1086-20-1261 Michael Hull* (michael.b.hull@vanderbilt.edu). Conjugacy Growth in Finitely Generated Groups.

We will consider the conjugacy growth function of a finitely generated group G, which counts the number of conjugacy classes which non-trivially intersect the ball of radius n centered at the identity. We will study the similarities and differences between the conjugacy growth function and the ordinary growth function, and we will show how to construct groups with interesting properties with respect to conjugacy growth. The main tool in these constructions will be the theory of small cancellation over relatively hyperbolic groups. This is joint work with Denis Osin. (Received September 20, 2012)