

VORträge zum Operations Research

Kolloquium des Instituts für Operations Research

Zeit: Donnerstag, 26. Februar 2015, 17:30 Uhr

Ort: Raum 111, Gebäude 20.13

Es spricht: Frau Bolor Jargalsaikhan, Universität Groningen / Niederlande

Zum Thema: **Genericity and stability in linear conic programming**

Abstract: In linear conic programming, we maximize or minimize a linear function over the intersection of an affine space and a convex cone. In this talk, we discuss properties of conic problems such as uniqueness of the optimal solution, nondegeneracy, and strict complementarity. A property is said to be stable at a problem instance if the property still holds under a small perturbation of the problem data. We say that a property is weakly generic if the property holds for almost all problem instances. We start by showing that Slater's condition is weakly generic and stable. It is known that uniqueness of the optimal solution, nondegeneracy, strict complementarity are weakly generic properties in conic programming, so we study the stability of these weakly generic properties. For the semidefinite programs, we show that all these properties are stable. Moreover, we characterize first order optimal solutions in conic programs and give necessary and sufficient conditions for their stability.

Die Vorträge zum Operations Research wenden sich an alle Interessierten!

Ab 17:00 Uhr ist am Institut für Operations Research (Gebäude 20.13, Raum 104) Gelegenheit zu einem Gespräch mit dem Referenten bei einer Tasse Kaffee gegeben.

Bei Rückfragen wenden Sie sich bitte an:

Prof. Dr. Oliver Stein, Institut für Operations Research.