# IEEE INTERNATIONAL CONFERENCE ON COMMUNICATIONS

**Bridging the Broadband Divide** 9-13 June • Budapest, Hungary

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## **Communications QoS, Reliability and Modeling Symposium**

Symposium Co-Chairs

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The 2013 IEEE International Conference on Communications (ICC) will be held in the vibrant city of Budapest, Hungary from 9 – 13 June 2013. This flagship conference of IEEE Communications Society aims at addressing an essential theme on "Bridging the Broadband Divide." The conference will feature a comprehensive technical program including several Symposia and a number of Tutorials and Workshops. IEEE ICC 2013 will also include an attractive expo program including keynote speakers, various Business, Technology and Industry forum, and vendor exhibits. We invite you to submit your original technical papers, industry forum, workshop, and tutorial proposals to this event. Accepted and presented papers will be published in the IEEE ICC 2013 Conference Proceedings and in IEEE Xplore®. Full details of submission procedures are available at <a href="http://www.ieee-icc.org/2013">http://www.ieee-icc.org/2013</a>.

# **Scope and Topics of Interest**

Provisioning and improving quality of service (QoS) has been one of the key objectives in designing networks and communications systems. There have been more than two decades of extensive research activities on a series of topics related to QoS provisioning including traffic modeling, resource allocation, network monitoring, and service management. Advances in networking and communications technologies are transforming the networking infrastructure into a highly heterogeneous large-scale entity, thus presenting new challenges and captivating much interest in provisioning QoS in such networking environment. For example, communication networks based on different technologies need to cooperate with each other for end-to-end QoS provisioning and to support a wide range of bandwidth intensive multi-media applications and services for a large number of clients. Furthermore, they should be capable of supporting user roaming and mobility. Such transformation incurs fundamental challenges on traditional theories, analyses, modeling and experimenting methods.

The Communications QoS, Reliability and Modeling symposium emphasizes advances in the design, resource allocation, traffic control, and performance evaluation required to deliver quality services in the transformed networking infrastructure reliably. The symposium will provide an international technical forum for experts from industry and academia to exchange ideas and present results of ongoing research on the challenging issues related to the requirements, metrics, measurement, management, and dissemination, modeling as well as performance evaluation of emerging network services.

To ensure complete coverage of the advances in QoS, reliability and performance modeling in computer and telecommunication networks, the Communications QoS, Reliability and Modeling symposium invites original contributions in, but not limited to, the following topical areas:

- Application / Service Oriented Networking
- Cross-layer Design, Modeling and Optimization
- Design of Networks and Network Services
- Design of Software Defined Networks
- Measurement and evaluation techniques of energy efficient networks
- · Measurement and evaluation techniques of energy efficiency of communication systems
- Metrics and Models for Quality of Experience (QoE)
- Network design and evaluation of Energy Efficient (Green) networks
- Network Measurement and Monitoring Techniques
- Network Modeling
- Network Simulation Techniques
- Performance evaluation and design of cloud networks
- Performance evaluation and design of cognitive network architectures
- Performance evaluation and integration in Smart Grids communications
- Performance Evaluation Techniques
- Performance Modeling of Next Generation Networks
- Performance of Large Scale Experimental Platforms
- Quality in Multimedia Networks including Voice over IP and IPTV
- Quality, Scalability and Performance in the Internet
- Quality and Performance in Wireless and Mobile Networks
- Quality, Reliability and Performance in Optical and Multi-layer Networks
- Quality and Performance in Autonomic Systems
- Quality and Performance in Grid, Distributed and Cloud Computing
- Quality and Performance in Overlay (including Peer-to-Peer) Networks
- Quality and Performance for Network and Services
- Quality and Resource Allocation for Network Services, VPN, Web
- Resource Allocation for Networks and their services
- Scalability, Robustness and Resilience
- Standardization Aspects of QoS and Reliability
- TCP/IP Performance
- Traffic and Workload Modeling and Characterization
- Traffic and Workload Control
- Traffic Economics
- Traffic Engineering and Traffic Theory

## **Sponsoring Technical Committees**

- Communications Systems Integration & Modeling
- Communications Quality & Reliability

## **Submission Guidelines**

Prospective authors are invited to submit original technical papers by the deadline 16 September 2012 for publication in the IEEE ICC 2013 Conference Proceedings and for oral or poster presentation(s).

All submissions should be written in English with a maximum paper length of Five (5) printed pages (10- point font) including figures without incurring additional page charges (maximum 1 additional page with over length page charge if accepted).

