *Cambridge Elements* series). DOI: 10.1017/9781009227223

Peer-Reviewed Journal Articles:

2. (Forthcoming) Metasemantics and the Continuum Hypothesis. To appear in *Noûs*. Preprint: <https://philpapers.org/rec/BARMAT-17>
3. (Forthcoming) Countabilism and Maximality Principles (with Sy-David Friedman). To appear in the *Notre Dame Journal of Formal Logic*. Preprint: <https://philpapers.org/rec/BARCAM-5>
4. (2025) Mathematical Gettier Cases and Their Implications. To appear in the *Australasian Journal of Philosophy*. DOI: 10.1080/00048402.2025.2521736

5. (2025) Is (Un)Countabilism Restrictive? *Journal of Philosophical Logic*, Vol. 54, pp. 1061–1077 (2025). DOI: 10.1007/s10992-025-09812-8
6. (2024) Varieties of Class-Theoretic Potentialism (with Kameryn J. Williams). *The Review of Symbolic Logic*. Vol. 17(1), pp. 272–304. DOI: 10.1017/S1755020323000126
7. (2023) Are Large Cardinal Axioms Restrictive? *Philosophia Mathematica*, Vol. 31(3), pp. 372–407. DOI: 10.1093/phimat/nkad014
8. (2022) On Representations of Intended Structures in Foundational Theories (with Moritz Müller and Mihai Prunescu). *Journal of Philosophical Logic*, Vol. 51 (2), pp. 283–296. DOI: 10.1007/s10992-021-09628-2
9. (2021) Universism and Extensions of V (with Carolin Antos and Sy-David Friedman). *The Review of Symbolic Logic* , Vol. 14(1), pp. 112–154. DOI: 10.1017/S1755020320000271
10. (2020) Forcing and the Universe of Sets: Must we lose insight? *Journal of Philosophical Logic*, Vol. 49, pp. 575–612. DOI: 10.1007/s10992-019-09530-y.
11. (2020) Absence Perception and the Philosophy of Zero. *Synthese*, Vol. 197, pp. 3823–3850 DOI: 10.1007/s11229-019-02220-x
12. (2020) On Forms of Justification in Set Theory (with Claudio Ternullo and Giorgio Venturi). *The Australasian Journal of Logic*. Vol. 17(4), pp. 158–200, DOI: 10.26686/ajl.v17i4.6579
13. (2020) Maximality and ontology: how axiom content varies across philosophical frameworks (with Sy-David Friedman). *Synthese*, Vol. 197, 623–649, DOI: 10.1007/s11229-017-1336-9.
14. (2020) Inner-Model Reflection Principles (with Andrés Eduardo Caicedo, Gunter Fuchs, Joel David Hamkins, Jonas Reitz, and Ralf Schindler). *Studia Logica*, Vol. 108, pp. 573–595, DOI: 10.1007/s11225-019-09860-7
15. (2017) Independence and Ignorance: How agnotology informs set-theoretic pluralism. *Journal of Indian Council of Philosophical Research*, Vol. 34(2), pp. 399–413. DOI: 10.1007/s40961-017-0102-1
16. (2016) Richness and Reflection. *Philosophia Mathematica*, Vol. 24(3), pp. 330–359. DOI: 10.1093/phimat/nkv036

Peer-Reviewed Book Chapters:

17. (2025) Language, Models, and Reality: Weak existence and a threefold correspondence (with Giorgio Venturi). In: Antos, C., Barton, N., Venturi, G. (eds) *The Palgrave Companion to the Philosophy of Set Theory*. Palgrave Macmillan, Cham. DOI: 10.1007/978-3-031-62387-5_14
18. (2024) Reflection in Apophatic Mathematics and Theology. In Mirosław Szatkowski (ed.), *Ontology of Divinity*, De Gruyter. pp. 583–612. 2024. DOI: 10.1515/9783111332536-031
19. (2022) Structural Relativity and Informal Rigour. In: G. Oliveri, C. Ternullo, S. Boscolo (eds.), *Objects, Structures, and Logics*, Boston Studies in the Philosophy and History of Science, vol 339. Springer, Cham. DOI: 10.1007/978-3-030-84706-7_6
20. (2021) Indeterminateness and ‘The’ Universe of Sets: Multiversism, Potentialism, and Pluralism. In M. Fitting (ed.) *Research Trends in Contemporary Logic* (Landscapes in Logic), pp. 105–182. College Publications.

