Department of Mathematics, BGU

Colloquium

On *Tuesday, November ,29 2016*

At *14:30 − 15:30*

In *Math 101-*

Doron Puder (Tel Aviv University)

will talk about

Random Matrices, Graphs on Surfaces and Mapping Class Group

Abstract: This is joint work with Michael Magee. Since the 1970's, Physicists and Mathematicians who study random matrices in the standard models of GUE or GOE, are aware of intriguing connections between integrals of such random matrices and the enumeration of graphs on surfaces. We establish a new aspect of this theory: for random matrices sampled from the group U(n) of Unitary matrices. The group structure of these matrices allows us to go further and find surprising algebraic quantities hidden in the values of these integrals. The talk will be aimed at graduate students, and all notions will be explained.