Standard IEEE Transactions templates for Microsoft Word or LaTeX formats found at <a href="http://www.ieee.org/portal/pages/pubs/transactions/stylesheets.html">http://www.ieee.org/portal/pages/pubs/transactions/stylesheets.html</a>

Alternatively you can follow the sample instructions in template.pdf at <a href="http://www.comsoc.org/confs/globecom/2008/downloads/template.pdf">http://www.comsoc.org/confs/globecom/2008/downloads/template.pdf</a>

Only PDF files will be accepted for the review process and all submissions must be done through EDAS at http://edas.info/

Short biography of co-chairs

Charalabos (Harry) Skianis (M'98-SM'05) Charalabos SKIANIS is currently Assistant Professor in the Department of Information and Communication Systems at the University of the Aegean in Samos, Greece. He holds a PhD degree in Computer Science, University of Bradford, United Kingdom and a BSc in Physics, Department of Physics, University of Patras, Greece. His current research activities take upon Novel Internet Architectures and Services, Cloud Computing & Networking, Energy & Context aware Next Generation Networks and Services, management aspects of mobile and wireless networks, ubiguitous and pervasive computing and End-to-End Quality of Service provisioning in heterogeneous networks environment. He has been actively working on the area of computer and communication systems performance modeling and evaluation where he has introduced alternative methodologies for the approximate analysis of certain arbitrary queuing network models. He is also keen in traffic modeling and characterization, queuing theory and traffic control of wired and wireless telecommunication systems. His work is published in journals, conference proceedings and as book chapters and has also been presented in numerous conferences and workshops. He acts within Technical Program and Organizing Committees for numerous conferences and workshops (e.g., IFIP Networking, symposium chair for several IEEE Globecom and IEEE ICC conferences) and as a Guest Editor for scientific journals (e.g., IEEE Networks magazine). He is at the editorial board of journals (e.g. IEEE Communications Magazine, IEEE Surveys & Tutorials, Ad hoc Networks), a member of pronounced professional societies (senior member of IEEE) and an active reviewer for several scientific journals. He is an active member of several Technical Committees within the IEEE ComSoc (e.g., chair for the CSIM technical committee, vice chair for Information Infrastructure technical committee), member of the education board of IEEE ComSoc, member of the IEEE ComSoc EMEA oard and member of IEEE BTS; IEEE TVT and IEEE CS. He has acted as Technical Manager for ICT FP7 VITAL++ project and representative for the University on ICT FP7 HURRICANE project. He is currently project coordinator for ICT FP7 PASSIVE project.

**Tetsuya Yokotani** (M'91-) He obtained B.S., M. S, and Ph. D degrees on information science from the Tokyo University of Science in 1985, 1987, and 1997, respectively. He joined Mitsubishi Electric Corporation in 1987. Since then, he has researched high-speed data communication, optical access and home network, and system performance evaluation based on queuing theory, and has promoted development of these related systems, in Information Technology R&D Center. In 2012, he moved to Global Standardization and R&D relation group, corporate research and development in headquarter as a manager. Moreover, his interests include international standardization for optical communication. He has joined standardization activity in ITU-T SG15 for FTTH and Home networks from 2000. He has contributed finalization of many related ITU-T recommendations as an editor. Currently, he is the associate chair of ITU-T SG15 WP1 Q1. In addition to activities in Mitsubishi Electric Corporation, He has been also worked for the Tokyo University of Science as a part-time lecturer from 2008.

He obtained ITU-T Japanese associates award for this activity on 2003. He also obtained Nation-wide innovation award and Region innovation award in 2012 and 2009, respectively. As IEEE ComSoc activities, he has experienced Business Forum Chair in ICC2011, CQRM symposium co-chair in GLOBECOM 2011 and GLOBECOM 2012, and is appointed as this co-chair in ICC2013. He was TC on CQR secretary in 2010 and 2011, and is Vice Chair on Operation, currently.

**Janos Tapolcai** received the M.Sc. degree in technical informatics and Ph.D. degree in computer science from Budapest University of Technology and Economics (BME), Budapest, Hungary, in 2000 and 2005, respectively. He is currently an Associate Professor at the High-Speed Networks Laboratory, Department of Telecommunications and Media Informatics, BME. He is the head of MTA-BME "Lendulet" Future Internet Research Group. His research interests include mathematical modeling, combinatorial optimization, addressing, quality of service and routing in survivable networks. He has been involved in several related European and Canadian projects. He is the author of more than 80 scientific publications. He is TPC member for INFOCOM, DRCN, RNDM. Dr. Tapolcai is the recipient of the Best Paper Award in ICC CQRM 2006 and IEEE DRCN 2011.