

BRANDEIS UNIVERSITY

Everytopic Seminar

Friday, December 4

in room 226 at 1:40pm

Schmidt's game and orbits of torus
endomorphisms

Ryan Broderick

In 1987, S. G. Dani proved that the set of points in the n -dimensional torus whose orbit closures under every semisimple, surjective endomorphism are disjoint from the rationals has full dimension. In fact, he proved that this set has the stronger property of being winning in the sense of Schmidt's game. I will describe the game and discuss a recent joint work with Y. Bugeaud, L. Fishman, D. Kleinbock, and B. Weiss in which this theorem is generalized in several directions, as well as a number theoretic corollary concerning nonnormal numbers on the Cantor set.