

Colloquium

Integer distance sets

Rachel Greenfeld

Northwestern University

Host: Matthew Kwan

Abstract: A set in the Euclidean plane is called an integer distance set if the distance between any pair of its points is an integer. All so-far-known integer distance sets have all but up to four of their points on a single line or circle; and it had long been suspected, going back to Erds, that any integer distance set must be of this special form. In a recent work, joint with Marina Iliopoulou and Sarah Peluse, we developed a new approach to the problem, which enabled us to make the first progress towards confirming this suspicion. In the talk, I will discuss the study of integer distance sets, its connections with other problems, and our new developments.

Wednesday, April 2, 2025 03:30pm - 04:30pm

Raiffeisen Lecture Hall, Central Building



This invitation is valid as a ticket for the ISTA Shuttle from and to Heiligenstadt Station. Please find a schedule of the ISTA Shuttle on our webpage: https://ista.ac.at/en/campus/how-to-get-here/ The ISTA Shuttle bus is marked ISTA Shuttle (#142) and has the Institute Logo printed on the side.

www.ista.ac.at | Institute of Science and Technology Austria | Am Campus 1 | 3400 Klosterneuburg