21. (2019) Set Theory and Structures (with Sy-David Friedman). In: S. Centrone, D. Kant, D. Sarikaya (eds.) *Reflections on the Foundations of Mathematics*. Synthese Library (Studies in Epistemology, Logic, Methodology, and Philosophy of Science), vol 407. Springer, Cham pp. 223–253. DOI: 10.1007/978-3-030-15655-8_10
22. (2016) Multiversism and Concepts of Set: How Much Relativism is Acceptable? In: F. Boccuni and A. Sereni (eds.) *Objectivity, Realism, and Proof: FilMat Studies in the Philosophy of Mathematics* (Boston Studies in the History and Philosophy of Science, Vol. 318), Springer, pp. 189–209. DOI: 10.1007/978-3-319-31644-4_11

Reviews:

23. (2025) Button, Tim; Level Theory Parts 1–3, *Bulletin of Symbolic Logic* 31 (4): 686–689. 2025. DOI: 10.1017/bsl.2024.58
24. (2020) Landry, Elaine (ed.) *Categories for the Working Philosopher. Philosophia Mathematica*, Vol. 28, Issue 1, pp 95–108, DOI: 10.1093/philmat/nkz020
25. (2015) Friend, Michèle; *Pluralism in Mathematics. Philosophy*, Vol. 90, No. 4, pp. 685–691. DOI: 10.1017/S0031819115000248

Editorial Work:

26. (2025) Editor (with Carolin Antos and Giorgio Venturi) *The Palgrave Companion to the Philosophy of Set Theory*. Palgrave Macmillan. DOI: 10.1007/978-3-031-62387-5
27. (2020) Editor (with Carolin Antos, Sy-David Friedman, Claudio Ternullo, and John Wigglesworth), *Synthese* special issue on the Foundations of Mathematics, *Synthese*, Volume 197, pp. 469–475. DOI: 10.1007/s11229-019-02422-3

PhD Thesis:

28. (2017) *Executing Gödel's Programme in Set Theory*. PhD Thesis, Birkbeck.

In Progress/Submitted:

I have several as yet unpublished papers and works in progress, of which the following have been submitted:

1. A paper on how examining mathematics can inform our understanding of the aims and norms of inquiry.
2. A paper on desiderata for different modal theories of sets.
3. A paper on how indeterminate terms are used in mathematics.
4. A co-authored paper examining how one can formalise mathematical foundations using imperatives.

Teaching

2024–Present: Lecturer, National University of Singapore

Advanced/Graduate:

Philosophy of Science and Technology. Spring 2024–2025.

Intermediate:

Language and Thought. Spring 2025–2026.

Quantification and Modality. Autumn 2025–2026.

Introductory:

Philosophy of Language. Autumn 2024–2025.

Logic. Autumn 2024–2025.

Computational Reasoning. Spring 2023–2024, Spring 2024–2025, Autumn 2025–2026, Spring 2025–2026, Autumn 2026–2027.

Undergraduate Teaching Opportunities. Spring 2024–2025, Autumn 2025–2026, Spring 2025–2026, Autumn 2026–2027.

2022–2023: Lecturer, University of Oslo.

Examen Philosophicum Lectures (introductory philosophy lectures for first-year students from all disciplines). Autumn 2023–2024.

Epistemology and Philosophy of Science (masters students). Spring 2022–2023.

Philosophical Logic and the Philosophy of Mathematics (undergraduates in at least their second year and masters students). Spring 2021–2022.

2022–2023: Masters Supervision, University of Oslo.

I supervised a masters student on hinge epistemology and deep disagreement.

2019–2021: Lecturer, University of Konstanz.

Formale Logik (provided teaching cover for introductory undergraduate course). Summer 2020–2021.

Computers and Computations (masters students and advanced undergraduates). Winter 2020–2021.

Introduction to the Philosophy of Mathematics (undergraduates and masters students). Summer 2019–2020.

2020: Mentor for Online Masterclass: Lakatos' Undone Work. During the summer and autumn of 2020 I supervised two graduate students as part of an online masterclass, providing one-on-one supervision on their papers and career advice.

2016–2017: Research Tutorials. I have given research tutorials at the following conferences:

'The Hyperuniverse' *The Set-Theoretic Pluralism Network: Symposium II* (University of Bristol, June 2017). A series of two tutorials on the *Hyperuniverse Programme*.

'Independence and Maximality' (*Entia et Nomina*, University of Warsaw, September 2016) A series of three tutorials on tackling set-theoretic independence through maximality axioms.

