



OTTO VON GUERICKE
UNIVERSITÄT
MAGDEBURG

FAKULTÄT FÜR
NATURWISSENSCHAFTEN

Seminar über Nichtlinearität und Unordnung in komplexen Systemen

Am Montag, dem **22. Oktober 2018**, um 16:15 Uhr im Gebäude 16, Raum 154 (ehemals Bibliothek),
findet der Vortrag von

Herrn Gaoming Xiang, Ph.D. Candidate

(Tsinghua University, China)

statt.

Vortragsthema: **A overview of numerical studies on two-phase flow problems**

Abstract:

Two-phase flow problems occur widely in nature and industry engineering. With the increasing computer technique and declining computation cost, numerical simulations have become a efficient tool solving two-phase flow problems. However, challenges still exist in developing the physical models and numerical methods. In this report, we will have a brief description on the mathematical models about two-phase flow. In addition, a developed incremental WENO scheme for two-phase interface flow problems, especially with high density ratios, will be presented.

Then, we will discuss in detail about some typical two-phase flow problems, including shock interactin with droplets, two-phase flow involving phase change and supersonic planar shear layer laden with droplets. Some interesting results will be reported from our numerical simulations.

Interessenten sind herzlich eingeladen!

Magdeburg, den 11. Oktober 2018

gez. Prof. Dr. Claus-Dieter Ohl