Call for Papers

International Green Communications and Networking Workshop (GCN 2014)

The 10th International Wireless Communications & Mobile Computing Conference

<u>IWCMC 2014 Website: http://iwcmc.org/2014/</u> <u>SUBMNISSION LINK: https://edas.info/newPaper.php?c=14357</u> Hilton Nicosia, Cyprus, August 4-8, 2014

Technically sponsored by IEEE, IEEE Cyrus Section Local sponsor: Frederick University, Cyprus

Workshop Chair:

Lei Shu, Guangdong University of Petrochemical Technology, China, lei.shu@lab.gdupt.edu.cn

Workshop Co-Chair:

Maged Elkashlan, Queen Mary, University of London, UK, maged.elkashlan@eecs.qmul.ac.uk

Xianfu Lei, Utah State University, USA, xianfu.lei@aggiemail.usu.edu

Trung Q. Duong, Blekinge Institute of Technology, Sweden, <u>quang.trung.duong@bth.se</u>

Scope:

Among the energy-consuming industries, the Information and Communication Technology industry takes a significant amount (5%) of global carbon dioxide (CO_2) emissions and 3% of global energy expenditure. Moreover, with the increasing demand for higher data rates, the energy consumption for the Information and Communication industry is increasing by 16-20% per year. In particular, 57% of the energy consumption of the Information and Communication Technology industry is attributed to user equipments and network devices in wireless networks. Therefore, the wireless industry faces a sustainable development problem on energy consumption. It is critical to develop energy efficient technologies to meet this challenge and enable green communications and networking for environment protection while maintaining acceptable quality of service.

The aim of this Workshop is to provide innovative contributions to the research and development of energy-efficient communications and networking solutions. Contributors and participants, from both industry and academia, are highly encouraged to take active part in this Workshop.

Accepted papers will be published in the IEEE IWCMC 2014 proceedings and will be included in the IEEE digital library (IEEE Xplore).

Topics of interest include, but are not limited to:

- Methodologies and architectures for green communications and networking
- Signal processing for green communication networks
- Green applications and services for future sustainable societies
- Energy-aware cross-layer optimization for energy saving
- Cooperative radio communications for green and smart environments
- Green cognitive communications and networks

- Renewable energy sources for wired and wireless access networks
- Energy-efficient network management
- Energy-efficiency of different network deployment strategies
- Energy efficiency in sensor networks, ad hoc networks, mesh networks and vehicular networks
- Vehicular networks to reduce the CHG emissions
- Energy harvesting for wireless communications and networks
- QoS provisioning and resource management in green radio networks
- Energy, performance, QoS trade-offs
- ICT for minimizing energy consumption of systems such as transportation, offices and industrial buildings
- Security in green communications and networking
- Cooperative transmission for energy savings
- Cognitive radio and spectrum management in green networks
- Carbon-aware and energy-aware network planning
- ITS technologies for sustainable societies
- Green technologies for multimedia applications
- Energy-efficient radio transmission for network sustainability
- Energy-efficient heterogeneous networks
- Integrated RFIDs and sensor networks (RSNs) for energy saving
- Green implementation and design of low-power testbed

Submission Guidelines:

Prospective authors are invited to submit original technical papers—up to 6 pages of length, using the EDAS link <u>https://edas.info/newPaper.php?c=14357</u> for possible publication in the IWCMC 2014 Conference Proceedings, which will be included in the IEEE Xplore. Selected papers will further be considered for possible publication in three special issues in the following Journals. For more information, visit: http://iwcmc.org/2014

- 1. International Journal on Antenna and Propagation http://www.hindawi.com/journals/ijap/
- 2. Wiley Journal of Wireless Communications and Mobile Computing (WCMC) http://www3.interscience.wiley.com/journal/76507157/home
- 3. International Journal of Antennas and Propagation <u>http://www.hindawi.com/journals/ijap/</u>
- 4. The International Journal of Sensor Networks (IJSNet) http://www.inderscience.com/browse/index.php?journalCODE=ijsnet
- 5. The International Journal of Autonomous and Adaptive Communications Systems (IJAACS): www.inderscience.com/ijaacs

Note: There will be best paper award, best Symposium award and best Workshop award.

Important Dates:

Submission:	December 15, 2013
Acceptance notification:	March 15, 2014
Camera-ready paper submissions:	April 15, 2014

TPC Members:

Hans-Jurgen Zepernick, Blekinge Institute of Technology, Sweden Lei Wang, Dalian University of Technology, China Theodoros Tsiftsis, University of Central Greece, Greece Zhangbing Zhou, China University of Geosciences, China Phee Lep Yeoh, University of Melbourne, Australia Guangjie Han, Hohai University, China Maged Elkashlan, Queen Mary University of London, UK Jianwei Niu, Beihang University, China Daniel B. da Costa, Federal University of Ceará (UFC), Brazil Yuexing Peng, Beijing University of Post and Telecommunications, China Kuang-Hao (Stanley) Liu, National Cheng Kung University, Taiwan Nan Yang, University of New South Wales, Australia Kyeong Jin Kim, Inha University, Korea