COLLOQUIUM TALK by JERZY WEYMAN

Friday, October 30th, 2015 Hume 331 – 11:00am

QUIVERS, CLUSTERS, PICTURES

Abstract:

In this talk I will describe certain combinatorial structure of generalized associahedra appearing in several apparently unrelated constructions. The combinatorics of general decompositions of quiver representations turns out to be closely related to the theory of cluster algebras of Fomin-Zelevinsky and to the Igusa-Orr theory of pictures designed to describe the homology of nilpotent groups of upper-triangular matrices.

Departing from the definition of quiver representations and Gabriel theorem I will define the generalized associahedra and sketch how they appear in the other areas mentioned above.