

数学与系统科学研究院

计算数学所学术报告

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报告题目:

**Strong Duality in Optimization:
Shifted p -th Power Formulation**

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计算数学所报告厅

Abstract:

For a class of nonconvex optimization problems, the p -th power reformulation closes the duality gap between the primal problem and its Lagrangian dual, when p is sufficiently large. We answer in this paper an open question of how large p is sufficiently large to ensure the attainment of the zero duality gap. After introducing a suitable shifting, we further show, surprisingly, that $p = 3$ is always sufficient to guarantee the zero duality gap. We then extend the proposed shifted p -th power approach to discrete optimization. (Joint work with Prof. Duan Li from CUHK)

欢迎大家参加!