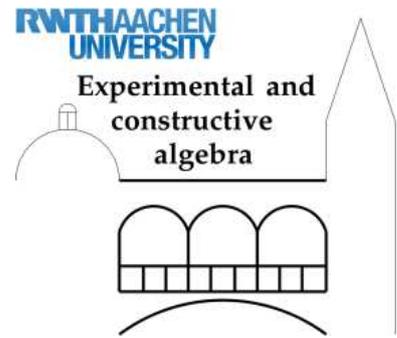


Graduiertenkolleg

# Experimentelle und konstruktive Algebra



## Kolloquiumsvortrag

Dienstag, 7. Januar 2014, 14:15 Uhr, Hörsaal klPhys

**DAVID HARBATER (UNIVERSITY OF PENNSYLVANIA, PHILADELPHIA, PENNSYLVANIA, USA):**

***Oort groups and lifting problems***

The Oort conjecture concerns branched covers of algebraic curves, or equivalently extensions of polynomial rings. Specifically, Frans Oort conjectured that every cyclic branched cover of curves in characteristic  $p$  can be lifted to such a cover in characteristic zero. This raises the more general question of which finite groups  $G$  have the property that every  $G$ -Galois branched cover of curves in characteristic  $p$  can be lifted to characteristic zero. While this can be viewed as analogous to the inverse Galois problem, the situation here turns out to be very different, and the finite groups that have the lifting property are quite constrained. This talk will survey the Oort conjecture and its generalizations, discussing in particular recent developments.

Wir laden alle Interessierten herzlich ein.

Ab 13:30 Uhr gibt es Kaffee und Tee in der Bibliothek des Lehrstuhl D für Mathematik.