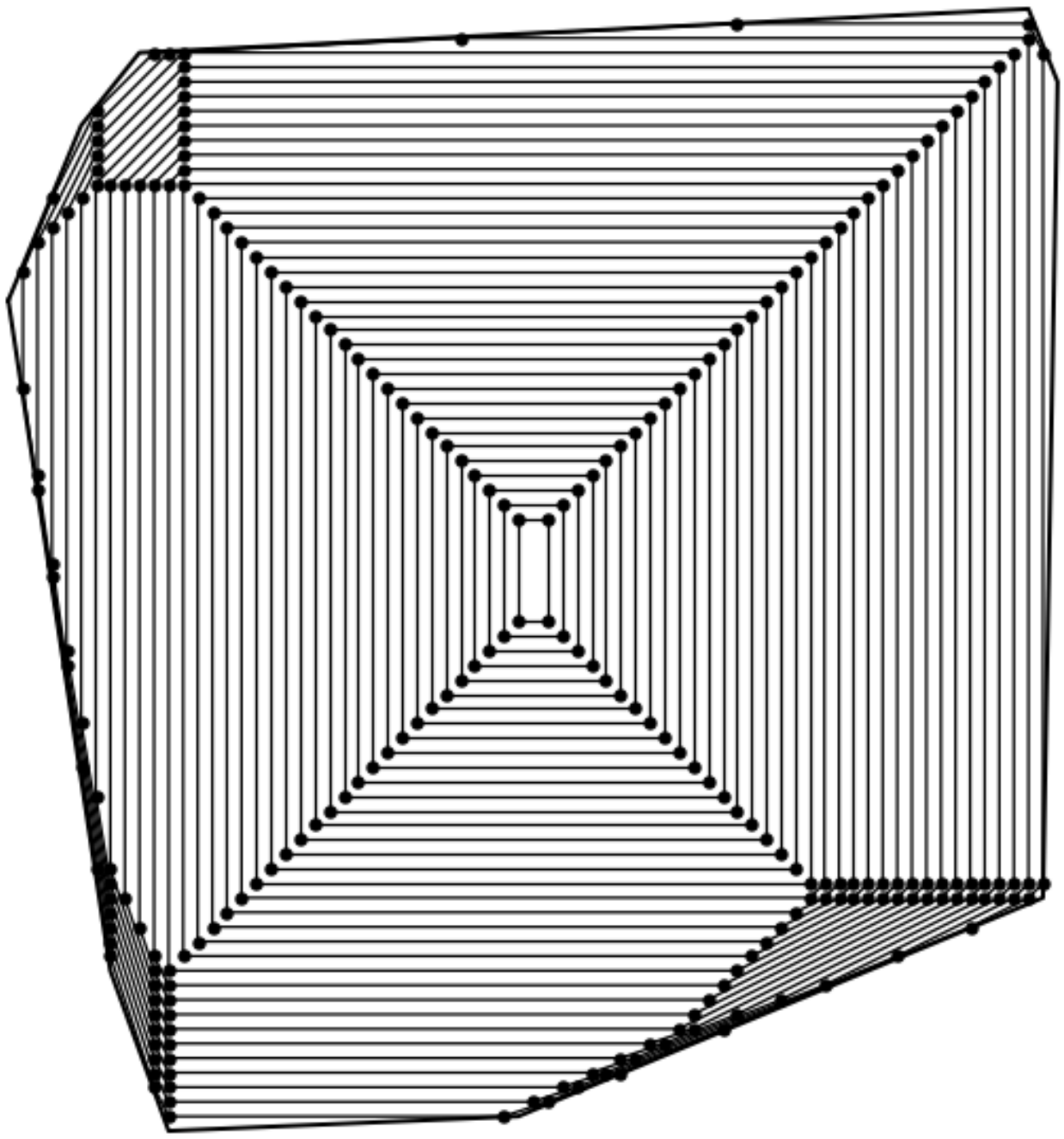
Recent Developments on Tropical Sandpiles and Related Subjects



Location: ICMS, room 403 and via Zoom **Dates:** Tuesday, 23.09.2025 & Thursday, 25.09.2025

Tropical sandpiles stand at the crossroads of mathematics, computer science, machine learning, algebra, physics, and mathematical logic. Originating from models of self-organized criticality, they reveal intricate combinatorial and geometric structures that echo through algebraic geometry and tropical mathematics. Their dynamics connect to complexity theory and algorithmic design in computer science, while also inspiring methods in statistical mechanics and the study of complex systems in physics. More recently, tropical sandpile models have begun to interact with approaches in data science and machine learning. At the same time, their formal underpinnings invite connections to logic and the foundations of computation — providing a common language where diverse disciplines converge.

Tuesday

2:00 pm Ernesto Lupercio

2:45 pm Alexander Varypaev

3:30 pm Daniel Tabares

4:15 pm Higinio Serrano

Thursday

2:00 pm Mikhail Shkolnikov

2:45 pm Yana Teplitskaya

3:30 pm Turgay Akyar

4:15 pm Konstantin Delchev