ATE SEMINAR

BENCHMARKING BEST PRACTICES OF
DEMAND RESPONSIVE TRANSIT SYSTEMS

Co-sponsored by the
Department of Civil and Environmental Engineering
Department of Economics and
Department of Urban and Regional Planning

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Social Ecology I, Room 306

Over the past decade, operating expenses for demand responsive transit (DRT) systems in the U.S. have more than doubled. Many advanced communication technologies and management practices have been proposed and implemented to improve the performance of DAR systems, but little empirical evidence has been available to assess the effectiveness of these actions. This seminar will present the results of an effort to benchmark the impacts of advanced technologies and management practices on the productivity and operating costs of DAR services in various environments. Results were mixed. For example, the productivity benefits of computer aided dispatching (CAD) systems were offset by cost impacts, and financial incentives had a detrimental effect on performance. This suggests that we explore other means to improve system operations.

Maged M. Dessouky is an associate professor in the Daniel J. Epstein Department of Industrial & Systems Engineering at the University of Southern California (USC). His research interests include production and operations management, modeling of manufacturing processes and systems, and operations research applications to industrial systems. His research has been funded by the National Science Foundation, the Society of Manufacturing Engineers, Partners for Advanced Transit and Highways (PATH), the California Department of Transportation (Caltrans), the Federal Transit Administration (FTA) and the Department of Defense (DOD). He has received four individual awards from USC for excellence in teaching. Dr. Massouky obtained his Ph.D. degree in industrial engineering and operations research from the University of California, Berkeley (UCB) in 1996.