

# Ivan Di Liberti

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## Appointments

### Postdoc

CZECH ACADEMY OF SCIENCES, INSTITUTE OF MATHEMATICS  
Grant: GX20-31529X  
Coordinator: Wiesław Kubiś

Prague, Czech Republic

Jul 2020 - Present

## Education

### Ph.D. in Mathematics

MASARYK UNIVERSITY  
Dissertation: The Scott adjunction  
Advisor: Jiří Rosický

Brno, Czech Republic

Feb. 2017 - Sept. 2020

### MSc in Mathematics

UNIVERSITÀ DI PISA  
Dissertation: A survey on Barr's Theorem  
Advisors: Nicola Gambino, Alessandro Berarducci

Pisa, Italy

Mar. 2015 - Dec. 2016

### BSc in Mathematics

UNIVERSITÀ DI PISA  
Dissertation: Definable groups in o-minimal structures  
Advisor: Alessandro Berarducci

Pisa, Italy

Sept. 2011 - Mar. 2015

## Publications

- 2020   **Gabriel-Ulmer duality for topoi and its relation with site presentations**, Applied Categorical Structures, [10.1007/s10485-020-09605-x](https://doi.org/10.1007/s10485-020-09605-x)   *j/w Julia Ramos Gonzalez*
- 2020   **Codensity: Isbell duality, pro-objects, compactness and accessibility**, Journal of Pure and Applied Algebra, [10.1016/j.jpaa.2020.106379](https://doi.org/10.1016/j.jpaa.2020.106379)
- 2019   **Weak saturation and weak amalgamation property**, Journal of Symbolic Logic, [10.1017/jsl.2019.45](https://doi.org/10.1017/jsl.2019.45)
- 2018   **Homotopical Algebra is not concrete**, J. Homotopy Relat. Struct., [10.1007/s40062-018-0197-3](https://doi.org/10.1007/s40062-018-0197-3)   *j/w Fosco Loregian*

## Conference Proceedings

- 2020   **Functorial Semantics for Partial Theories**, Accepted by POPL21,   *j/w Loregian, Nester, Sobocinski*

## Preprints

- 2020   **Formal Model Theory & Higher Topology**, [arXiv:2010.00319](https://arxiv.org/abs/2010.00319). Ready for submission.
- 2020   **Towards higher topology**, [arXiv:2009.14145](https://arxiv.org/abs/2009.14145). Submitted.
- 2020   **General facts on the Scott Adjunction**, [arXiv:2009.14023](https://arxiv.org/abs/2009.14023). Submitted.
- 2020   **Enriched locally generated categories**, [arXiv:2009.10980](https://arxiv.org/abs/2009.10980). Submitted.
- 2019   **On the unicity of formal category theories**, [arXiv:1901.01594](https://arxiv.org/abs/1901.01594). Under revision.
- 2018   **Accessibility and Presentability in 2-categories**, [arXiv:1804.08710](https://arxiv.org/abs/1804.08710). Under revision.

## Teaching

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- 2020 **Category Theory**, Lecturer, Institute of Mathematics, Czech Academy of Science
- 2020 **Topology**, Teaching Assistant, Masaryk University
- 2019 **Topics in Category Theory**, Instructor, Masaryk University
- 2019 **Topology**, Teaching Assistant, Masaryk University
- 2018 **Topics in Category Theory**, Instructor, Masaryk University
- 2017 **Rings and Modules**, Teaching Assistant, Masaryk University

*j/w John Bourke*

*j/w John Bourke*

## Supervision

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Vít Jelínek, bachelor thesis in Computer Science, in progress

## Service

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- ItaCaFest I** Program committee
- MUAW** Masaryk University Algebra Webinar, Founder and main organizer until July 2020
- ItaCa I** Università di Milano, Program committee
- PSSL103** Masaryk University, Organizer
- Reader** Thesis Reader at Masaryk University
- MathOverflow** Active User