IEEE GLOBECOM 2009 Symposiums Program

Wednesday, 2 December 2009

10:15 - 12:15

Location: Honolulu Suite #1

AHSN-10: Routing & Resource Management in WMNs

Chair: Dharma Agrawal (University of Cincinnati, USA), Brahim Bensaou (Hong Kong University of Science and

Technology, Hong Kong)

Diffusion based Distributed Internet Gateway Load Balancing in a Wireless Mesh Network

Bing He (University of Cincinnati, USA)

Dongmei Sun (Beijing Jiaotong University, China)

Dharma P. Agrawal (University of Cincinnati, USA)

Bandwidth Allocation for Bi-Directional End-to-End Paths in a Last-Mile Wireless Mesh Network

Ka-Lok Hung, Brahim Bensaou (Hong Kong University of Science and Technology, Hong Kong)

Channel Assignment Exploiting Partially Overlapping Channels for Wireless Mesh Networks

Yuting Liu, R. Venkatesan, Cheng Li (Memorial University, Canada)

User Density Sensitive P2P Streaming in Wireless Mesh Networks

Jigang Wen (Hunan University, China)

Jiannong Cao (Hong Kong Polytechnic University, Hong Kong)

Kun Xie, Renfa Li (Hunan University, China)

Interconnecting Wireless Sensor and Wireless Mesh Networks: Challenges and Strategies

Stefan Bouckaert, Eli De Poorter, Pieter De Mil, Ingrid Moerman, Piet Demeester (Ghent University, Belgium)

Graph-based Approach for Enhancing Capacity and Fairness in Wireless Mesh Networks

Salim Nahle, Naceur Malouch (University of Paris 6, France)

Wednesday, 2 December 2009

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Location: Honolulu Suite #2

AHSN-11: Multi-hop wireless networks

Chair: John Cioffi (Stanford University, USA), Mohammad Hoque (The University of Alabama, USA)

Phase Transition Width of Connectivity of Wireless Multi-hop Networks in Shadowing Environment

Xiaoyuan Ta, Guoqiang Mao, Brian D. O. Anderson (Australian National University, Australia)

Utility-Based Scheduling with Non-Deterministic Fading Channels in Wireless Multi-Hop Networks

Zheng Liu (Tianjin University, China)

Maode Ma (Nanyang Technological University, Singapore)

Jufeng Dai (Tianjin University, China)

Cooperative Strategy by Stackelberg Games under Energy Constraint in Multi-hop Relay Networks

Hyukjoon Kwon, HyungJune Lee, John M. Cioffi (Stanford University, USA)

Selecting a Spatially Efficient Cooperative Relay

Nikolaj Marchenko, Evsen Yanmaz, Helmut Adam, Christian Bettstetter (University of Klagenfurt, Austria)

Multiple Radio Channel Assignement Utilizing Partially Overlapped Channels

Mohammad Hoque, Xiaoyan Hong, Farhana Afroz (The University of Alabama, USA)

Capacity of Wireless Multi-hop Networks Using Physical Carrier Sense and Transmit Power Control

Eren Gurses, Raouf Boutaba (University of Waterloo, Canada)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Honolulu Suite #3

AHSN-12: Mobile Ad hoc Networks

Chair: Hossam Hassanein (Queen's University, Canada)

Delay-Guaranteed Multicast Routing in Multi-Rate MANETs

Yu-Hsun Chen, Gen-Huey Chen (National Taiwan University, Taiwan)

Chia-Cheng Hu (Naval Academy, Taiwan)

Eric Hsiao-Kuang Wu (National Central University, Taiwan)

An Epidemic P2P Content Search Mechanism for Intermittently Connected Mobile Ad hoc Networks

Yaozhou Ma, Abbas Jamalipour (University of Sydney, Australia)

Efficient Multipoint P2P File Sharing in MANETs

Afzal Mawji, Hossam Hassanein (Queen's University, Canada)

Self-Pruning Broadcasting for Mobile Ad Hoc Networks

Wilson Woon, Kwan L. Yeung (University of Hong Kong, Hong Kong)

An Analytical Model of Routing, Misbehavior, and Countermeasures in Mobile Ad Hoc Networks

André König, Daniel Seither, Ralf Steinmetz, Matthias Hollick (Technische Universitaet Darmstadt, Germany)

Distributed Hierarchical Key Management Scheme in Mobile Ad Hoc Networks

Fei Wang, F. Richard Yu (Carleton University, Canada)

Anand Srinivasan (EION Inc., Canada)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Coral Ballroom Lounge

AHSN-27: Tpoics in Ad Hoc Sensor and Mesh Networking IV (Poster)

Chair: Dario Pompili (Rutgers University, USA), Boleslaw Szymanski (Rensselaer Polytechnic Institute, USA)

Movement Recognition using Body Area Networks

John Paul Varkey, Dario Pompili (Rutgers University, USA)

Impact of Social Networks in Delay Tolerant Routing

Eyuphan Bulut, Zijian Wang, Boleslaw K. Szymanski (Rensselaer Polytechnic Institute, USA)

Iterative Limited Feedback Beamforming for MIMO Ad-hoc Networks

Jong-Ho Lee (Kongju National University, Korea)

Ye Geoffrey Li (Georgia Institute of Technology, USA)

Human Behavior and Challenges of Anonymizing WLAN Traces

Udayan Kumar, Ahmed Helmy (University of Florida, USA)

Analysis of Fundamental Limits for Partial Connectivity in Wireless Networks

Andras Farago (The University of Texas at Dallas, USA)

Incremental Routing and Scheduling in Wireless Grids

Abdullah-Al Mahmood, Ehab S. Elmallah (University of Alberta, Canada)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Iolani Suite 5-6 CISS-04: Attack Detection

Chair: Martine Bellaïche (École Polytechnique, Canada)

Collaborative Anomaly Detection for Structured P2P Networks

Wei Wang, Hong Man, Fangming He (Stevens Institute of Technology, USA)

Detecting Identity Spoofs in 802.11e Wireless Networks

Gayathri Chandrasekaran, John-Austen Deymious, Vinod Ganapathy, Marco Gruteser, Wade Trappe (Rutgers University, USA)

Periodic Behavior in Botnet Command and Control Channels Traffic

Basil AsSadhan, José M. F. Moura (Carnegie Mellon University, USA)

David Lapsley (BBN Technologies, USA)

An Effective Early Warning Scheme against Pollution Dissemination for BitTorrent

An'an Luo, Chuang Lin, Yixin Jiang (Tsinghua University, China)

Xiaowen Chu (Hongkong Baptist University, Hong Kong)

Hongkun Yang (Tsinghua University, China)

SYN Flooding Attack Detection Based on Entropy Computing

Martine Bellaïche (École Polytechnique, Canada)

Jean-Charles Gregoire (INRS, Canada)

Security Analysis for Online Banking System Using Hierarchical Stochastic Game Nets Model

Yuanzhuo Wang, Chuang Lin, Kun Meng, Hongkun Yang (Tsinghua University, China)

Junjie Lv (Beijing Technology and Business University, China)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Kahili 1

CQPRM-04: Quality and Performance in Peer-to-peer Networks

Chair: Luigi Atzori (University of Cagliari, Italy)

Selfishness-Aware Data-driven Overlay Network

Miao Wang, Yujun Zhang, Guojie Li (Chinese Academy of Sciences, China)

Comparison of Piece-based File Sharing Schemes over a Peer-to-Peer Network in a Heterogeneous Network Environment

Jenq-Shiou Leu, Ming-Hung Huang (National Taiwan University of Science and Technology, Taiwan)

Improving Deployability of Peer-Assisted CDN Platform with Incentive

Tatsuya Mori, Noriaki Kamiyama, Shigeaki Harada, Haruhisa Hasegawa, Ryoichi Kawahara (NTT, Japan)

Market-Based Cooperative Resource Allocation for Overlay Networks

Ryota Egashira, Ariffin Datuk Yahaya, Tatsuya Suda (University of California, Irvine, USA)

An Evolutionary Game Approach to P2P Video Streaming

Luigi Chisci, Francesco Papi, Tommaso Pecorella, Romano Fantacci (University of Florence, Italy)

Group-Based Search in Unstructured Peer-to-Peer Networks

Kun Zhao (Beijing Institute of Technology, China, and Northwest University for Nationalities, China)

Niu Zhendong, Zhao Yumin (Beijing Institute of Technology, China)

Yang Jun (Northwest University for Nationalities, China)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Sea Pearl Suite 5-6

CSS-04: Software and Protocol Technologies

Chair: Joel J. Rodrigues (University of Beira Interior, Portugal)

A Framework for Developing User-Centric Services for Communication End-Points

Krishna Kishore Dhara, Tim I. Ross, Venkatesh Krishnaswamy (Avaya Labs Research, USA)

Parallel Multi Agent Middleware for Dynamic Service Reconstruction in Smart Space

Yoonsik Uhm, Zion Hwang, Minsoo Lee (Chung-Ang University, Korea)

Yong Kim, Sehyun Park (Chung-Ang University, Korea)

Cognitive Information Service: Basic Principles and Implementation of A Cognitive Inter-Node Protocol Optimization Scheme

Dzmitry Kliazovich, Fabrizio Granelli (University of Trento, Italy)

Nelson L. S. da Fonseca (State University of Campinas, Brazil)

Radoslaw Piesiewicz (Create-Net, Italy)

Bundle Protocol (BP) over Licklider Transmission Protocol (LTP) for Cislunar Communications

Ruhai Wang, Tiaotiao Wang, Xuan Wu (Lamar University, USA)

A Preventive Rerouting Scheme for Avoiding Voids in Wireless Sensor Networks

Mohamed Aissani, Abdelhamid Mellouk (LiSSi, France)

Nadjib Badache (University of Sciences and Technology Houari Boumediane, Algeria)

Mohamed Djebbar (EMP School, Algeria)

A Distributed Bandwidth Partitioning Scheme for Concurrent Network-Coded Multicast Sessions

Niveditha Sundaram, Parmesh Ramanathan (University of Wisconsin, USA)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Sea Pearl Suite 3-4

CTS-04: Network Coding and Cooperation

Chair: Dario Fertonani (Arizona State University, USA)

Convolutional Codes for Network-Error Correction

Prasad Krishnan, B. Sundar Rajan (Indian Institute of Science, India)

Random Linear Network Coding for Time-Division Duplexing: Field Size Considerations

Daniel E. Lucani, Muriel Medard (Massachusetts Institute of Technology, USA)

Milica Stojanovic (Northeastern University, USA)

Achieving Lower Distortion with Lattice Strategies in Multicast Wireless Networks

Ao Zhan, Chen He, Lingge Jiang (Shanghai Jiaotong University, China)

Joint Scheduling and Instantaneously Decodable Network Coding

Danail Traskov (Technical University of Munich, Germany)

Muriel Medard (Massachusetts Institute of Technology, USA)

Parastoo Sadeghi (The Australian National University, Australia)

Ralf Koetter (University of Illinois, USA)

Network Coded Cooperative Diversity with Multiple Sources

Lei Xiao, Daniel Costello, Thomas Fuja (University of Notre Dame, USA)

Cooperative Uplink of Two Mobile Stations with Network Coding based on the WiMax LDPC Code

Lena Chebli, Christoph Hausl, Georg Zeitler, Ralf Koetter (Technical University of Munich, Germany)

Wednesday, 2 December 2009

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Location: Coral Ballroom Lounge

CTS-15: Topics in Communications Theory II (Poster)

Chair: Eirik Rosnes (University of Bergen, Norway)

New Bounds on the Total-Squared-Correlation of Quaternary Signature Sets and Optimal Designs

Ming Li, Stella N. Batalama, Dimitris Pados (State University of New York at Buffalo, USA)

John Matyjas (Air Force Research Laboratory, USA)