Selected talks

I've given a lot of presentations, so for the sake of space I'll just mention the plenary/keynotes:

Metasemantics and the Continuum Hypothesis

Plenary talk at the Association of Symbolic Logic section of the *APA Central Division*, February 2026

Engineering set-theoretic concepts

Keynote talk at the *Annual Conference of Philosophy of Mathematics in China*, August 2024

Outreach

Podcast guest. *The Red Stone* (NUS's undergraduate philosophy journal). October 2025.

Podcast guest. Kopi Table, a podcast charting how Singapore has changed as a nation (specifically focusing on AI in education). September 2025.

Talk. Computation: How hard can it be? Philo-Bytes @ NYGH: Inter-school Dialogues. A talk at a workshop for talented high-school students on the philosophy of computers and computations. September 2025.

Interviewed for *Quanta* magazine (on the interaction between the philosophy of zero and cognitive science) subsequently published as:

(2024) Saplakoglu, Yasemin. How the Human Brain Contends With the Strangeness of Zero. *Quanta*.

Excerpts of that interview were also used for a *Quanta* podcast (of the same title), March 2025.

Organiser. Beyond the Numbers: Data Challenges in the Humanitarian Sector. National University of Singapore, March 2024.

This workshop brought together students from NUS studying Computational Reasoning and experts from the International Organization for Migration (the UN migration agency).

Selected Academic Awards

Personal Research:

AHRC Research Grant for PhD, Value: £46,770, 2012–2015.

Follett Scholarship, Value: £13,000, 2012.

A.J. Ayer Prize, 2009.

Conference Grants: Applications co-written with Carolin Antos, Claudio Ternullo, and John Wigglesworth.

Deutsche Forschungsgemeinschaft Grant for Symposium IV of *Symposia on The Foundations of Mathematics*, Value: €18,300, October 2017.

Mind Association Major Conference Grant for Symposium II of *Symposia on The Foundations of Mathematics*, Value: £1,400, January 2015.

British Society for The Philosophy of Science Grant for Symposium II of *Symposia on The Foundations of Mathematics*, Value: £1,000, January 2015.

British Logic Colloquium Grant for Symposium II of *Symposia on The Foundations of Mathematics*, Value: £600, January 2015.

Aristotelian Society Grant for Symposium II of *Symposia on The Foundations of Mathematics*, Value: £387, January 2015.

Service

Journal editorial work:

Ergo, Area Editor: Philosophy of Mathematics

Journal for the Philosophy of Mathematics, Editorial Board Member

Reviewer: *Analysis*, *Ancient Philosophy Today: Dialogoi*, *The Australasian Journal of Logic*, *Ergo*, *Erkenntnis*, *European Journal for Philosophy of Science*, *Foundations of Science*, *Internet Encyclopedia of Philosophy/Encyclopedia of Logic*, *Journal of Mathematical Logic*, *Journal of Philosophical Logic*, *Kriterion*, *Logic and Logical Philosophy*, *Logique et Analyse*, *Mind*, *Mathematical Logic Quarterly*, *Mathematical Reviews*, *Notre Dame Journal of Formal Logic*, *Noûs*, *Oxford University Press*, *Philosophia Mathematica*, *Philosophical Analysis* (de Gruyter), *Philosophy and Phenomenological Research*, *Synthese*, *The Review of Symbolic Logic*, *Theoria*.

Teaching Peer review: (2024) Internal teaching peer review.

Examinations: (2022-2023) External examiner for masters thesis at UNICAMP.

Conferences/Seminar Series:

Co-organiser: (In)determinacy in Mathematics, National University of Singapore, November 2024.

Co-organiser: Generative Metaphysics and the Philosophy of Mathematics, University of Oxford, March 2023.

Co-organiser: Colloquium Logicum, University of Konstanz, September 2022.

Co-organiser: Engineering The Concept of Collection, University of Oslo, June 2022.

Co-organiser: UNICAMP-Konstanz Philosophy of Set Theory Seminar, March–June 2021.

Co-organiser: Set Theory: Bridging Mathematics and Philosophy, University of Konstanz, 29–31 July 2019.

Co-organiser: Symposia on The Foundations of Mathematics:

Symposium I: Kurt Gödel Research Center, University of Vienna, 7-8 July 2014.

Symposium II: Institute of Philosophy, London, 12-13 January 2015.

Symposium III: Kurt Gödel Research Center, University of Vienna, 21-23 September 2015.

Symposium IV: Munich Center for Mathematical Philosophy, LMU, 9-11 October 2017.

Organising Committee Member: 2014 Edgington Lectures, 24–25 January 2014.