



## **Einladung zum Vortrag**

von

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### **Optimal Designs for Comparing Curves**

In this talk we consider the optimal design problem for a comparison of two regression curves, which can be used to establish the similarity between the dose response relationships of two groups. An optimal pair of designs should minimize the width of the confidence band for the difference between the two regression functions. Equivalence theorems and efficiency bounds are developed for this non standard design problem and for some commonly used dose response models optimal designs are found explicitly. The results are illustrated in examples modeling dose response relationships. It is demonstrated that the optimal pair of designs for the comparison of the regression curves is not the pair of the optimal designs for the individual models. Moreover, it is shown that the use of the optimal designs proposed instead of commonly used "non-optimal" designs yields a reduction of the width of the confidence band by more than 50%.

**Termin: Donnerstag, 01. Dezember 2016, 14 Uhr**

**Ort: Universität Ulm, Raum N24 - H11**

Interessenten sind herzlich eingeladen.

Der Vortrag findet im Rahmen des Forschungsseminars des Institutes für Stochastik statt.

gez. E. Spodarev