On the Secondary Capacity of the Communication Protocols

Petar Popovski (Aalborg University, Denmark)

Zoran Utkovski (University of Ulm, Germany)

On the Performance of Bit-Synchronizers in an ISI Channel and a Related Lower Bound

Amin Emad, Norman Beaulieu (University of Alberta, Canada)

Minimum-length Scheduling for Multicast Traffic under Channel Uncertainty

Anna Pantelidou (University of Oulu, Finland)

Anthony Ephremides (University of Maryland at College Park, USA)

Analysis of Delay Constrained Communications over OFDM systems

Beatriz Soret, M. Carmen Aguayo-Torres, J. Tomás Entrambasaguas (University of Málaga, Spain)

Energy Efficiency of Fixed-Rate Wireless Transmissions under Queueing Constraints and Channel Uncertainty

Deli Qiao, Mustafa Cenk Gursoy, Senem Velipasalar (University of Nebraska-Lincoln, USA)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Lehua Suite

NGNI-04: Routing & Switching - I

Chair: Nasir Ghani (University of New Mexico, USA)

Impact of Asymmetric Routing on Statistical Traffic Classification

Manuel Crotti, Francesco Gringoli, Luca Salgarelli (University of Brescia, Italy)

Automatic Flow Distribution and Management in Heterogeneous Networks

Yi Sun, Yuming Ge, Shan Lu (Institute of Computing Technology, China)

Eryk Dutkiewicz (Macquarie University, Australia)

Jihua Zhou (Chongqing Jinmei Communication Ltd, China)

Robust Traffic Engineering Using Multi-Topology Routing

Xiong Wang, Sheng Wang, Shizhong Xu, Le Min Li (University of Electronic Science and Technology of China, China)

How Bad is Single-Path Routing

Meng Wang (Cornell University, USA)

Chee Wei Tan (California Institute of Technology, USA)

Ao Tang (Cornell University, USA)

Steven Low (California Institute of Technology, USA)

Multi-Commodity Flow Traffic Engineering with Hybrid MPLS/OSPF Routing

Mingui Zhang, Bin Liu (Tsinghua University, China)

Beichuan Zhang (University of Arizona, USA)

Novel Topological Framework for Adaptive Routing

Alexander Stepanenko (Aston University, UK)

Constantinos Constantinou (University of Birmingham, UK)

Wednesday, 2 December 2009

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Location: Iolani Suite 1-2

ONS-04: Optical Fiber Transmission and Monitoring

Chair: Alberto Bononi (Università di Parma, Italy)

Insertion of 100Gb/s Coherent PDM-QPSK Channels over Legacy Optical Networks Relying on Low Chromatic Dispersion Fibres

Oriol Bertran-Pardo (Bell Labs, Alcatel-Lucent / Telecom Paristech, France)

Jérémie Renaudier, Gabriel Charlet, Patrice Tran, Haïk Mardoyan, Massimiliano Salsi (Bell Labs, Alcatel-Lucent, France)

Marco Bertolini (Università di Parma, Italy)

Sébastien Bigo (Bell Labs, Alcatel-Lucent, France)

Experimental Investigation of Real Time 10Gbit/s MLSE Equalizer Using 4-states and 16-states Viterbi Detector

Daniel Fritzsche (European Center for Information and Communication Technologies, Germany)

Dirk Breuer (Deutsche Telekom AG, Laboratories, Germany)

Lars Schürer, Armin Ehrhardt (Deutsche Telekom Netzproduktion GmbH, Zentrum TE, Germany)

Hamdi Oeruen (CoreOptics GmbH, Germany)

Christian Schäffer (University of the Federal Armed Forces, Germany)

Diversity Combining for Asymmetrically Clipped Optical OFDM in IM/DD Channels

Liang Chen, Brian Krongold, Jamie Evans (University of Melbourne, Australia)

Evaluation of the Impact of Filter Shape on the Performance of SOA-assisted SS-WDM Systems Using Parallelized Multicanonical Monte Carlo

Amirhossein Ghazisaeidi, Francesco Vacondio, Leslie Rusch (Laval University, Canada)

On Analyzing the Capacity of WDM PONs

Jingjing Zhang, Nirwan Ansari (New Jersey Institute of Technology, USA)

Experimental Validation of Periodic Codes for PON Monitoring

Mohammad Mansour Rad (Laval University, Canada)

Habib Fathallah (King Saud University, Saudi Arabia)

Sophie LaRochelle, Leslie Rusch (Laval University, Canada)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Sea Pearl Suite 1-2

SAC(CRN)-04: Dynamic Spectrum Access

Chair: Subir Biswas (Michigan State University, USA)

Analysis of Dynamic Spectrum Access with Heterogeneous Networks: Benefits of Channel Packing Scheme Ling Luo, Sumit Roy (University of Washington, USA)

Joint Dynamics of Spectrum Allocation and User Behavior in Spectrum Markets

Yuki Saito, Koji Yamamoto, Hidekazu Murata, Susumu Yoshida (Kyoto University, Japan)

Model-Based Opportunistic Channel Access in Dynamic Spectrum Access Networks

Manuj Sharma, Anirudha Sahoo (Indian Institute of Technology, India)

K.D. Nayak (DRDO, India)

Optimal Channel Access for TCP Performance Improvement in Cognitive Radio Networks: A Cross-Layer Design Approach

Changging Luo (Beijing University of Posts Telecommunications, China)

F. Richard Yu (Carleton University, Canada)

Hong Ji (Beijing University of Posts Telecommunications, China)

Victor C. M. Leung (The University of British Columbia, Canada)

Cognitive MIMO Radio: Incorporating Dynamic Spectrum Access in Multiuser MIMO Network

Harpreet Dhillon, R. Michael Buehrer (Virginia Polytechnic Institute and State University, USA)

Effect of Dynamic Spectrum Access on Transport Control Protocol Performance

Yogesh Kondareddy, Prathima Agrawal (Auburn University, USA)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Kahili 2

SAC(CN-01): Consumer Networks and Applications

Chair: Naohisa Ohta (Keio University, Japan)

An Efficient Storage Utilization for High-Quality Content Distribution in a PVR-based Community

Sungwook Chung (University of Florida, USA)

Eunsam Kim (Hongik University, Korea)

Jonathan Liu (University of Florida, USA)

Design and Evaluation of a Wireless Body Sensor System for Smart Home Health Monitoring

Chao Chen, Carlos Pomalaza-Ráez (Indiana University-Purdue University, USA)

Minimum-cost Implementation of Traffic Information System over Wireless Mesh Network

Kaveh Shafiee, Victor C. M. Leung (University of British Columbia, Canada)

Time-Critical Data Dissemination in Cooperative Peer-to-Peer Systems

Chi-Jen Wu (National Taiwan University, Taiwan)

Cheng-Ying Li, Kai-Hsiang Yang, Jan-Ming Ho (Academia Sinica, Taiwan)

Ming-Syan Chen (National Taiwan University, Taiwan)

A Measurement Study of External Links of YouTube

Kunfeng Lai, Dan Wang (Hong Kong Polytechnic University, Hong Kong)

Real-World VANET Security Protocol Performance

Jason S. Haas, Yih-Chun Hu (University of Illinois at Urbana-Champaign, USA)

Ken P. Laberteaux (Toyota Research Institute, USA)

Wednesday, 2 December 2009

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Location: Iolani Suite 3-4

SPC-04: Channel Estimation, Modeling and Equalization 3

Chair: Kazunori Hayashi (Kyoto University, Japan), Hung Nguyen (The Aerospace Corporation, USA)

New Convolutive-Error-Measure and Minimum Total-Model-Order Determination Algorithm for Equalization in Communications

Shih Yu Chang (National Tsing Hua University of Taiwan, Taiwan)

Hsiao-Chun Wu (Louisiana State University, USA)

Training Signal Design for Discriminatory Channel Estimation

Tsung-Hui Chang, Y.-W. Peter Hong, Chong-Yung Chi (National Tsing Hua University, Taiwan)

MMSE Relaying and Power Allocation over Frequency-Selective Rayleigh Fading Channels

Tung T. Pham, Ha H. Nguyen, Duy H. N. Nguyen (University of Saskatchewan, Canada)

Hoang D. Tuan (The University of New South Wales, Australia)

MSE Bounds for Phase Estimation in Presence of Recursive Nuisance Parameters

Xiaojing Huang, Y. Jay Guo (Commonwealth Scientific and Industrial Research Organization ICT Centre, Australia)

Semi-Blind Channel Estimation for Space-Time Coded Amplify-and-Forward Relay Networks

Yang Lu (National University of Singapore, Singapore)

Feifei Gao (Jacobs University, Bremen, Germany)

Puthusserypady Sadasivan (National University of Singapore, Singapore)

Arumugam Nallanathan (King's College London, UK)

An Iterative Equalization Method for Nonirreducible MIMO FIR Channels

Yong Xiang, Sze Kui Ng (Deakin University, Australia)

Wednesday, 2 December 2009

10:15 - 12:15

Location: S. Pacific Ballroom #1

WCS-13: Cooperative Communication: Signal Processing

Chair: Salama Said Ikki (University of Waterloo, Canada)

Permutation Optimization in QRD Based Multi-relay Systems

Hang Long, Kan Zheng, Meiying Wei, Fangxiang Wang, Wenbo Wang (Beijing University of Posts and Telecommunications, China)

Preamble-Based Channel Estimation for Amplify-and-Forward OFDM Relay Networks

Bin Jiang, Haiming Wang, Xiqi Gao, Shi Jin (Southeast University, China)

Kai-Kit Wong (University College London, UK)

Optimization of Power Constrained Multi-Source Uplink Relay Networks

Yi Zheng, Steven Blostein (Queen's University, Canada)

A New Coupling Channel Estimator for Cross-Talk Cancellation at Wireless Relay Stations

Jun Ma, Geoffrey Ye Li (Georgia Tech, USA)

Jinyun Zhang (Mitsubishi Electric Research Laboratories, USA)

Toshiyuki Kuze, Hiroki Iura (Mitsubishi Electric Corporation, Japan)

DMT Analysis of Asynchronous OFDM Decode-and-Forward Cooperative Networks

Mehdi Torbatian, Mohamed Oussama Damen (University of Waterloo, Canada)

Joint MMSE Transceiver Design for Closed-Loop Non-Regenerative MIMO Relaying Systems

Chang-Ick Song, Kyoung-Jae Lee, Inkyu Lee (Korea University, Korea)

Wednesday, 2 December 2009

10:15 - 12:15

Location: S. Pacific Ballroom #2 WCS-14: Multiuser MIMO

Chair: Xianbin Wang (University of Western Ontario, Canada)

Channel Vector Quantization for Multiuser MIMO Systems Aiming at Maximum Sum Rate

Guido Dietl, Olivier Labrèche (DOCOMO Euro-Labs, Germany) Wolfgang Utschick (Munich University of Technology, Germany)

User Pairing for Multiuser SC-FDMA Transmission over Virtual MIMO ISI Channels

Michael A. Ruder, Uyen Ly Dang, Wolfgang H. Gerstacker (University of Erlangen-Nuremberg, Germany)

MMSE-Based User Selection Algorithms for Multiuser Linear Precoding

Ngoc-Dung Dao, Yong Sun (Toshiba Research Europe Limited, UK)

Transmission Strategies and Sum Rate Maximization in Multi-User TDD Systems

Umer Salim, Dirk Slock (Eurecom, France)

Downlink Transmission Optimization and Statistical Feedback Strategies in a Multi-User IEEE 802.16m System

Christos Papathanasiou (University of Thessaly, Greece)

Nikos Dimitriou (National & Kapodistrian University of Athens, Greece)

Leandros Tassiulas (University of Thessaly, Greece)

