

Department of Mathematics, BGU

Algebraic Geometry and Number Theory

On Wednesday, January, 17 2018

At 15:10 – 16:30

In Math 101-

Jyoti Prakash Saha (BGU)

will talk about

Purity for big Galois representations

Abstract: In 1980s, Hida constructed p -adic families of ordinary cusp forms. He showed that the Fourier expansions of the ordinary normalized Hecke eigen cusp forms can be p -adically interpolated. Moreover, their associated Galois representations can also be interpolated via a big Galois representation. The Galois representations associated to cusp forms are known to be pure. This suggests a notion of purity for big Galois representations. In this talk, we will discuss this notion and explain its role in the study of variation in p -adic families.