Eveliina Peltola

Väisälä Prize is awarded annually to distinguished scientists in mathematics and science who are in the active part of their careers. The prizes are worth 15,000 euros.

Eveliina Peltola is currently working as Associate Professor at Aalto University and as Professor at the University of Bonn in Germany. Peltola's research focuses on mathematical physics, seeking to understand the mathematics behind theories of physics. In particular, she studies two-dimensional lattice models, which describe, for example, the structure of matter, and two-dimensional field theory, which is also necessary to describe the structure of the universe.

"I have always been interested in the natural sciences. During my university studies, it became clear to me that mathematics was closest to my heart. It provided the best way for me to understand the structure of the world," says Peltola.

"I also realized that I found mathematics aesthetically most appealing: I saw

beauty and structure in it, something greater than in other subjects. In a way, this inner beauty and intuition guide the otherwise abstract study of mathematics in a concrete way."

Peltola completed her PhD at the University of Helsinki in 2016. Her journey to the University of Bonn went via Geneva, where Peltola worked as a postdoctoral researcher for three years.

Peltola currently leads a €1.4 million ERC Starting Grant project funded by the European Research Council. The project aims to bring new tools to the research of random geometry and mathematical physics models and to create connections between different areas of mathematics. Peltola is also Principal Researcher at the Research Council of Finland's Centre of Excellence in Randomness and Structures and has received funding from the Research Council for her research project Conformal invariance in planar random geometry.

Peltola has published several articles in leading journals in her field and has lec-

Eveliina Peltola's reserach is seek-ing to understand the mathematics behind theories of physics



tured at numerous international conferences and universities. She is an active member of the scientific community and has been the main organizer of major conferences. Peltola is also a member of Young Academy Finland 2020–2024 and a member of the Publication Forum Mathematics and Statistics panel 2025–2028.

For a researcher, the best moments are the ones where you discover the solution to a problem that you have been working on for a long time.

"Sometimes, when you have been thinking about a problem for a long time,

you experience an aha moment – this could be it! These are bigger highlights than any career-related achievements."

"I don't really have a favourite problem that I dream of solving, but finding solutions to certain questions and understanding them in more depth is naturally one of my goals. I also want to develop Finnish mathematics and especially mathematical physics in Finland and internationally. I also hope to show that anyone can be a mathematician, without having to fit into any particular mould," says Peltola.