Waterfilling Schemes for Zero-Forcing Coordinated Base Station Transmission

Ana Garcia Armada, Matilde Sánchez-Fernández (Universidad Carlos III de Madrid, Spain)

Roberto Corvaja (University of Padova, Italy)

Wednesday, 2 December 2009

10:15 - 12:15

Location: S. Pacific Ballroom #3 WCS-15: Cross-layer Design

Chair: Amir Hamed Mohsenian Rad (University of British Columbia, Canada)

Cross-layer Congestion Control and Scheduling in Multi-hop OFDMA Wireless Networks

Pan Zhou, Guowang Miao, Benny Bing (Georgia Institute of Technology, USA)

Buffer State Information: Two-Level Water-Filling for Fixed Rate Applications

Vinay Majjigi, Daniel O'Neill, John M. Cioffi (Stanford University, USA)

Reducing Signaling and Respecting Time-Scales in Cross-Layer Protocols Design for Wireless Networks

Pablo Soldati, Mikael Johansson (Royal Institute of Technology, Sweden)

Cross-layer Optimization of Unequal Protected Layered Video over Hierarchical Modulation

David Pradas (Universitat Autonoma de Barcelona, Spain)

Amine Bouabdallah, Jerome Lacan (Institut Superieur de l'Aeronautique et de l'Espace, France)

M. Angeles Vazquez (Universidad Autonoma de Barcelona, Spain)

Michel Bousquet (Institut Superieur de l'Aeronautique et de l'Espace, France)

Optimal Multiplexed Hierarchical Modulation for Unequal Error Protection of Progressive Bit Streams

Seok-Ho Chang (University of California, San Diego, USA)

Minjoong Rim (Dongguk University, Korea)

Pamela Cosman, Laurence Milstein (University of California, San Diego, USA)

Downlink Mobile OFDMA Resource Allocation With Minimum User Rate Requests

Stelios Stefanatos (Institute of Accelerating Systems and Applications, Greece)

Christos Papathanasiou (University of Thessaly, Greece)

Nikos Dimitriou (Institute of Accelerating Systems and Applications, Greece)

Wednesday, 2 December 2009

10:15 - 12:15

Location: S. Pacific Ballroom #4 WCS-16: Performance Analysis

Chair: Yu Cheng (Illinois Institute of Technology, USA)

BER Performance Analysis of Multiuser Diversity with Antenna Selection in MRC MIMO Systems

Mohammad Torabi, David Haccoun (Ecole Polytechnique de Montreal, Canada)

Wessam Ajib (University of Quebec at Montreal, Canada)

Outage and Diversity Analysis of Opportunistic Beamforming over Rayleigh Channels

Serdar Ozyurt, Murat Torlak (University of Texas at Dallas, USA)

On the Performance of Cascaded Generalized K Fading Channels

Imene Trigui (INRS - EMT, Canada)

Amine Laourine (Cornell University, USA)

Sofiene Affes, Alex Stephenne (INRS - EMT, Canada)

Outage-based Throughput in Wireless Packet Networks

Pedro Pinto, Moe Z. Win (Massachusetts Institute of Technology, USA)

Adaptive M-PSK Communications in the Absence of Channel Gain Estimation

Athanasios S. Lioumpas, George K. Karagiannidis (Aristotle University of Thessaloniki, Greece)

Diomidis S. Michalopoulos (University of British Columbia, Canada)

Achieving Close-Capacity Performance with Simple Concatenation Scheme on Multiple-Antenna Channels

Nghi H. Tran, Tho Le-Ngoc (McGill University, Canada)

Tadashi Matsumoto (CWC - Oulu, Finland)

Ha H. Nguyen (University of Saskatchewan, Canada)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Coral Ballroom Lounge

WCS-40: Topics in Wireless Communications II (Poster)

Chair: Neelesh B. Mehta (Indian Institute of Science, India)

Linear Equalizers for Quasi-synchronous Block Spreading CDMA Systems

Mohammud Z. Bocus (University of Bristol, UK)

Yue Wang, Justin P. Coon (Toshiba Research Europe Limited, UK)

An Accurate Model For Interference From Spatially Distributed Shadowed Users in CDMA Uplinks

Neelesh B. Mehta, Sarabjot Singh (Indian Institute of Technology, India)

Andreas F. Molisch (University of Southern California, USA)

Novel Reliability-Based Hybrid ARQ Technique

Ahmad Gomaa (University of Texas at Dallas, USA)

Mohammed Nafie, Mohamed Abdallah (Cairo University, Egypt)

Pilot Power Protocol for Autonomous Infrastructure based Multihop Cellular Networks

Mark DeFaria, Elvino S. Sousa (University of Toronto, Canada)

Performance Analysis and Enhancement of Cooperative Retransmission Strategy for Delay-Sensitive Real-Time Services

Wei Song (University of New Brunswick, Canada)

Weihua Zhuang (University of Waterloo, Canada)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Coral Ballroom #1

WNS-07: Scheduling

Chair: Rose Qingyang Hu (Mississippi State University, USA)

A Low-Complexity Beamforming-Based Scheduling for Downlink OFDMA/SDMA Systems with Multimedia Traffic

Wen-Ching Chung, Li-Chun Wang, Chung-Ju Chang (National Chiao Tung University, Taiwan)

A Simple Greedy Algorithm for Link Scheduling with the Physical Interference Model

Dejun Yang, Xi Fang, Nan Li, Guoliang Xue (Arizona State University, USA)

Joint Link Scheduling and Routing for Directional-Antenna Based 60 GHz Wireless Mesh Networks Xi Zhang, Hang Su (Texas A&M University, USA)

Secondary User Friendly TDMA Scheduling in Opportunistic Spectrum Access Networks Hang Su, Xi Zhang (Texas A&M University, USA)

Long Term Fair Scheduling in a Cognitive Wireless Network with Spectrum Underlay

Bin Wang, Dongmei Zhao (McMaster University, Canada)

Localized Scheduling for Practical and Optimal Capacity Utilization in Large Wireless Networks

Yi Xu, Wenye Wang (North Carolina State University, USA)

Wednesday, 2 December 2009

10:15 - 12:15

Location: Coral Ballroom #2

WNS-08: Testbeds and Experimental Measurements

Chair: Rosario G. Garroppo (University of Pisa, Italy)

QOMB: A Wireless Network Emulation Testbed

Razvan Beuran (National Institute of Information and Communications Technology, Japan)

Lan Tien Nguyen (Japan Advanced Institute of Science and Technology, Japan)

Toshiyuki Miyachi, Junya Nakata (National Institute of Information and Communications Technology, Japan)

Ken-ichi Chinen, Yasuo Tan, Yoichi Shinoda (Japan Advanced Institute of Science and Technology, Japan)

Rapidly-Deployable Mesh Network Testbed

Michael Souryal, Andreas Wapf, Nader Moayeri (National Institute of Standards and Technology, USA)

Implication of MAC Frame Aggregation On Empirical Wireless Experimentation

Gautam Bhanage (Rutgers University, USA)

Rajesh Mahindra (NEC Labs America, USA)

Ivan Seskar, Dipankar Raychaudhuri (Rutgers University, USA)

Multicast Mobility in Heterogeneous Technologies: Experimental Validation

Susana Sargento (Universidade de Aveiro, Portugal)

David Wagner (Fraunhofer FOKUS Institute, Germany)

José Rocha (Universidade de Aveiro, Portugal)

Fabio Mitrano (Università di Roma "La Sapienza", Italy)

Janusz Gozdecki (AGH University of Science Technology, Poland)

Jens Mödeker (Fraunhofer FOKUS Institute, Germany)

Impact of TCP ACK Losses on TCP Fairness in Wireless Mesh Networks

Jae-Yong Yoo, JongWon Kim (Gwangju Institute of Science & Technology, Korea)

An Autonomous Cognitive Access Point for Wi-Fi Hotspots

Bheemarjuna Reddy Tamma, B. S. Manoj, Ramesh Rao (University of California at San Diego, USA)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Honolulu Suite #1

AHSN-13: Modeling of Ad Hoc Networks

Chair: Weihua Zhuang (University of Waterloo, Canada)

Modeling the Throughput and Delay in Wireless Multihop Ad-Hoc Networks

Ahmad Ali Abdullah, Fayez Gebali, Lin Cai (University of Victoria, Canada)

Modeling IEEE 802.11 DCF using Parallel Space - Time Markov Chain: Multi-Hop Ad Hoc Networks

Kaveh Ghaboosi, Matti Latva-aho (University of Oulu, Finland)

Yang Xiao (University of Alabama, USA)

Babak Hossein H. Khalaj (Sharif University of Technology, Iran)

On Reducing Blocking Probability in Cooperative Ad-hoc Networks

Ayda Basyouni, Walaa Hamouda, Amr Youssef (Concordia University, Canada)

Modeling and Analysis for Emergency Messaging Delay in Vehicular Ad Hoc Networks

Khadige Abboud, Weihua Zhuang (University of Waterloo, Canada)

On Hopping Strategies for Autonomous Wireless Networks

Pedro H. J. Nardelli, Giuseppe T. F. de Abreu (University of Oulu, Finland)

Optimality Bounds of the Connectivity of Adhoc Networks with Beamforming Antennas

Moritz Kiese, Christian Hartmann, Robert Vilzmann (Technische Universitätet Muenchen, Germany)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Honolulu Suite #1

AHSN-14: Vehicular Ad Hoc Networks

Chair: Sherman Shen (University of Waterloo, Canada)

Periodic Broadcast Type Timing Reservation MAC Protocol for Inter-Vehicle Communications

Kenji Ito, Noriyoshi Suzuki, Satoshi Makido, Hiroaki Hayashi (Toyota Central R&D Labs., Inc., Japan)

Information Dissemination Control for Cooperative Active Safety Applications in Vehicular Ad-Hoc Networks

Ching-Ling Huang, Yaser Pourmohammadi-Fallah, Raja Sengupta (University of California at Berkeley, USA) Hariharan Krishnan (General Motors, USA)

MAAC: Message Authentication Acceleration Protocol for Vehicular Ad Hoc Networks

Albert Wasef, Xeumin (Sherman) Shen (University of Waterloo, Canada)

Mobility-based Clustering in VANETs using Affinity Propagation

Christine Shea, Behnam Hassanabadi, Shahrokh Valaee (University of Toronto, Canada)

Position-based Directional Vehicular Routing

Daxin Tian, Kaveh Shafiee, Victor C. M. Leung (University of British Columbia, Canada)

Adaptive Message Routing with QoS support in Vehicular Ad Hoc Networks

Hanan Saleet (University of Waterloo, Canada)

Rami Langar (UPMC - Paris Universitas, France)

Otman Basir, Raouf Boutaba (University of Waterloo, Canada)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Honolulu Suite #3

AHSN-15: Medium Access Control

Chairs: Vojislav B. Misic (Ryerson University, Canada), J. J. Garcia-Luna-Aceves (University of California at Santa Cruz, USA)

CoRe-MAC: A MAC-Protocol for Cooperative Relaying in Wireless Networks

Helmut Adam, Wilfried Elmenreich, Christian Bettstetter (University of Klagenfurt, Austria) Sidi-Mohammed Senouci (Orange Labs, France)

Trading Delay for Fairness in MAC Design for Cognitive Personal Area Networks

Jelena Misic, Vojislav Misic (Ryerson University, Canada)

Collision-Free Asynchronous Multi-Channel Access in Ad Hoc Networks

Duy Nguyen, J. J. Garcia-Luna-Aceves, Katia Obraczka (University of California, Santa Cruz, USA)

Feedback based Real-time MAC (RT-MAC) Protocol for Wireless Sensor Networks

Brajendra Kumar Singh, Kemal Ertugrul Tepe (University of Windsor, Canada)

Adaptive Probabilistic Medium Access in MPR-Capable Ad-hoc Wireless Networks

Majid Ghanbarinejad, Christian Schlegel, Pawel Gburzynski (University of Alberta, Canada)

