ON THE REPRESENTATION THEORY OF THE PARTITION ALGEBRA

Rosa Orellana

Dartmouth College, USA Rosa.C.Orellana@dartmouth.edu

The partition algebra was defined independently by Martin and Jones in the mid 1990s. In this talk I will discuss the representation theory of this algebra and how it connects to the representation theory of the symmetric group. In particular, I will show how the representation theory of the partition algebra is connected to the problem of decomposing the tensor product of irreducible representations of the symmetric group into irreducibles.