

综合报告会

Lecture

国家数学与交叉科学中心

Time: 10:00 am, May 26, 2014

Venue: N204 (南楼)

Beyond Linear Algebra



Speaker: Prof. Bernd Sturmfels

University of California, Berkeley

Abstract:

Linear algebra is the foundation of scientific computing and its numerous applications. Yet, the world is non-linear. In this lecture we argue that it pays off to work with models that are described by non-linear polynomials, while still taking advantage of the power of numerical linear algebra. We present a glimpse of applied algebraic geometry, by discussing recent advances in tensor decomposition, polynomial optimization, and algebraic statistics.

Brief CV:

California 大学 Berkeley 分校 数学、计算机科学、统计学教授。曾经长期担任著名数学杂志 J. Amer. Math. Soc. 主编及 Annals of Mathematics 杂志编委，并曾担任美国数学会副主席。Sturmfels 教授是计算代数几何、Tropical 几何等多个领域的领袖型数学家，撰写了 200 余篇学术论文。2010 年，Sturmfels 受邀做 SIAM 的 John von Neumann Lecture，介绍从线性代数到非线性代数的演化历程。