Continuous Contention-Assisted Transmission MAC Protocol for Wireless Ad-Hoc Network

Dinh Chi Hieu, Shimamoto Shigeru (Waseda University, Japan)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Iolani Suite 5-6

CISS-05: Cryptographic Algorithms and Protocols

Chair: Nei Kato (Tohoku University, Japan)

Secret-sharing based Secure Communication Protocols for Passive RFIDs

Harsh Kapoor, Dijiang Huang (Arizona State University, USA)

ASIC: Aggregate Signatures and Certificates Verification Scheme for Vehicular Networks

Albert Wasef, Xeumin (Sherman) Shen (University of Waterloo, Canada)

A Group-Based Key Management Protocol for Mobile Ad Hoc Networks

Qing Chen (Tohoku University, Japan)

Xiaodong Lin (University of Ontario Institute of Technology, Canada)

(Xeumin) Sherman Shen (University of Waterloo, Canada)

Kazuo Hashimoto, Nei Kato (Tohoku University, Japan)

Adding Integrity Verification Capabilities to the LDPC-Staircase Erasure Correction Codes

Mathieu Cunche, Vincent Roca (INRIA, France)

Secure RFID Authentication with Efficient Key-Lookup

Mete Akgun (Tubitak UEKAE, Turkey)

Mehmet Ufük Çağlayan, Emin Anarim (Bogazici University, Turkey)

A New Construction of Knapsack PKC By Using A Random Sequence

Yasuyuki Murakami (Osaka Electro-Communication University, Japan)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Coral Ballroom Lounge

CISS-09: Topics in Communication and Information System Security (Poster)

Chair: Zhu Han (University of Houston, USA)

DAKS: An Efficient Batch Rekeying Scheme for Departure-Aware Multicast Services

Yang Ji, Seung-Woo Seo (Seoul National University, Korea)

VisualSec: A Secure Message Delivery Scheme for Online Social Networks Based on Profile Images

Meng Ge, Kwok-yan Lam, Xiuqun Wang, Zhiguo Wan (Tsinghua University, China)

Bin Jiang (Southeast University, China)

Reusable Set Constructions Using Randomized Dissolvent Templates for Biometric Security

Jinyang Shi, Kwok-yan Lam, Ming Gu (Tsinghua University, China)

Husheng Li (University of Tennessee, USA)

An Efficient Key Management Scheme for Live Streaming

Xingyu Li, H. Vicky Zhao (University of Alberta, Canada)

A Game Theoretic Analysis of Blacklisting in Online Data Storage Systems

Bader Ali, Muthucumaru Maheswaran (McGill University, Canada)

On Privacy of Skype VoIP Calls

Ye Zhu, Yuanchao Lu, Anil Babu Vikram (Cleveland State University, USA)

Huirong Fu (Oakland University, USA)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Kahili 1

COPRM-05: Network Modeling

Chair: Noriaki Kamiyama (NTT Service Integration Laboratories, Japan)

Performance Analysis of Communication Networks in Multi-Cluster Systems under Bursty Traffic with Communication Locality

Yulei Wu, Geyong Min (University of Bradford, UK)

Keqiu Li (Dalian University of Technology, China)

Bahman Javadi (INRIA, France)

Performance Analysis of IEEE 802.11 Ad hoc Networks with Cooperative ARQ in the Presence of Hidden and Exposed Terminals

Georgios Kormentzas (University of the Aegean, Greece)

Jesus Alonso-Zárate (Telecommunications Technological Centre of Catalonia, Spain)

Luis Alonso (Universidad Politecnica de Catalunya, Spain)

Christos Verikoukis (Telecommunications Technological Centre of Catalonia, Spain)

Network Topology Discovery through Self-Constrained Decisions

Gianni Antichi, Andrea Di Pietro, Domenico Ficara, Stefano Giordano, Gregorio Procissi, Fabio Vitucci (University of Pisa, Italy)

Bridging the Gap between Mathematical Traffic Models and Operational Parameters

Kristof Sleurs, Dagang Li, Emmanuel Van Lil, Antoine Van de Capelle (Katholieke Universiteit Leuven, Belgium)

Engset Formula for Bufferless OBS/OPS: When is and When Isn't Lengthening the Off-Time Redundant?

Andrew Zalesky (University of Melbourne, Australia)

Eric W. M. Wong, Moshe Zukerman (City University of Hong Kong, Hong Kong)

Hai L. Vu (Swinburne University of Technology, Australia)

Stochastic Network Calculus Models under Max-Plus Algebra

Jing Xie, Yuming Jiang (Norwegian University of Science and Technology, Norway)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Kahili 2

COPRM-06: Cross-layer Design

Chair: Yannis Viniotis (North Carolina State University, USA)

Optimizing Aggregate Throughput in 802.11 Networks Through Balancing Spatial Reuse and Transmission Rate

Junmei Qu, Zenghua Zhao, Lianfang Zhang, Yantai Shu (Tianjin University, P.R. China)

Experimental Performance Evaluation of a MAC protocol for Cooperative ARQ Scenarios

Christos Verikoukis (Telecommunications Technological Centre of Catalonia, Spain)

Ana Pérez-Neira (Universitat Politècnica de Catalunya, Spain)

Jesus Alonso-Zárate (Telecommunications Technological Centre of Catalonia, Spain)

Harry Skianis (University of the Aegean, Greece)

Joint Power Control and FEC Unequal Error Protection for Scalable H.264 Video Transmission over Wireless Fading Channels

Chen Chi, Yu Zhang, Lele Wang (Tsinghua University, China)

Cross-layer Design for Wireless Video Streaming

Yongjin Cho, C.-C. Jay Kuo (University of Southern California, USA)

Renxiang Huang, Claudio Lima (Sprint Labs, USA)

Social Distance Aware Resource Allocation in Wireless Networks

Vineet Kulkarni, Michael Devetsikiotis (North Carolina State University, USA)

Load Balancing for Flow-based Parallel Processing Systems in CMP Platform

Tingwen Liu, Yong Sun, Zhang Bin, Li Guo (Chinese Academy of Sciences, China)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Sea Pearl Suite 5-6

CSS-05: Quality of Experience (QoE) and QoS (Quality of Service)

Chair: Mohammad S. Obaidat (Monmouth University, USA)

Hybrid Tree Based Explicit Routed Multicast for QoS Supported IPTV Service

Chih-Chao Wen, Cheng-Shong Wu (National Chung-Cheng University, Taiwan)

Ming-Ta Yang (Industrial Technology Research Institute, Taiwan)

On Locating Loss Links of Signaling Messages in SIP-based Services

Takeshi Usui, Takeshi Kubo, Yoshinori Kitatsuji, Teruyuki Hasegawa, Hidetoshi Yokota (KDDI R&D Labs, Japan)

On the Objective Evaluation of Real-Time Networked Games

Arnaud Kaiser (University of Paris 13, France)

Dario Maggiorini (University of Milano, Italy)

Nadjib Achir, Khaled Boussetta (University of Paris 13, France)

Incorporating TCP Acknowledgements in MAC Layer in IEEE 802.11 Multihop Ad Hoc Networks

Lianghui Ding, Wenjun Zhang, Hui Yu, Xinbing Wang, Youyun Xu (Shanghai Jiaotong University, China)

Efficient Resource Reservation for Optical Burst Switching Networks

Walid Abdallah, Mohamed Hamdi, Noureddine Boudriga (University of Carthage, Tunisia)

Mohammad S. Obaidat (Monmouth University, USA)

Modeling and Characterizing User Experience in a Cloud Server Based Mobile Gaming Approach

Shaoxuan Wang, Sujit Dey (University of California, San Diego, USA)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Sea Pearl Suite 3-4 CTS-05: Channel Coding

Chair: Hamid Jafarkhani (University of California, USA)

Coding for a Bit-Shift Channel With Applications to Inductively Coupled Channels

Eirik Rosnes (University of Bergen, Norway)

Angela I. Barbero (University of Valladolid, Spain)

Øyvind Ytrehus (University of Bergen, Norway)

Performance Bounds for Linear Codes in Multi-Rate Superposition Schemes

Uttam Bhat, Dario Fertonani, Tolga M. Duman (Arizona State University, USA)

Design and Analysis of Non-binary LDPC and IRA Modulation Codes

Mao-Ching Chiu (National Chung Cheng University, Taiwan)

Spectral Graph Analysis of Quasi-Cyclic Codes

Roxana Smarandache (San Diego State University, USA)

Mark F. Flanagan (University College Dublin, Ireland)

On Asymptotic Ensemble Weight Enumerators of Multi-Edge Type Codes

Chung-Li Wang (University of California, Davis, USA)

Marc Fossorier (ETIS, France)

Shu Lin (University of California, Davis, USA)

A Systematic Reed-Solomon Encoder with Arbitrary Parity Positions

Joschi Brauchle, Ralf Koetter (Technical University of Munich, Germany)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Lehua Suite

NGNI-05: Routing & Switching - II

Chair: Pramode K. Verma (The University of Oklahoma, USA)

Performance Evaluation of Selected Packet Dispatching Schemes for the CBC Switches

Janusz Kleban, Szymon Piotrowski (Poznan University of Technology, Poland)

DROP: An Open-Source Project towards Distributed SW Router Architectures

Raffaele Bolla, Roberto Bruschi, Guerino Lamanna, Andrea Ranieri (University of Genoa, Italy)

An Experimental Evaluation of the Computational Cost of a DPI Traffic Classifier

Niccolò Cascarano (Politecnico di Torino, Italy)

Alice Este, Francesco Gringoli (University of Brescia, Italy)

Fulvio Risso (Politecnico di Torino, Italy)

Luca Salgarelli (University of Brescia, Italy)

Backlog Aware Scheduling for Ingress Memories in High-Radix, Single-Stage Switches

Dimitrios Tsamis, Benjamin Yolken, Nicholas Bambos (Stanford University, USA)

Wladek Olesinski, Hans Eberle, Nils Gura (Sun Microsystems Inc., USA)

Efficient Multicast Support in Buffered Crossbars using Networks on Chip

Iria Varela Senin, Lotfi Mhamdi, Kees Goossens (University of Technology-Delft, The Netherlands)

Packet-mode Asynchronous Scheduling Algorithm for Partially Buffered Crossbar Switches

Masoumeh Karimi, Zhuo Sun, Deng Pan, Zesheng Chen (Florida International University, USA)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Iolani Suite 1-2

ONS-05: Optical Wireless Transmission

Chair: Vincent Chan (Massachusetts Institute of Technology, USA)

Coherent Optical Communication over the Turbulent Atmosphere with Spatial Diversity and Wavefront Predistortion

Andrew Puryear, Vincent Chan (Massachusetts Institute of Technology, USA)

Path Loss Simulation of an Infrared Optical Wireless System for Aircrafts

Svilen Dimitrov, Raed Mesleh (Jacobs University Bremen, Germany)

Harald Haas (University of Edinburgh, UK)

Mario Cappitelli, Michael Olbert (EADS Deutschland GmbH, Germany)

Erhard Bassow (Airbus, Germany)

On the Distribution of the Sum of Gamma-Gamma Variates and Application in MIMO Optical Wireless Systems

Nestor D. Chatzidiamantis, George K. Karagiannidis (Aristotle University of Thessaloniki, Greece)

Diomidis S. Michalopoulos (University of British Columbia, Canada)

Behavior of Hybrid Optical/RF Channels over Varying Link Distances

Ricardo Luna, Deva K. Borah, Hrishikesh Tapse (New Mexico State University, USA)

Performance Evaluation of an advanced DWDM RoFSO System for Heterogeneous Wireless

Pham Tien Dat, Abdelmoula Bekkali, Kamugisha Kazaura, Kazuhiko Wakamori, Toshiji Suzuki, Mitsuji Matsumoto (Waseda University, Japan)

