ABSTRACT:

A. Sisto

Hierarchically hyperbolic spaces and their boundaries

Hierarchically hyperbolic spaces (HHS) and groups include mapping class groups, Teichmueller spaces endowed with either the Teichmueller or the Weil-Petersson metric, many CAT(0) cube complexes, fundamental groups of non-geometric 3-manifolds, and more. After discussing their main geometric features, I will describe a way of compactifying a proper HHS. We will then see that "geometrically-finite-like" subgroups of mapping class groups, like convex-cocompact subgroups, Veech subgroups and their Leininger-Reid combinations, have well-behaved limit sets in the HHS boundary of the corresponding mapping class group, which is not always the case for the compactification given by PML. Joint work with M. Durham and M. Hagen.