

Ioannis Tsouknidas

(Ιωάννης Τσουκνίδας)

Personal information

Birthplace & birthdate Athens | November 05, 1991

email kharga91@gmail.com, iotsouknidas@math.uoa.gr, i.tsouknidas@bimsa.cn

Positions

- Oct. 2021 - June 2022 Postdoctoral Teaching Fellow, [Department of Mathematics, University of Ioannina](#).
- Sept. 2021 - Feb. 2022 Papakyriakopoulos Postdoctoral Fellow, [School of Applied Mathematical and Physical Sciences, National Technical University of Athens \(NKUA\)](#).
- March 2022 - Sept. 2022 Postdoctoral Fellow, School of Applied Mathematical and Physical Sciences, **National Technical University of Athens**.
- Jan. 2023 - Dec. 2024 Postdoctoral Fellow, [Beijing Institute of Mathematical Sciences and Applications](#).

Education

- Oct. 2009 - Sept. 2014 BSc "Ptychion" in Mathematics, **University of Athens**.
Fall 2012 Exchange student under the *Erasmus* program, **Queen's University**, Belfast, N. Ireland.
- Oct. 2014 - Sept. 2016 MSc in Pure Mathematics, **University of Athens**.
Thesis focus: Geometric group theory.
Title: "*Automorphisms of amalgamated free products and applications*" (in Greek).
To read see the "contents" section in the weblink.
Advisor: prof. Dimitrios Varsos
- July 2017 - June 2021 Ph.D. in Algebra, Department of Mathematics, **University of Athens**.
Dissertation: "*Automorphisms of Algebraic Curves*". (in English).
Advisor: prof. **Aristides Kontogeorgis**.

Research interests

Algebraic curves and specifically; their automorphisms, deformations (in positive characteristic) and their syzygies (in zero characteristic).

Updated on February 17, 2023.

Research publications

1. *A cohomological treatise of HKG-covers with applications to the Nottingham group*, with A. Kontogeorgis, **Journal of Algebra**, to read click [here](#).
2. *A generating set for the canonical ideal of HKG-curves*, with A. Kontogeorgis, **Research in Number Theory**, to read click [here](#).
3. *Automorphisms and the canonical ideal*, with A. Kontogeorgis, A. Terezakis (2021), **Mediterranean Journal of Mathematics**, to read click [here](#),
4. *The canonical ideal of generalized Fermat curves*, in progress

Conferences, seminars and talks

- Fall 2017 Coorganized and contributed with three talks in the undergraduate & graduate students seminar, focused on **Riemann surfaces and Teichmüller spaces**. The notes (in greek) provided by the speakers are available [here](#).
- Fall 2018 Coorganized and contributed with a talk in the undergraduate & graduate students seminar, focused on **Arithmetic geometry**.
- July 16, 2019 **Summer Meeting of Young Researchers in Mathematics** (University of Athens).
A relation between HKG curves and the Nottingham group.
- June 12, 2022 **Recent trends in Algebra, Geometry, and Arithmetic**, RISAT Institute, Vlorë, Albania.
Szygies and Curves.
- July 8, 2022 **Second Congress of Greek Mathematicians SCGM-2022**
National Technical University of Athens, Greece.
Szygies and Curves.

Languages

English Fluent
German Good knowledge
(B2, 2021 Goethe Athen)

Software

\LaTeX Excellent knowledge
SAGE Working knowledge

Teaching

- Fall 2017 **Basic algebra** - teaching assistant (NKUA).
Fall 2021 **Gröbner Bases**, (University of Ioannina), **Linear Algebra**, (NKUA).
Spring 2022 **Rings and Modules, Algebraic curves** (University of Ioannina).

Grants, fellowships and scholarships

- 2014 - 2016 **Papadakis Bequest Scholarship**, University of Athens (ranked in the first three with a perfect score 20/20 in the 3-days examinations among participants from all the graduate schools of the University of Athens).
- 2018 - 2021 **Greek National Foundation Scholarship**. Doctorate scholarship through the Operational Programme «Human Resources Development, Education and Lifelong Learning» in the context of the project “Strengthening Human Resources Research Potential via Doctorate Research (MIS-5000432)”.
- Sept. 2021 - Feb. 2022 **Papakyriakopoulos Bequest Postdoctoral Fellowship**, to conduct postgraduate research in the School of Applied Mathematical and Physical Sciences, National Technical University of Athens.

Music

- 2006-2008 **Spring's ensemble** (μουσικό σύνολο άνοιξη) **Guitar (acoustic).**
- 2010-2014 **Spring's ensemble** (μουσικό σύνολο άνοιξη) **Alto sax.**
- 2017-2019 **Piano Plus Festival's choir.**