



# Mathematisches Kolloquium 2007

Freitag, den 8. Juni 2007, 16 Uhr c.t., Hörsaal 3

Prof. Dr. **Giovanni Felder** (ETH Zürich, Dpt. of Mathematics)

*Plane curves, random surfaces and polynomial ideals  
(after A. Okounkov)*

## Zusammenfassung:

The work of Fields medalist Andrei Okounkov established unexpected and fruitful connections between many different parts of mathematics, including probability theory, combinatorics, algebraic geometry and mathematical physics. In this talk we will concentrate on one of these connections, relating the classical subject of real plane curves to the equilibrium shape of a dissolving crystal, following work of Kenyon, Mikhalkin, Okounkov and Sheffield. The subject is also closely related to ideals in the polynomial algebras in three variables and via localization integrals to Donaldson-Thomas invariants of toric three-folds.

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Die Veranstalter laden alle Interessierten zu Kaffee oder Tee vor dem Vortrag um 15:30 Uhr in Raum 127 (1. Stock, Mittelgang) ein.