

Topology, Arithmetic, & Dynamics Seminar

Schottky groups and maximal representations

Jean-Philippe Burelle

Department of Mathematics

University of Maryland, College Park

Fuchsian Schottky groups are constructed by choosing disjoint half planes in the hyperbolic plane and pairing them with isometries. Groups defined this way are free, act properly discontinuously on H^2 , and the quotient is a hyperbolic surface with non empty boundary. We generalize this construction to the setting of the symplectic group $Sp(2n, R)$ acting on real projective space (and more generally, semisimple Lie groups of Hermitian type). We establish a connection between these generalized Schottky groups and maximal representations of fundamental groups of surfaces with boundary.

Date: **Friday, October 14, 2016**

Time: **2:30-3:30pm**

Place: **4106 Exploratory Hall**

For special accommodations, please contact Sean Lawton via email at slawton3@gmu.edu.