

Call For Papers



Telecommunication Systems

Special Issue on “Vehicular Communications, Networks, and Applications”

Aims and Scope

Vehicular communication and networking have been identified as key technologies for increasing road safety and transport efficiency. Vehicular networks aim to ensure traffic safety for drivers, provide comfort for passengers and reduce transportation time and fuel consumption. The development of vehicular communication and networking technologies are expected to enable many potential applications, including automatic collision notification and prevention, emergency management, assistances for safe driving, real-time traffic congestion notification, location-based driver information services, high-speed tolling, vehicle tracking, automobile Internet access, and many others. To facilitate these applications, many different types of communication and networking would be involved, including intra-vehicle, vehicle-to-vehicle (V-to-V), vehicle-to-roadside (V-to-R) and vehicle-to-infrastructure (V-to-I) communications.

This special issue aims to foster the dissemination of high-quality, original, unpublished research covering all aspects related to the Vehicular Communications, Networks, and Applications. Topics of interest include, but not limited to, the followings:

- Availability and Scalability Issues in Vehicular Networks
- Communication Protocol Design for Vehicular Networks
- Cooperative Vehicular Communications
- Cross-layer Design and Optimization for Vehicular Networks
- Emergency Applications and Technologies in Vehicular Networks
- Green Technologies and Vehicular Networks
- Intra-vehicle, V2I, V2R, and V2V Communication Protocols
- Contention and Congestion Control for Vehicular Networks
- Multicast and Broadcast Protocols for Vehicular Networks
- Mobility, Traffic Models and Network Management for Vehicular Networks
- Modulation, Coding, and Channel Modeling for Vehicular Networks
- Multi-Channel Management for Vehicular Networks
- Network Architecture of Vehicular Networks
- Radio Resource Management and QoS Support for Vehicular Networks
- Real-time Experimental Systems and Testbeds for Vehicular Communications
- Security and Privacy Technologies for Vehicular Networks
- Services and Applications of Vehicular Networks
- Simulation Framework and Real-World Testbeds for Vehicular Networks
- Vehicular Network Performance Modeling and Analysis
- Vehicular Network Medium Access Control and Routing Protocols

Submission Guideline

Prospective authors are invited to submit research contributions representing original, previously unpublished work. Submitted papers will be carefully evaluated based on originality, significance, technical soundness, and clarity of exposition. Authors should follow the Telecommunication Systems (<http://www.springer.com/business/business+information+systems/journal/11235>) manuscript format as described in the Instruction to Authors. Manuscripts (pdf and source files) must be directly emailed to the Guest Editors, Prof. Chih-Yung Chang, cychang@mail.tku.edu.tw, and Prof. Yuh-Shyan Chen, yschen@mail.ntpu.edu.tw with clear indication that submission is for the Special Issue on “Vehicular Communication, Networks, and Applications”, Telecommunication Systems. All manuscripts should include a title page containing the title of the paper, full names and affiliations, complete postal and electronic addresses, phone and fax numbers, an abstract, and some keywords. The contacting author should be clearly identified. In addition, this special issue also collects best papers from IEEE International Symposium on *Pervasive Computing, Algorithms, and Networks* (I-SPAN 2009), and

Important Date

Paper Submission Deadline	January 31, 2010
Acceptance Notification	April 31, 2010
Final Manuscript Due	May 31, 2010
Publication Date	December, 2010 (Tentative)

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