



First UMI meeting of PhD students, selected contributions

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The first UMI Meeting of PhD students took place in Padova in May 2022 as a part of the conference organized to celebrate 100 years of the Unione Matematica Italiana (UMI) and 800 years of the University of Padova. The UMI Meeting of PhD students was aimed at gathering young researchers who had recently obtained a PhD degree in Mathematics and to give them the opportunity to present their achievements in all fields of mathematics, ranging from the most abstract and theoretical to the closest to industrial collaborations and multi-disciplinary interactions. The participation in this meeting was large, showed the interest of young researchers in exchanging their results and promoted their interactions. After the first edition, the meeting will be held every two years.

This special issue comprises peer-reviewed contributions from participants in the first UMI Meeting of PhD students. It provides an overview, though not exhaustive, of the mathematical research conducted at a national level. The articles collected reflect the variety of research themes covered by the mathematical Italian community, e.g., algebra, algebraic geometry, calculus of variations, computational fluid dynamics, history of mathematics, mathematical modelling, numerical optimization, partial differential equations, stochastic processes, theory of didactics, topology.

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We sincerely thank all the authors who submitted their papers, and the referees for their effort and a very valuable contribution to this Special Issue. We also want to thank Prof. Rita Pardini, Managing Editor of *Bollettino dell'Unione Matematica Italiana*, for her constant support.

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