

abstract

JOINT ARITHMETIC HOMOGENEOUS SPACES AND NUMBER THEORY

Topic:

Speaker:

Affiliation:

Date:

Time/Room:

In this talk I will give an overview of joint work with M. Rapoport and T. Yang on the construction of generating series whose coefficients are the classes of special divisors and 0-cycles on the arithmetic surfaces attached to Shimura curves.

These series are the q -expansions of modular forms of genus 1 and 2 respectively. I will then describe an arithmetic inner product formula and an arithmetic Siegel-Weil formula involving these forms. If time permits at the end, I will discuss some open problems.