Diagrammatic Algebra and Modular Representation Theory

Wednesday, July 23, 2025 9:30 AM (1 hour)

We introduce the idea of a "modular representation" of a group and discuss how the structure of these modular representations can be encapsulated within a remarkable family of polynomials, defined by Kazhdan and Lusztig in the 1980s. Many properties of these polynomials have remained mysterious for over forty years \dots we will spill the tea on how Elias–Williamson's diagrammatic algebras can be used to enrich our understanding of these polynomials. Time allowing, we might discuss the applications in knot theory, statistical mechanics and elsewhere.

Motivation for Participation
Application for a talk
E-Mail
Special requests and comments
Academic Status
Financial Support
Institution (University)
Topic of your talk
Comments and Suggestions on the Community Agreement
Nationality

Country of Institution

Preferred Name

Gender

Preferred Pronouns

Presenter: BOWMAN, Chris