

Computer Science Seminar Series, 2013

National Capital Region

On-road Localization and Data Dissemination in Vehicular Ad Hoc Networks

Speaker: Dr. Grace Guiling Wang
New Jersey Institute of Technology

Tuesday, March 19, 2013
1:00PM- 2:00PM, NVC T3

Abstract

On road localization and data dissemination are two important problems in Vehicular Ad Hoc Networks (VANET). In this talk, I will first present a grid based on-road localization system, GOT, for vehicles to evaluate their locations through the help of each other. In addition, I will present a distributed protocol, DOVE, for disseminating data to a desired number of drivers in an area of interest when road-side stations are not available, a new problem in data dissemination. Multiple heuristics are introduced to minimize the dissemination delay and reduce the dissemination cost. I will also introduce our work on access point planning in urban area for data dissemination.

Biography



Dr. Grace Guiling Wang received her BS degree from Nankai University, China. She received the PhD degree in Computer Science and Engineering and a minor in Statistics from the Pennsylvania State University at May 2006. She is currently an associate professor in the Computer Science Department at New Jersey Institute of Technology. Her research interests include wireless sensor networks, vehicular networks, and mobile computing. Her publications have been cited for 1600+ times according to Google Scholar.