

Algebraic Number Theory and Related Topics

Date: December 8–12, 2008

Place: Room 420, RIMS, Kyoto University

Organizers: Hiroaki Nakamura (Okayama University)

Takashi Ichikawa (Saga University)

December 8 (Mon)

- 10:00 – 10:50 Yuichiro Taguchi (Kyushu University)
Introduction to Serre’s modularity conjecture on Galois representations, I
- 11:10 – 12:00 Seidai Yasuda (Kyoto University, RIMS)
Introduction to Serre’s modularity conjecture on Galois representations, II
- 13:30 – 14:20 Yoshiyuki Tomiyama (Kyushu University)
Lifting Galois representations over arbitrary number fields
- 14:40 – 15:30 Naoki Imai (University of Tokyo)
Kisin conjecture on the moduli spaces of finite flat models
- 16:10 – 17:00 Toshiro Hiranouchi (Kyoto University, RIMS)
Ramification of truncated discrete valuation rings
(joint work with Yuichiro Taguchi)

December 9 (Tue)

- 10:00 – 10:50 Moritz Kerz (University of Regensburg)
Topology of higher idele class groups
- 11:10 – 12:00 Marc-Hubert Nicole (Université Paris 7 Denis Diderot)
Purity of stratifications of Shimura varieties
- 13:30 – 14:20 Tetsushi Ito (Kyoto University)
On the l -adic cohomology of Siegel threefolds in characteristic p
- 14:40 – 15:30 Yuichiro Hoshi (Kyoto University, RIMS)
On the combinatorial cuspidalizations and the faithfulness of the outer Galois representations of hyperbolic curves
(joint work with Shinichi Mochizuki)
- 16:10 – 17:00 Masao Ooi (Kyoto University)
Center-freeness of absolute Galois groups of some fields

December 10 (Wed)

- 10:00 – 10:50 Masanari Kida (University of Electro-Communications)
Computing algebraic structures with MAGMA
- 11:10 – 12:00 Tatsushi Tanaka (Kyushu University)
Algebraic interpretation of Kawashima relation for multiple zeta values and its applications

December 11 (Thu)

- 10:00 – 10:50 Yoshihiro Ishikawa (Okayama University)
Ramification theory of automorphic representations – introduction to JPSS theory –
- 11:10 – 12:00 Tadashi Miyazaki (University of Tokyo)
Fourier expansions of the Eisenstein series on $GL(3, \mathbb{R})$ attached to elliptic cusp forms
- 13:30 – 14:20 Lin Weng (Kyushu University)
Stability and Arithmetic
- 14:40 – 15:30 Tomoyoshi Ibukiyama (Osaka University)
Type numbers of quaternion hermitian lattices, quinary quadratic forms, and supersingular abelian varieties
- 16:10 – 17:00 Yasutaka Ihara
On L functions over function fields
(joint work with Kohji Matsumoto)

December 12 (Fri)

- 10:00 – 10:50 Shuji Yamamoto (University of Tokyo)
On Shintani's ray class invariant for totally real number fields
- 11:10 – 12:00 Takeo Okazaki (Kyoto University)
Construction of p -adic measures for automorphic L -functions of $GL(2)$ and $GSp(2)$
- 13:30 – 14:20 Olivier Fouquet (Osaka University)
Dihedral Iwasawa theory of quaternionic automorphic forms
- 14:40 – 15:30 Takashi Hara (University of Tokyo)
Iwasawa theory of totally real fields for certain non-commutative p -extensions
- 16:10 – 17:00 Tadashi Ochiai (Osaka University)
Iwasawa theory for nearly ordinary deformations of Hilbert modular forms

Program committee members: Hiroaki Nakamura (Okayama University)
Takashi Ichikawa (Saga University)
Kazuo Matsuno (Tsuda College)