Motivic Cohomology
Wednesday 14-16, Theresienstr. 39, B 045

Schedule

18.4. (Stefan Schreieder) Classical Motives\cite{9}, see also \cite{3}. Survey of the basic definitions and properties \cite{9} section 1.

25.4. (Christian Liedtke) Applications of Classical Motives \cite{9}. Applications of Classical Motives: Manin’s Identity Principle, computation of the motive of a projective bundle \cite{9} section 2. Also, motives of curves, abelian varieties and surfaces \cite{9} section 3, see also \cite{8}.

9.5. (Christian Liedtke) The category of finite correspondences and presheaves with transfers Explain the category of finite correspondences and define presheaves with transfers \cite{7} Lecture 1, 2 up to and including Definition 2.14; omit the appendix 1A.

16.5. (Kai Behrens) Numerical equivalence and semi-simplicity \cite{5}.

23.5 (Claudia Stadlmayr) Motivic cohomology \cite{7}. Define the motivic complex $Z(q)$ and explain first properties \cite{7} Lecture 3. Sketch a proof of the quasi-isomorphism $Z(1) \sim \mathcal{O}^\times[-1]$ from \cite{7} Lecture 4.

13.6. (Oliver Gregory) Relation with Milnor $K$-theory \cite{7}. Cover \cite{7} Lecture 5.

20.6. (Stefan Schreieder) Higher Chow groups \cite{1}. Definition and basic properties of higher Chow groups.

27.6 (Andreas Rosenschon) Cycle maps and étale motivic cohomology \cite{2}, \cite{3}, \cite{4}. Construction of cycle maps and comparison results.

to be continued ...

Literatur


