

VORträge zum Operations Research

Kolloquium des Instituts für Operations Research

Zeit: Donnerstag, 25. November 2010, 17:30 Uhr

Ort: Raum 214, Gebäude 11.40

Es sprechen: Prof. Antonio Manuel Rodríguez Chía, Facultad de Ciencias, Puerto Real (Cádiz)
und Prof. Justo Puerto, Facultad de Matematicas, Universidad de Sevilla

Zum Thema: **Location, order and discrete optimization**

Abstract: This talk considers discrete optimization problems with ordering requirements. These problems are formulated on general discrete sets in which there exists an implicit ordering on their elements together with a cost function that evaluates each element of a given subset depending on its ordering relative to the remaining elements in the set. It is proven that ordered sequences over the original set define an independence system. The simplest such ordering problem, that consists of finding the ordered sequence of maximum weight, and its restriction to sets of a fixed cardinality are studied. In both cases, the polyhedral structure of the corresponding feasible sets is analyzed.

In addition, we will discuss that in many cases of combinatorial problems if the sum objective is polynomially solvable then the corresponding ordered median problem is also solvable in polynomial time. We will specialized on k-centrum integer optimization problems and on some problems on matroids.

Die Vorträge zum Operations Research wenden sich an alle Interessierten!

Ab 17:00 Uhr ist am Lehrstuhl für Operations Research (Gebäude 11.40, Besprechungsraum 249) Gelegenheit zu einem Gespräch mit dem Referenten bei einer Tasse Kaffee gegeben.

Bei Rückfragen wenden Sie sich bitte an:

Prof. Dr. Stefan Nickel, Lehrstuhl für Diskrete Optimierung und Logistik am IOR.