Takeshi Higashino, Katsutoshi Tsukamoto, Shozo Komaki (Osaka University, Japan)

Theoretical Analysis of Optical Wireless CDMA with Modified Pseudo Orthogonal M-sequence Sets

Yusuke Kozawa, Hiromasa Habuchi (Ibaraki University, Japan)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Sea Pearl Suite 1-2

SAC(CRN)-05: Physical Layer Techniques for Cognitive Radio Networks

Chair: Sumit Roy (University of Washington, USA)

On Balancing Exploration vs. Exploitation on a Cognitive Engine for Multi-Antenna Systems

Haris Volos, R. Michael Buehrer (Virginia Polytechnic Institute and State University, USA)

Receiver Statistics for Spectrum Monitoring While Communicating

Steven W. Boyd, J. Michael Frye, Michael B. Pursley (Clemson University, USA)

Thomas C. Royster IV (Massachusetts Institute of Technology, USA)

Development Framework for Implementing FPGA-Based Cognitive Network Nodes

Jörg Lotze, Suhaib A. Fahmy (Trinity College Dublin, Ireland)

Juanjo Noguera (Xilinx Research Labs, Ireland)

Bariş Ozgul, Linda E. Doyle (Trinity College Dublin, Ireland)

Robert Esser (Xilinx Research Labs, USA)

ICI-Minimizing Blind Uplink Time Synchronization for OFDMA-Based Cognitive Radio Systems

Ismail Guvenc (DOCOMO USA Labs, USA)

Sibel Tombaz, Mustafa E. Sahin, Huseyin Arslan, Hakan Ali Çirpan (University of South Florida, USA)

A Combined Spectrum Sensing and OFDM Demodulation Scheme

Marnix Heskamp, Cornelis Slump (University of Twente, The Netherlands)

Exploiting the Multi-path Diversity and Multi-user Cooperation to Detect OFDM Signals for Cognitive Radio in Low SNR with Noise Uncertainty

Wei Zeng, Guangguo Bi (Southeast University, China)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Coral Ballroom Lounge

SAC(CRN)-09: Cognitive Radio Networks (Poster)

Chair: Mainak Chatterjee (University of Central Florida, USA)

Lp-Norm Spectrum Sensing for Cognitive Radio Networks Impaired by Non-Gaussian Noise

Farzad Moghimi, Amir Nasri, Robert Schober (University of British Columbia, Canada)

Worst-Case Sensing Deception in Cognitive Radio Networks

Qihang Peng (University of Electronic Science Technology of China, China)

Pamela C. Cosman, Laurence B. Milstein (University of California, San Diego, USA)

Spectrum Sensing by Cognitive Radios at Very Low SNR

Zhi Quan, Stephen J. Shellhammer, Wenyi Zhang (Qualcomm Inc., USA)

Ali H. Saved (University of California at Los Angeles, USA)

Adaptive Lp-Norm Metric for Secondary BICM-OFDM Systems

Amir Nasri, Robert Schober (University of British Columbia, Canada)

Exploring Simulated Annealing and Graphical Models for Optimization in Cognitive Wireless Networks

Elena Meshkova, Janne Riihijärvi, Andreas Achtzehn, Petri Mähönen (RWTH Aachen University, Germany)

Measurement based Capacity Scavenging via Whitespace Modeling in Wireless Networks

Anthony Plummer Jr., Mahmoud Taghizadeh, Subir Biswas (Michigan State University, USA)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Iolani Suite 3-4

SPC-05: OFDM and Multi-carrier Systems 1

Chair: Shigeru Shimamoto (Waseda University, Japan), Hung Nguyen (Aerospace Corporation, USA)

A Gibbs Sampling Based MAP Detection Algorithm for OFDM Over Rapidly Varying Mobile Radio Channels

Erdal Panayirci (Princeton University, USA)

Hakan Dogan (Istanbul University, Turkey)

H. Vincent Poor (Princeton University, USA)

Bayesian Cramer-Rao Bound for OFDM Rapidly Time-varying Channel Complex Gains Estimation

Hussein Hijazi, Laurent Ros (Grenoble Image Parole Signal Automatique, France)

Blind Detection of Partial Transmit Sequence in a Coded OFDM System

Koji Shibata, Julian Webber, Toshihiko Nishimura, Takeo Ohgane, Yasutaka Ogawa (Hokkaido University, Japan)

Behavioural Analysis of Internal Mechanism of Nonlinear OFDM Signals

Yiming Lei, Máirtin O'Droma (University of Limerick, Ireland)

A Universal Frequency Offset Estimator for OFDM Applications

Ming (Matt) Ruan, Mark C. Reed (NICTA/ANU, Australia)

Zhenning Shi (Alcatel-Lucent, China)

A Hybrid Integer Carrier Frequency Offset Estimator for Practical OFDM Systems

Ming (Matt) Ruan, Mark C. Reed (NICTA/ANU, Australia)

Zhenning Shi (Alcatel-Lucent, China)

Wednesday, 2 December 2009

14:00 - 16:00

Location: S. Pacific Ballroom #1

WCS-17: Cooperative Communication: Relay Techniques

Chair: Yuanzhu Peter Chen (Memorial University of Newfoundland, Canada)

A Novel Observe-and-Forward Scheme in Wireless Cooperative Relaying Systems

Wenjun Wu, Qingyi Quan, Yuexing Peng, Kan Zheng, Wenbo Wang (Beijing University of Posts & Telecommunications, China)

Young il Kim (Electronics and Telecommunications Research Institute, Korea)

The Gaussian Interference Relay Channel with a Potent Relay

Ye Tian, Aylin Yener (Pennsylvania State University, USA)

Dual-Hop Adaptive Packet Transmission with Regenerative Relaying for Wireless TDD Systems

Andreas Mueller (University of Stuttgart, Germany)

Hong-Chuan Yang (University of Victoria, Canada)

Performance of Orthogonal Wireless Relay Networks with Multiple SNR-Thresholds and Multiple Hard-Decision Detections

Dian-Wu Yue, Ha H. Nguyen (University of Saskatchewan, Canada)

Multi-Frame Distributed Protocol for Analog Network Coding in Slow-Fading Channels

Jonathan Gambini, Umberto Spagnolini (Politecnico di Milano, Italy)

Adaptive Modulation and Network Coding with Optimized Precoding in Two-Way Relaying

Toshiaki Koike-Akino (Harvard University, USA)

Petar Popovski (Aalborg University, Denmark)

Vahid Tarokh (Harvard University, USA)

Wednesday, 2 December 2009

14:00 - 16:00

Location: S. Pacific Ballroom #2 WCS-18: MIMO Precoding

Chair: Xiaodong Lin (University of Ontario, Canada)

A New THP Precoding Scheme With Effective Channel Optimization

Chunlin Yan, Hidetoshi Kayama, Wei Wang, Zhan Zhang (DOCOMO Beijing Communications Laboratories Co., Ltd, China)

Scale-Only Tomlinson-Harashima Precoding

Kai Xie, Jing Li (Lehigh University, USA) Xiaowen Wang, Syed Mujtaba (Apple, USA)

Unified Analysis of Linear Block Precoding for Distributed Antenna Systems

Toshiaki Koike-Akino (Harvard University, USA)

Andreas F. Molisch (University of Southern California, USA)

Zhifeng Tao, Philip Orlik (Mitsubishi Electric Research Labs, USA)

Toshiyuki Kuze (Mitsubishi Electric Corporation, Japan)

An Iterative Precoder Optimization Method for K-user Interference Channel Systems

Hakjea Sung, Kyoung-Jae Lee, Seok-Hwan Park, Inkyu Lee (Korea University, Korea)

Linear Beamforming for Multiuser MIMO Downlink Systems with Channel Orthogonalization

Jin-Sung Kim, Sung-Hyun Moon, Inkyu Lee (Korea University, Korea)

Constellation Precoded Beamforming

Hong Ju Park, Ender Ayanoglu (University of California, Irvine, USA)

Wednesday, 2 December 2009

14:00 - 16:00

Location: S. Pacific Ballroom #3

WCS-19: OFDMA

Chair: Jinyun Zhang (Mitsubishi Electric Research Laboratories, USA)

Opportunistic Cell Edge Selection in Multi-cell OFDMA Networks

Chun Kin Au Yeung (Purdue University, USA)

Amine Maaref, Jinyun Zhang (Mitsubishi Electric Research Laboratories, USA)

SC-FDMA versus OFDMA: Sensitivity to Large Carrier Frequency and Timing Offsets on the Uplink

K. Raghunath, A. Ananthanarayanan Chockalingam (Indian Institute of Science, India)

A Low Complexity Receiver for OFDMA Systems at Downlink

Chia-Horng Liu (Chunghwa Telecom Co., Ltd., Taiwan)

BER-based Chunk Allocation in Multiuser OFDM Wireless Systems

Huiling Zhu, Jiangzhou Wang (University of Kent, UK)

Capacity Evaluation of DF Protocols for OFDMA Infrastructure Relay Links

Taneli Riihonen, Risto Wichman, Stefan Werner (Helsinki University of Technology, Finland)

Diversity-Multiplexing Tradeoff in OFDMA Systems with Coherence Bandwidth Splitting

Bo Bai, Wei Chen, Zhigang Cao (Tsinghua University, China)

Khaled B. Letaief (Hong Kong University of Science & Technology, Hong Kong)

Wednesday, 2 December 2009

14:00 - 16:00

Location: S. Pacific Ballroom #4 WCS-20: Coding and Modulation

Chair: Meera Srinivasan (Jet Propulsion Laboratory, California Institute of Technology, USA)

A Trellis-Coded Modulation Scheme with a Novel Expanded 16-Dimensional Constant Envelope Q2PSK Constellation

Milton I. Quinteros, Edit J. Kaminsky (University of New Orleans, USA)

Kenneth V. Cartwright (College of The Bahamas, Bahamas)

Conflict Resolution by Matrix Reordering for DVB-T2 LDPC Decoders

Cédric Marchand (Universite Europeenne de Bretagne, France)

Jean-Baptiste Dore (NXP Semiconductors, France)

Laura Conde-Canencia, Emmanuel Boutillon (Universite Europeenne de Bretagne, France)

An MSK Waveform for Radar Applications

Kevin S. Quirk, Meera Srinivasan (Jet Propulsion Laboratory, California Institute of Technology, USA)

Practical Evaluation of Opportunistic Error Correction

Xiaoying Shao, Cornelis H. Slump (University of Twente, The Netherlands)

Efficient Ranking of Rate-Compatible Puncturing Patterns for a Given LDPC Code Matrix

Sissi X. Wu, Wai Ho Mow (Hong Kong University of Science and Technology, Hong Kong)

Multi-Rate Continuous Phase Modulations for Gaussian Broadcast Channels

Dario Fertonani, Tolga M. Duman (Arizona State University, USA)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Coral Ballroom Lounge WCS-41: Topics in MIMO (Poster)

Chair: Gerhard Bauch (Universitaet der Bundeswehr Munich & Institute for Information Processing, Germany)

Uncertainty Processing Applied to Packet Combining in MIMO-HARQ Systems

Jinhuan Xia, Tiejun Lv (Beijing University of Posts and Telecommunications, China)

Evolutionary Games for Hybrid Additive White Gaussian Noise Multiple Access Control

Quanyan Zhu (University of Illinois at Urbana-Champaign, USA)

Hamidou Tembine (University of Avignon, France)

Tamer Basar (University of Illinois at Urbana-Champaign, USA)

Robust Beamforming Design: From Cognitive Radio MISO Channels to Secrecy MISO Channels

Lan Zhang, Ying-Chang Liang (Institute for Infocomm Research, Singapore)

Yiyang Pei (Nanyang Technological University, Singapore)

Rui Zhang (Institute for Infocomm Research, Singapore)

How Does Correlation Affect the Capacity of MIMO Systems with Rate Constraints?

