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## Mechanik-Seminar

Referent: **Prof. Dr. Michael Junk** 

Fachbereich Mathematik und Statistik, Universität Konstanz

Datum: Donnerstag, 31.01.2008

Uhrzeit: 15.45 Uhr

Ort: Hertz-Hörsaal, Geb. 10.11, Raum 126

Thema: "The maximum entropy approach to moment problems"

## **Abstract**

Moment problems occur in various applications where probability, mass, or number densities are sought which have a prescribed set of moments. Since such inverse problems are not uniquely solvable, additional requirements are put on the solution, for example, an optimality condition with respect to the classical entropy functional. This choice generally leads to unique solutions with interesting structural features. However, it may also lead to unexpected difficulties related to a possible non-solvability of the entropy maximization problem.

For the classical closure problem of moment systems derived from the Boltzmann transport equation, these difficulties are illustrated and explained.

Alle Interessenten sind herzlich eingeladen.

Prof. Dr.-Ing. habil. Thomas Böhlke