Talk Title: Morava K-theory of infinite groups and Euler characteristic

Abstract: Given an infinite discrete group G with a finite model for the classifying space for proper actions, one can define the Euler characteristic of G and the orbifold Euler characteristic of G. In this talk we will discuss higher chromatic analogs of these invariants in the sense of stable homotopy theory. We will study the Morava K-theory of G and associated Euler characteristic, and give a character formula for the Lubin-Tate theory of G. This will generalise the results of Hopkins-Kuhn-Ravenel from finite to infinite groups and the K-theoretic results of Adem, Lück and Oliver from chromatic level one to higher chromatic levels. Along the way we will give explicit computations for amalgamated products of finite groups, right angled Coxeter groups and certain special linear groups. This is all joint with Wolfgang Lück and Stefan Schwede.