Hao Wang (Tsinghua University, China)

Peng Wang, Ping Li (City University of Hong Kong, Hong Kong)

Xiaokang Lin (Tsinghua University, China)

Kalman Filtering based Compensation for I/O Imbalance and CFO in Time-Varying MIMO OFDM Systems

Jingbo Gao, Xu Zhu (University of Liverpool, UK)

Hai Lin (Osaka Prefecture University, Japan)

Asoke K. Nandi (The University of Liverpool, UK)

On the Parameter Choice for Cyclic Delay Diversity Based Precoding with Spatial Multiplexing

Gerhard Bauch (Universitaet der Bundeswehr Munich, Germany)

Tetsushi Abe (NTT DOCOMO, Germany)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Coral Ballroom #1

WNS-09: Wireless Network Coding

Chair: Jun Zheng (Southeast University, China)

The Benefits of Network Coding over a Wireless Backbone

Hui Guo (National Institute of Standards and Technology, USA)

Yi Qian (University of Nebraska - Lincoln, USA)

Kejie Lu (University of Puerto Rico, Puerto Rico)

Nader Moayeri (National Institute of Standards and Technology, USA)

Analysis of Opportunistic Scheduling for Wireless Network Coding: Nonidentical Two-User Case

Poramate Tarasak, Ubolthip Sethakaset, Sumei Sun (Institute for Infocomm Research, Singapore)

Opportunistic Network Coding and Dynamic Buffer Allocation in a Wireless Butterfly Network

Surachai Chieochan, Ekram Hossain (University of Manitoba, Canada)

Teerawat Issariyakul (TOT Public Company Limited, Thailand)

Dusit Niyato (Nanyang Technological University, Singapore)

Reliability-based Rate Allocation in Wireless Inter-session Network Coding Systems

Keivan Ronasi, A. Hamed Mohsenian-Rad, Vincent W. S. Wong, Sathish Gopalakrishnan, Robert Schober (University of British Columbia, Canada)

R-Code: Network Coding based Reliable Broadcast in Wireless Mesh Networks with Unreliable Links

Zhengyu Yang, Ming Li, Wenjing Lou (Worcester Polytechnic Institute, USA)

Cooperative Peer-to-Peer Information Exchange via Wireless Network Coding

Yanfei Fan, Yixin Jiang, Haojin Zhu, Xeumin (Sherman) Shen (University of Waterloo, Canada)

Wednesday, 2 December 2009

14:00 - 16:00

Location: Coral Ballroom #2

WNS-10: 802.16 WiMAX Networks

Chair: Ana Garcia Armada (Universidad Carlos III de Madrid, Spain)

Error Control Strategies for WiMAX Multi-hop Relay Networks

Weihuang Fu (University of Cincinnati, USA)

Zhifeng Tao, Jinyun Zhang (Mitsubishi Electric Research Laboratories, USA)

Dharma P. Agrawal (University of Cincinnati, USA)

An Almost Overhead-free Error Control Scheme for IEEE 802.16-based Multi-hop Networks

Yue-Ru Chuang (Fu Jen Catholic University, Taiwan)

Hsueh-Wen Tseng (Cameo Communications, Inc., Taiwan)

Shiann-Tsong Sheu (National Central University, Taiwan)

Chih-Wei Su (Institute for Information Industry, Taiwan)

Joint Base Station and Relay Station Placement for IEEE 802.16j Networks

Hsiao-Chen Lu, Wanjiun Liao (National Taiwan University, Taiwan)

System-Level Performance Evaluation of Multi-cell Transparent Mode Relay 802.16j Systems

Vasken Genc, Sean Murphy, John Murphy, Abdelhamid Nafaa (University College Dublin, Ireland)

Quality of Activation (QoA) for Dynamic Service Flows in IEEE 802.16 Networks

Isabella Cerutti, Luca Valcarenghi, Piero Castoldi (Scuola Superiore Sant'Anna, Italy)

Providing Quality of Service Guarantees in Multiclass IEEE 802.16e Sleep Mode

Georgios Paschos (The Center for Research and Technology Hellas, Greece)

Petteri Mannersalo (VTT Technical Research Centre of Finland, Finland)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Honolulu Suite #1

AHSN-16: Cross Layer Optimization

Chair: Linda Jiang Xie (University of North Carolina at Charlotte, USA); Sneha Kasera (University of Utah, USA)

A Cross-Layer ECN to Achieve Fairness Among TCP Flows in Wireless Mesh Networks

Jin Ye, Jianxin Wang, Jiawei Huang (Central South University, China)

Xi Zhang (Texas A&M University, USA)

Inter-Gateway Cross-layer Handoffs in Wireless Mesh Networks

Weiyi Zhao, Jiang Xie (University of North Carolina at Charlotte, USA)

Data Acquisition through Joint Compressive Sensing and Principal Component Analysis

Riccardo Masiero, Giorgio Quer (University of Padova, Italy)

Daniele Munaretto (DOCOMO Euro-Labs, Germany)

Michele Rossi (University of Padova, Italy)

Joerg Widmer (DOCOMO Euro-Labs, Germany)

Michele Zorzi (University of Padova, Italy)

Joint Configuration of Routing and Medium Access Parameters in Wireless Networks

Md. Forkan Uddin, Catherine Rosenberg, Weihua Zhuang (University of Waterloo, Canada)

Andre Girard (Groupe d'Etudes et de Recherche en Analyse des Decisions, Canada)

Cross-Layer Modeling of Wireless Ad Hoc Networks in the Presence of Channel Noise

Khalid M. J. Khayyat, Fayez Gebali (The University of Victoria, Canada)

Cross Layer Multirate Adaptation Using Physical Capture

Jun Cheol Park, Sneha Kumar Kasera, Neal Patwari (University of Utah, USA)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Honolulu Suite #2 AHSN-17: Quality of Service

Chair: Hamid Sharif (University of Nebraska-Lincoln, USA)

MAC Support for Wireless Multimedia Sensor Networks

Osama Farrag (Johns Hopkins University Applied Physics Lab, USA)

Mohamed Younis (University of Maryland Baltimore County, USA)

William D'Amico (Johns Hopkins University Applied Physics Lab, USA)

Matching Stream Authentication and Resource Allocation to Multimedia Codec Dependency with Position-Value Partitioning in Wireless MultimediaSensor Networks

Wei Wang, Dongming Peng, Honggang Wang, Hamid Sharif (University of Nebraska-Lincoln, USA) Hsiao-Hwa Chen (National Cheng Kung University, Taiwan)

QoS-Driven Node Cooperative Resource Allocation for Wireless Mesh Networks with Service Differentiation Ho Ting Cheng, Weihua Zhuang (University of Waterloo, Canada)

A Practical Approach for Providing QoS in Multichannel Ad-Hoc Networks using Spectrum Width Adaptation Vijay Raman, Matthew Caesar (University of Illinois at Urbana-Champaign, USA)

Optimum Allocation of Energy and Spectrum in Power-Controlled Wireless Networks with QoS Constraints

Stepan Kucera (NICT Keihanna, Japan)

Ludek Kucera (Charles University, Czech Republic)

Bing Zhang (NICT Keihanna, Japan)

Distributed Optimal Relay Selection for QoS Provisioning in Wireless Multi-hop Cooperative Networks

Yifei Wei (Carleton University, Canada)

Mei Song (Beijing University of Posts Telecommunications, China)

F. Richard Yu (Carleton University, Canada)

Yong Zhang, Junde Song (Beijing University of Posts and Telecommunications, China)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Iolani Suite 5-6 CISS-06: Denial of Service

Chair: Hongmei Deng (Intelligent Automation Inc., USA)

Accountable File Indexing against DDoS Attacks in Peer-to-Peer Networks

Xiaosong Lou, Kai Hwang (University of Southern California, USA)

Yue Hu (University of Science and Technology, China)

Protecting SIP against Very Large Flooding DoS Attacks

Felipe Huici, Saverio Niccolini, Nico d'Heureuse (NEC Europe Ltd., Germany)

Detection of DDoS Traffic by using the Technical Analysis used in the Stock Market

Junghoon Yun, Song Chong (Korea Advanced Institute of Science and Technology, Korea)

RateGuard: A Robust Distributed Denial of Service (DDoS) Defense System

Huizhong Sun, Wingchiu Ngan, H. Jonathan Chao (Polytechnic Institute of New York University, USA)

Stealthy IP Prefix Hijacking: Don't Bite Off More Than You Can Chew

Christian McArthur (Texas A&M University, USA)

Mina Guirguis (Texas State University, USA)

NSF: Network-based Spam Filtering based on On-line Blacklisting against Spamming Botnets

Byungseung Kim (Samsung Electronics Co., Ltd., Korea)

Hyogon Kim (Korea University, Korea)

Saewoong Bahk (Seoul National University, Korea)

Wednesday, 2 December 2009 16:30 - 18:30 Location: Kahili 1

CQPRM-07: Scalability, Robustness and Resilience

Chair: Tutomu Murase (NEC Corporation, Japan)

Position based Opportunistic Routing for Robust Data Delivery in MANETs

Shengbo Yang, Feng Zhong, Chai Kiat Yeo, Bu Sung Lee (Nanyang Technological University, Singapore)

Jeff Boleng (United States Air Force Academy, USA)

Erasure Codes with a Banded Structure for Hybrid Iterative-ML Decoding

Alexandre Soro (Institut Supérieur de l'Aéronautique et de l'Espace, France)

Mathieu Cunche (Institut National de Recherche en Informatique et en Automatique, France)

Jerome Lacan (Institut Supérieur de l'Aéronautique et de l'Espace, France)

Vincent Roca (Institut National de Recherche en Informatique et en Automatique, France)

New Error Containment Schemes for H.264 Decoders

Camille Mazataud, Benny Bing (Georgia Institute of Technology, USA)

Minimum Backup Configuration-Creation Method for IP Fast Reroute

Shohei Kamamura, Takashi Miyamura, Cristel Pelsser, Ichiro Inoue, Kohei Shiomoto (NTT, Japan)

IP Fast Reroute for Double-Link Failure Recovery

Kang Xi, H. Jonathan Chao (Polytechnic Institute of New York University, USA)

Optimized Protection Schemes for Resilient Interdomain Traffic Distribution

Miroslaw Kantor, Piotr Cholda, Andrzej Jajszczyk (AGH University of Science and Technology, Poland)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Kahili 2

COPRM-08: Quality and Performance of Networks and Services

Chair: Tetsuya Yokotani (Mitsubishi Electric Corporation, Japan)

Parameter Setting and 2-D Stability Conditions for TCP/RED Networks

Seok Woo, Kiseon Kim (Gwangju Institute of Science and Technology, Korea)

Lei Wang, Yang Xiao (Beijing Jiaotong University, China)

Fair Queueing based Packet Scheduling for Buffered Crossbar Switches

Deng Pan, Kia Makki, Niki Pissinou (Florida International University, USA)

Fair and Efficient Dynamic Traffic Grooming Algorithm for WDM Mesh Networks

Andre Drummond, Nelson L. S. da Fonseca (State University of Campinas, Brazil)

Fast Admission Control for Short TCP Flows

Yingxin Jiang, Aaron Striegel (University of Notre Dame, USA)

Reliable Transmission in Flow-Aware Networks

Jerzy Domzal, Robert Wójcik, Andrzej Jajszczyk (AGH University of Science and Technology in Krakow, Poland)

A Reinforcement Learning-Based Lightpath Establishment for Service Differentiation in All-Optical WDM Networks

Izumi Koyanagi, Takuji Tachibana, Kenji Sugimoto (Nara Institute of Science and Technology, Japan)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Coral Ballroom Lounge

CSS-06: Services and Modelization (Poster)

