



# *E I N L A D U N G*

im Rahmen des Seminars für Mathematische Physik  
(Joint TU/UV Theory Seminar)

zum Vortrag

von

**Michael Borinsky**

NIKHEF, Amsterdam

über

***„The graphical function method applied to  $\phi^3$  in  $D=6$ “***

**Abstract:**

The graphical function method is an efficient tool to perform perturbative calculations in position space QFT. One reason for this efficiency is that the method utilizes the underlying conformal properties of the QFT. I will review the method and discuss some recent extensions, in a joint work with Oliver Schnetz, of the method to arbitrary even dimensions. Using these extensions we were able calculate the 5-loop renormalization group functions in  $\phi^3$ -theory. I will also discuss applications to the calculation of critical exponents in percolation theory.

**Zeit:** Dienstag, 19.11.2019, 13.45 h

**Ort:** TU Wien - Wiedner Hauptstraße 8 - **Red Area**, 7th floor,  
Seminar Room (DC 07 A15)

gez.: S. Fredenhagen, D. Grumiller, C. Zwikel, T. Schimannek