Operations Research and Engineering Mana⬚mn

Prof. Suvrajeet Sen
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University of Southern California
Friday, January 27th
10:00am - 11:15am
Caruth Hall, Room 384

Abstract
We generalize the concepts underlying Compromise Decisions (or Bagging) which was originally designed as part of the stopping criteria for Stochastic Decomposition in the context of two-stage Stochastic Linear Programming (SLP). The ideas presented in this paper apply to more general settings, such as Stochastic Integer Programming (SIP), and Multi-stage Stochastic Linear Programming (MSLP). These concepts are ideal for distributed computing, and we present both the theoretical background, as well as computations on some very large scale SIPs, and MSLP. Compromise decisions for this broader class of problems illustrate how

Programming (SDDP). This presentation is based on joint work with former USC doctoral students Yifan Liu and Jiajun Xu.

Biography

Professor Sen served as a program director at NSF where he was responsible for the Operations Research, and the Service Enterprise Engineering programs. At NSF, he also headed the Cyber infrastructure planning activities of the Engineering Directorate. Concurrently with his appointment at NSF, he was a professor of Systems and Industrial Engineering at the University of Arizona. He has served on the editorial board of several journals, including Operations Research as Area Editor for Optimization, and as Associate Editor in INFORMS Journal on Computing, Telecommunications Systems, as well as Operations Research. He is the past-Chair of the INFORMS Telecommunications Section and founded the INFORMS Optimization Section. Professor Sen is a Fellow of INFORMS.