Chair: Fabrizio Granelli (University of Trento, Italy)

Internet Service Tiering as a Market Segmentation Strategy

Qian Lv, George N. Rouskas (North Carolina State University, USA)

Directory-Hopping based Service Discovery for Dynamic Large-scale Wireless Networks

Sok-Hyong Kim, Joo-Young Baek, Seung-Hoon Lee, Young-Joo Suh (Pohang University of Science and Technology, Korea)

A Situation-Aware Approach for Dealing with Uncertain Context-Aware Paradigm

Xiangtao Lin, Bo Cheng, Junliang Chen (Beijing University of Posts and Telecommunications, Taiwan)

Parameterized Anomaly Detection System with Automatic Configuration

Bruno B. Zarpelão, Leonardo S. Mendes (State University of Campinas, Brazil)

Mario L. Proença (State University of Londrina, Brazil)

Joel J. C. Rodrigues (University of Beira Interior, Portugal)

Communications Enablement of Software-as-a- Service (SaaS) Applications

Feng Liu, Li Li, Wu Chou (Avaya Inc., USA)

A Participation Incentive Market Mechanism for Allocating Heteogeneous Network Services

Juong-Sik Lee (Nokia Research Center, USA)

Boleslaw K. Szymanski (Rensselaer Polytechnic Institute, USA)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Sea Pearl Suite 3-4

CTS-06: Joint Source-Channel Coding and Compressive Sensing

Chair: Daniel J. Costello (University of Notre Dame, USA)

Asymptotically Optimal Joint Source-Channel Coding with Minimal Delay

Marius Kleiner, Bixio Rimoldi (Ecole Polytechnique Federale de Lausanne, Switzerland)

Multi-Functional Compression with Side Information

Soheil Feizi, Muriel Medard (Massachusetts Institute of Technology, USA)

Secure Joint Source-Channel Coding for Quasi-Static Fading Channels

Tony Q. S. Quek (Institute for Infocomm Research, Singapore)

Kiran Thimme Gowda (Institut Eurecom, France)

Hyundong Shin (Kyung Hee University, Korea)

On Reducing the Complexity of Tone-Reservation Based PAPR Reduction Schemes by Compressive Sensing

Eprahim B. Al-Safadi, Tareq Y. Al-Naffouri (King Fahd University of Petroleum & Minerals, Saudi Arabia)

Design and Analysis of Synchronizable Error-Resilient Arithmetic Codes

Hiroyoshi Morita (University of Electro-Communications, Japan)

Ying Zou (Hitachi Software Engineering, Japan)

J. van Wijngaarden (Bell Laboratories, Alcatel-Lucent, USA)

Receiver only Optimized Semi-Hard Decision VQ For Noisy Channels

Thiagarajan Ganesan, Chandra R. Murthy (Indian Institute of Science, India)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Sea Pearl Suite 5-6 CTS-07: Interference Networks

Chair: Aydin Sezgin (University of California Irvine, USA)

Secure Degrees of Freedom for Gaussian Channels with Interference: Structured Codes Outperform Gaussian Signaling

Xiang He, Aylin Yener (Pennsylvania State University, USA)

Degrees of Freedom on the K-User MIMO Interference Channel with Constant Channel Coefficients for Downlink Communications

Namyoon Lee, Dohyung Park, Young-Doo Kim (Samsung Advanced Institute of Technology, Korea)

On the Optimality of Beamforming for Multi-User MISO Interference Channels with Single-User Detection

Xiaohu Shang (Princeton University, USA)

Biao Chen (Syracuse University, USA)

H. Vincent Poor (Princeton University, USA)

Communicating Correlated Gaussian Sources over Gaussian Interference Channels

Wei Liu, Biao Chen (Syracuse University, USA)

A Two-stage Precoding Method based on Interference Alignment for Interference Channel Systems

Hakjea Sung, Seok-Hwan Park, Kyoung-Jae Lee, Inkyu Lee (Korea University, Korea)

How to Position n Transmitter-Receiver Pairs in n-1 Dimensions such that Each Can Use Half of the Channel with Zero Interference from the Others

Rudolf Mathar, Milan Zivkovic (RWTH Aachen, Germany)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Lehua Suite

NGNI-06: Routing & Switching - III

Chair: Yaohui Jin (Shanghai Jiaotong University, China)

Optimization of Multicast log_d (N,m,p) Switching Networks

Grzegorz Danilewicz (Poznan University of Technology, Poland)

Improved Opportunistic Sleeping Algorithms for LAN Switches

Miguel Rodríguez Pérez, Sergio Herrería-Alonso, Manuel Fernández-Veiga, Cándido López-García (University of Vigo, Spain)

A Prefix-Distribution Adaptive Scheme For Routing Lookup Acceleration

Gianni Antichi, Andrea Di Pietro, Domenico Ficara, Stefano Giordano, Gregorio Procissi, Fabio Vitucci (University of Pisa, Italy)

Dynamic Switching Between Adaptive FEC Protocols For Reliable Multi-Source Streaming

Cédric Lamoriniere, Hamid Nafaa, Liam Murphy (University College Dublin, Ireland)

Design of Congestion Control Based on Instantaneous Queue Sizes in the Routers

Wuhua Hu, Gaoxi Xiao (Nanyang Technological University, Singapore)

AnyTraffic Routing Algorithm for Label-based Forwarding

Pedro Pedroso, Oscar Pedrola (Universitat Politècnica de Catalunya, Spain)

Dimitri Papadimitriou (Alcatel-Lucent Bell NV, Belgium)

Miroslaw Klinkowski, Davide Careglio (Universitat Politècnica de Catalunya, Spain)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Iolani Suite 1-2

ONS-06: Switching and Network Access

Chair: George N. Rouskas (North Carolina State University, USA)

Crosstalk-Preventing Scheduling in AWG-Based Cell Switches

Andrea Bianco, David Hay, Fabio Neri (Politecnico di Torino, Italy)

The New Banyan-based Switching Fabric Architecture Composed of Asymmetrical Optical Switching Elements Grzegorz Danilewicz, Wojciech Kabacinski, Remigiusz Rajewski (Poznan University of Technology, Poland)

VLAN-Based Routing Infrastructure for an All-Optical Circuit Switched LAN

Xiaolan Zhang (University of Illinois, Urbana-Champaign, USA)

Rohit Wagle, James Giles (IBM T. J. Watson Research Center, USA)

Grid Reconfigurable Optical-Wireless Architecture for Large Scale Municipal Mesh Access Network

Shing-Wa Wong, Divanilson Campelo (Stanford University, USA)

Ning Cheng (Huawei Technology, USA)

She-Hwa Yen, Leonid Kazovsky, Hyunok Lee, Donald Cox (Stanford University, USA)

Fiber-Wireless (FiWi) Networks: A Comparative Techno-Economic Analysis of EPON and WiMAX

Navid Ghazisaidi, Martin Maier (Institut National de la Recherche Scientifique, Canada)

An Optical Access Network System Without a Power Supply Using Blind Speech Separation and a Loopback Technique

Takayoshi Tashiro, Shoko Araki, Yasuhiko Nakanishi, Hideaki Kimura, Kiyomi Kumozaki, Masato Miyoshi (NTT, Japan)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Sea Pearl Suite 1-2

SAC(CRN)-06: MAC/Routing in Cognitive Radio Networks

Chair: Prathima Agrawal (Auburn University, USA)

Time Synchronization of Cognitive Radio Networks

Jari Nieminen (Helsinki University of Technology, Finland)

Lijun Qian (Prairie View A&M University, USA)

Riku Jantti (Helsinki University of Technology, Finland)

Optimal Route Selection and Resource Allocation in Multi-Hop Cognitive Radio Networks

Qianxi Lu, Tao Peng, Wei Wang, Wenbo Wang, Chao Hu (Beijing University of Posts and Telecommunications, China)

A Probabilistic Approach to Identifying the Number of Frequency Hoppers for Spectrum Sensing

Yuxing Han, Shaunak Joshi (University of California, Los Angeles, USA)

Lillian Dai (Cisco, USA)

Danijela Cabric (University of California, Los Angeles, USA)

Sateesh Addepalli (Cisco, USA)

Jiangtao Wen (Tsinghua University, China)

John Villasenor (University of California, Los Angeles, USA)

Simple and Efficient MAC for Cognitive Wireless Personal Area Networks

Jelena Misic, Vojislav Misic (Ryerson University, Canada)

Spectrum-Aware Routing Protocol for Cognitive Ad-Hoc Networks

Suyang Ju, Joseph B. Evans (University of Kansas, USA)

Medium Access Control Signaling for Reliable Spectrum Agile Radios

Ehsan Azarnasab, Rong-Rong Chen (University of Utah, USA)

Koon Hoo Teo, Zhifeng Tao (Mitsubishi Electric Research Laboratories, USA)

Behrouz Farhang-Boroujeny (University of Utah, USA)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Honolulu Suite #3

SAC(ET)-01: Ethernet PON and Wireless Access Networks

Chair: Marco Chiani (University of Bologna, Italy)

A Nonlinear-Predictive QoS-Promoted Dynamic Bandwidth Allocation Scheme for Triple-play Services in Ethernet Passive Optical Networks

Jan-Wen Peng (Chunghwa Telecom Laboratories, Taiwan)

Chung-Ju Chang, Po-Ling Tien (National Chiao Tung University, Taiwan)

Sleep and Adaptive Link Rate Control for Power Saving in 10G-EPON Systems

Ryogo Kubo, Jun-ichi Kani, Yukihiro Fujimoto, Naoto Yoshimoto, Kiyomi Kumozaki (NTT, Japan)

MPCP Assisted Power Control and Performance of Cell Breathing in Integrated EPON-WiMAX Network

Shing-Wa Wong (Stanford University, USA)

Ying Yan (Technical University of Denmark, USA)

Leonid Kazovsky (Stanford University, USA)

Lars Dittmann (Technical University of Denmark, Denmark)

Integrated Approach to Proportional-fair Resource Allocation for Multiclass Services in an OFDMA System

Nararat Ruangchaijatupon (The Graduate University for Advanced Studies, Japan)

Yusheng Ji (National Institute of Informatics, Japan)

Scalable Peer-to-Peer Video Streaming in WiMAX Networks

Muhammad Aman, Biplab Sikdar (Rensselaer Polytechnic Institute, USA)

Shyam Parekh (Alcatel-Lucent, USA)

Scalable Video Multicast on Broadcast Channels

Jun Xu (Shanghai Jiao Tong University, China)

Raju Hormis (Analog Devices, USA)

Xiaodong Wang (Columbia University, USA)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Iolani Suite 3-4

SPC-06: OFDM and Multi-carrier Systems 2

Chair: Hai Lin (Osaka Prefecture University, Japan), Hsiao-Chun Wu (Louisiana State University, USA)

Dual Transform Domain Echo Canceller for Discrete Multitone Systems

Neda Ehtiati, Benoit Champagne (McGill University, Canada)

Efficient Pilot-Aided Digital Baseband Compensation of Phase Noise ICI in OFDM Receivers

Payam Rabiei, Won Namgoong, Naofal Al-Dhahir (University of Texas at Dallas, USA)

Compensation of the Impact of Interference Mitigation by Pulse Blanking in OFDM Systems

Sinja Brandes, Ulrich Epple, Michael Schnell (German Aerospace Center, Germany)

IBI Cancellation Based on Limited Channel Feedback for OFDM Systems over Channels with Large Delay Spreads

Xia Wang (Xi'an Jiaotong University, China)

Geoffrey Ye Li (Georgia Institute of Technology, USA)

Hongjie Hu, Long Qin, Anthony Soong (Huawei Technologies, USA)

Intercarrier Interference Immune Single Carrier OFDM via Magnitude Shift Keying Modulation

Xue Li, Ruolin Zhou (Wright State University, USA)

Vasu Chakravarthy (Air Force Research Laboratory, USA)

Zhiqiang Wu (Wright State University, USA)

Construction of M-QAM Sequences Based on Generalized Rudin-Shapiro Polynomials

Yajun Wang, Wen Chen, Wei Chen (Shanghai Jiaotong University, China)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Coral Ballroom Lounge

SPC-13: Topics in Signal Processing for Communications 1 (Poster)

Chair: John Thompson (University of Edinburgh, UK), Hung Nguyen (Aerospace Corporation, USA)

A Subspace Method for the Blind Identification of Multiple Time-Varying FIR Channels

Benoit Champagne, Amr El-Keyi, Chao-Cheng Tu (McGill University, Canada)

Cramér-Rao Bound for NDA DOA Estimates of Square QAM-Modulated Signals.

