

## FOREWORD

We celebrate in this volume, two of the most prominent Romanian mathematicians, Laurențiu Păunescu and Alexander Suciu.



The contributions to this volume are mainly delivered by speakers and participants in the conference organized in their honor in Bucharest, during July 7–11, 2023.

**Laurențiu Păunescu** was born on August 10, 1952. His parents Gheorghe and Eufrosina Alexandrina had three children Claudiu, Laurențiu and Denisa. Laurențiu is married to Ileana and has a daughter, Mariuca, and a granddaughter, Anastasia.



He studied at the Faculty of Mathematics and Mechanics, University of Bucharest from 1971 to 1976. After graduation, he taught at the Industrial High School no. 20 in Bucharest until 1982, when he successfully competed for, and earned a position of Assistant Professor at the Faculty of Mathematics in Bucharest, department of Geometry and Algebra. In the same year he obtained a PhD scholarship under the supervision of Kostake Teleman.

In 1978, alongside with other gifted young Romanian mathematicians like Barbu Berceanu, Alexandru Dimca and Ștefan Papadima, he initiated the Topology Seminar which still runs to this day at

the Simion Stoilow Institute of Mathematics of the Romanian Academy. One of the products of this seminar was a book titled “Rational homotopy theory”, published in collaboration with Ștefan Papadima in 1981 at the National Institute for Scientific and Technical Creation (INCREST).

Because of the communist regime in Romania, Păunescu chose to emigrate to Australia, and in 1987 his doctoral position as well as his contract with the University of Bucharest was finished. Arriving in Australia in 1988 he obtained a PhD fellowship at the University of Sydney, and in 1991 he delivered his thesis “A weighted version of the Kuiper–Kuo–Bochnak–Łojasiewicz inequality” under the supervision of Tzee-Char Kuo. His thesis got the T.G. Room Medal for the best PhD thesis at the University of Sydney. As rare as it is, he got a position in the Mathematics Department at the University of Sydney, and since then he went through all academic stages. Currently, he is a Professor of Mathematics in the same department.

Păunescu’s mathematical interests focus on Real and Complex Singularities and related areas. Classification of real singularities up to “blow-analytic” equivalence, the interplay between the complex Milnor fiber of a complex function and the (real) Milnor fiber of the real part of the same function, the topology of real projective hypersurfaces using complex singularities techniques are among his favorite domains of research. During his activity he collaborated with twenty-one people and advised three PhD students. His mathematical interests substantiated in the Australian-Japanese workshop on Real and Complex Singularities, JARCS, which has been taking place biennially since 2005, for which he is the main organizer. In his spare time, he enjoys playing soccer and managing a Romanian soccer team in Sydney.

**Alexandru Ion Suciu** was born on January 1, 1953, in Bucharest in a medical-oriented family. His father, Traian, was a surgeon and his mother, Nicole, a medical technician, both at the “Filantropia” Hospital in Bucharest, where he was also born. He is married to Isabella and has three children, Christian, Anne-Marie, and Nathalie. His younger brother, Ștefan, is a biostatistician.

Between 1971 and 1976 he studied at the Faculty of Mathematics and Mechanics of the University of Bucharest, and after that he decided to emigrate to the United States. Fortunately, he wasn’t at home on the night of March 4, 1977, when the building where he used to live collapsed during the very powerful earthquake that hit Bucharest. He left Romania the next morning, with the last airplane allowed by the communist authorities to depart from Bucharest.



nick. For two years, he was a J.W. Gibbs Instructor at Yale University, and in 1986 he joined the faculty at Northeastern University in Boston, where he became a Professor of Mathematics in 2000.

Suciu's mathematical interests are focused on the relations of Topology with Algebra, Geometry, and Combinatorics. He started his research in high-dimensional knot theory, and soon after he became interested in arrangements of hyperplanes, being one of the main contributors in this subject in the past three decades. He studies cohomology jumping loci and their applications to hyperplane arrangements, Milnor fibrations, the topology of complex quasi-projective varieties, low-dimensional manifolds, toric complexes, rational homotopy theory, group theory, etc. For his mathematical work, he has collaborated with twenty-seven people. He was the advisor of three PhD students.

Suciu enjoys going to mathematical conferences, workshops, and summer schools, and he also organized over forty such events all over the world, including the United States, Canada, France, Germany, Italy, Japan, Turkey, the United Kingdom, Vietnam, and of course, Romania. He is editor of the *Journal of Singularities* and he served as Chair of the Department of Mathematics at Northeastern from 2017 to 2020. Besides mathematics, he is very much interested in various subjects of world history, being an active contributor at Wikipedia. In addition, he has collaborated on genetics and biochemistry papers.

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