ANNETTE KARRER, McGill University

From Stallings' Theorem to connected components of Morse boundaries of graph of groups

Every finitely generated group G has an associated topological space, called a Morse boundary. It was introduced by a combination of Cordes and Charney–Sultan and captures the hyperbolic-like behavior of G at infinity.

At the beginning of the talk, I will recap Stallings' theorem and an analogous statement for Gromov boundaries of Gromov-hyperbolic groups. As Morse boundaries generalize Gromov boundaries, it raises the question whether it is possible to formulate an analog for Morse boundaries. Motivated by this question, we will study connected components of Morse boundaries of graph of groups. We will focus on the case where the edge groups are undistorted and do not contribute to the Morse boundary of the ambient group. Results presented are joint with Elia Fioravanti.