Faouzi Bellili, Sonia Ben Hassen, Sofiene Affes, Alex Stephenne (Institut National de la Recherche Scientifique, Canada)

Multiple Target Localization Using Compressive Sensing

Chen Feng, Shahrokh Valaee (University of Toronto, Canada)

Zhenhui Tan (Beijing Jiaotong University, China)

Channel Orthogonalizing Precoder for Open-loop QO-STBC Systems

Heejin Kim (Korea University, Korea)

Heunchul Lee (Stanford University, USA)

Inkyu Lee (Korea University, Korea)

A Convex Optimization Approach to Blind Channel Shortening in Multicarrier Modulations

Huy-Dung Han, Zhi Ding (University of California at Davis, USA)

Iterative Interference Cancellation for STBC-OFDM Systems in Fast Fading Channels

Ci-Ye Tso, Jen-Ming Wu (National Tsing Hua University, Taiwan)

Pang-An Ting (Industrial Technology Research Institute, Taiwan)

Wednesday, 2 December 2009

16:30 - 18:30

Location: S. Pacific Ballroom #1

WCS-21: Cooperative Communication: Power and Resource Allocation

Chair: Yonghui Li (University of Sydney, Australia)

Distributed Relay-Source Assignment for Cooperative Wireless Networks Using Two-sided Market Games

Dapeng Li, Jing Liu, Youyun Xu, Xinbing Wang, Wen Chen (Shanghai Jiaotong University, China)

On the Optimal Power Control of Parallel OFDM Relaying Networks

Yingnan Zhang, Qiao Wang (Southeast University, China)

Relaying Power Allocation with User-Cooperation for OFDM-based MISO Broadcast Channels

Hyukjoon Kwon, Hui Won Je, John M. Cioffi (Stanford University, USA)

Joint Optimization of Power Allocation and Relay Location for Decode-and-Forward Dual-Hop Systems over Nakagami-m Fading Channels

Salama S. Ikki, Murat Uysal (University of Waterloo, Canada)

Mohamed H. Ahmed (Memorial University, Canada)

Power and Location Optimization for Decode-and-forward Opportunistic Cooperative Networks

Changqing Yang, Wenbo Wang, Shuang Zhao, Mugen Peng (Beijing University of Posts & Telecommunications, China)

Joint Source Power Scheduling and Distributed Relay Beamforming in Multiuser Cooperative Wireless Networks Xin Li, Yimin Zhang, Moeness G. Amin (Villanova University, USA)

Wednesday, 2 December 2009

16:30 - 18:30

Location: S. Pacific Ballroom #2

WCS-22: UWB

Chair: Lutz Lampe (University of British Columbia, Canada)

Performance Analysis of a Multiband OFDM UWB System in the Presence of Narrowband Interference

Francisco C. B. F. Muller, Aldebaro Klautau (Universidade Federal do Para, Brazil) Claudio R. C. da Silva (Virginia Polytechnic Institute and State University, USA)

An Ultra-Wideband Impulse-Radio Communication Method and Transceiver

Emil Novakov, Jean-Michel Fournier (Institut de Microélectronique, Electromagnétisme et Photonique, France)

Compressed Sensing Reception of Bursty UWB Impulse Radio is Robust to Narrow-band Interference

Anand Oka, Lutz Lampe (University of British Columbia, Canada)

Effects of Time Variant Channel on a Time Reversal UWB System

Ijaz Haider Naqvi, Philippe Besnier, Ghaïs El Zein (Institute of Electronics and Telecommunications of Rennes, France)

On the Use of Multipath Geometry for Wideband Cooperative Localization

Yuan Shen, Moe Z. Win (Massachusetts Institute of Technology, USA)

Nonparametric Obstruction Detection for UWB Localization

Stefano Maranò (ETH Zurich, Switzerland)

Wesley M. Gifford, Henk Wymeersch, Moe Z. Win (Massachusetts Institute of Technology, USA)

Wednesday, 2 December 2009

16:30 - 18:30

Location: S. Pacific Ballroom #3

WCS-23: Fading Channels

Chair: Youjian (Eugene) Liu (University of Colorado at Boulder, USA)

On the Use of High-Order Moment Matching to Approximate the Generalized-K Distribution by a Gamma Distribution

Saad Al-Ahmadi, Halim Yanikomeroglu (Carleton University, Canada)

Numerical Computation of the Lognormal Sum Distribution

Damith Senaratne, Chintha Tellambura (University of Alberta, Canada)

Fitting the Modified-Power-Lognormal to the Sum of Independent Lognormals Distribution

Sebastian S. Szyszkowicz, Halim Yanikomeroglu (Carleton University, Canada)

Carrier to Interference Ratio Analysis for the Shotgun Cellular System

Prasanna Madhusudhanan, Juan R. Restrepo, Youjian (Eugene) Liu, Timothy X. Brown (University of Colorado, USA)

The $\eta - \lambda - \mu$: A General Fading Distribution

Anastasios K. Papazafeiropoulos, Stavros K. Kotsopoulos (University of Patras, Greece)

Constellation Subset Selection: Theories and Algorithms

Hsiao-Chun Wu (Louisiana State University, USA)

Shih Yu Chang (National Tsing Hua University of Taiwan, Taiwan)

Wednesday, 2 December 2009

16:30 - 18:30

Location: S. Pacific Ballroom #4

WCS-24: Localization

Chair: Michael Buehrer (Virginia Tech, USA)

Received Signal Strength-Based Wireless Localization via Semidefinite Programming

Robin Wentao Ouyang, Albert Kai-Sun Wong, Chin Tau Lea, Victoria Ying Zhang (The Hong Kong University of Science and Technology, Hong Kong)

Location Estimation Using Differential RSS with Spatially Correlated Shadowing

Jeong Heon Lee, R. Michael Buehrer (Virginia Polytechnic Institute and State University, USA)

Constrained Weighted Least Square Optimization for Vehicle Position Tracking

Lubna Farhi, Lian Zhao, Zaiyi Liao (Ryerson University, Canada)

Localization using Radial Basis Function Networks and Signal Strength Fingerprints in WLAN

Christos Laoudias (University of Cyprus, Cyprus)

Paul Kemppi (VTT Technical Research Centre of Finland, Finland)

Christos G. Panayiotou (University of Cyprus, Cyprus)

Data-Aided Location Estimation in Cellular OFDM Communications Systems

Christian Mensing, Stephan Sand, Armin Dammann (German Aerospace Center, Germany)

Wolfgang Utschick (Munich University of Technology, Germany)

AECID Fingerprinting Positioning Performance

Liang Shi (Ericsson (China) Communication Company Ltd., China)

Torbjörn Wigren (Uppsala University, Sweden)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Coral Ballroom Lounge

WCS-42: Topics in Cooperative Communication (Poster)

Chair: Tomoaki Ohtsuke (Keio University, Japan)

Signal Transmission with Unequal Error Protection in Wireless Relay Networks

Ha X. Nguyen, Ha H. Nguyen (University of Saskatchewan, Canada)

Tho Le-Ngoc (McGill University, Canada)

Capacity Performance of Amplify-and-Forward MIMO Relay with Transmit Antenna Selection and Maximal-Ratio Combining

Shuping Chen, Wenbo Wang, Xing Zhang, Mugen Peng (Beijing University of Posts Telecommunications, China) Dong Zhao (Nokia Siemens Networks, China)

Multiple Repeater Placement for Assisting Long-Range LOS MIMO Links

Brett T. Walkenhorst, Mary Ann Ingram (Georgia Institute of Technology, USA)

Cooperative Diversity Can Mitigate Keyhole Effects in Wireless MIMO Systems

Oussama Souihli, Tomoaki Ohtsuki (Keio University, Japan)

Joint Power and Channel Resource Allocation for F/TDMA Decode and Forward Relay Networks

Yin Sun, Yuanzhang Xiao, Ming Zhao, Xiaofeng Zhong, Shidong Zhou (Tsinghua University, China) Ness B. Shroff (Ohio State University, USA)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Coral Ballroom #1

WNS-11: Game Theory in Wireless Networks

Chair: Floriano De Rango (University of Calabria, Italy)

An Interference Minimization Game Theoretic Subcarrier Allocation Algorithm for OFDMA-based Distributed Systems

Quang Duy La (Nanyang Technological University, Singapore)

Yong Huat Chew (Institute for Infocomm Research, Singapore)

Boon Hee Soong (Nanyang Technological University, Singapore)

QoS-Driven Power-Allocation Game Over Fading Multiple-Access Channels

Qinghe Du, Xi Zhang (Texas A&M University, USA)

Radio-Aware Scheduler for WiMAX Systems based on Time-Utility Function and Game Theory

Rosario G. Garroppo, Stefano Giordano, Davide Iacono (University of Pisa, Italy)

Mitigating Self-interference among IEEE 802.22 Networks: A Game Theoretic Perspective

Swastik Brahma, Mainak Chatterjee (University of Central Florida, USA)

Resource Pricing with Primary Service Guarantee in Cognitive Radio Networks: A Stackelberg Game Approach

Yun Li, Xinbing Wang (Shanghai Jiaotong University, China)

Mohsen Guizani (Western Michigan University, USA)

Revenue Maximizing Game and its Extention for Multicell Wireless Access Networks

Seowoo Jang, Sung-Guk Yoon, Saewoong Bahk (Seoul National University, Korea)

Wednesday, 2 December 2009

16:30 - 18:30

Location: Coral Ballroom #2 WNS-12: UMTS and LTE

Chair: Youngchul Sung (KAIST, Korea), Mohamed M. Abd-El Aziz Moustafa (Akhbar El Yom Academy, Egypt)

Erlang Capacity of UMTS Using Perceptual-based Power Control: An Analytical Framework

Behrooz Rohani (Serck Controls Pty Ltd., Australia)

Hans-Juergen Zepernick (Blekinge Institute of Technology, Sweden)

Mobility and Capacity Offload for 3G UMTS Femtocells

Farhad Meshkati, Yi Jiang, Lenny Grokop, Sumeeth Nagaraja, Mehmet Yavuz, Sanjiv Nanda (Qualcomm, Inc, USA)

Modelling of the WCDMA Interface in the UMTS Network with Soft Handoff Mechanism

Maciej Stasiak, Piotr Zwierzykowski, Damian Parniewicz (Poznan University of Technology, Poland)

Hybrid Spectrum Usage for Overlaying LTE Macrocell and Femtocell

Yong Bai, Juejia Zhou, Lan Chen (DOCOMO Beijing Communications Laboratories Co. Ltd., China)

3GPP LTE Downlink System Performance

Amir Farajidana, Wanshi Chen, Aleksandar Damnjanovic, Taesang Yoo, Durga Malladi, Christopher Lott (Qualcomm, Inc., USA)

Cooperation-Multiuser Diversity Tradeoff in Wireless Cellular Networks

Zheng Wang, Mingyue Ji, Hamid R. Sadjadpour, Jose Joaquin Garcia-Luna-Aceves (University of California at Santa Cruz, USA)