Geometry, Topology and Dynamics Seminar

Geometry of Bounded Remainder Sets for Rotations on the Adelic Torus

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Abstract: The cut-and-project construction gives a concrete and geometric way to create nonperiodic sets with an abundance of repetitive structure. We will begin with a review of the construction of bounded remainder sets for irrational rotations on the torus, developed by Alan Haynes, Michael Kelly, and Henna Koivusalo. Next, we will cover bounded remainder sets for irrational rotations on the adelic torus, which is joint work with Alan Haynes and Henna Koivusalo. Finally, we give a geometric description of the bounded remainder sets in the adelic case, which leads to a simplified geometric proof from joint work with Akshat Das and Alan Haynes.

Monday, September 23 at 3:00 PM in 636 SEO