

INFOCOM 2017
Demos and Poster Sessions

Tuesday, 2 May 2017

15:30 – 17:30 • Georgia Prefunction

Demo Session 1

Chairs: **Bechir Hamdaoui** (Oregon State University, USA) and **Dario Pompili** (Rutgers University, USA)

RPiaaS: A Raspberry Pi Testbed for Validation of Cloud Resource Management Strategies

Pieter-Jan Maenhaut (Ghent University, Belgium)

Veerle Ongenae (Ghent University, Belgium)

Bruno Volckaert (Ghent University, Belgium)

Filip De Turck (Ghent University, Belgium)

Cross-Technology TDMA Synchronization Using Energy Pattern Beacons

Jan Bauwens (Ghent University, Belgium)

Bart Jooris (Ghent University, Belgium)

Peter Ruckebusch (Ghent University, Belgium)

Domenico Garlisi (Ghent University, Belgium)

Joséph Szurley (Ghent University, Belgium)

Marc Moonen (Ghent University, Belgium)

Spilios Giannoulis (Ghent University, Belgium)

Ingrid Moerman (Ghent University, Belgium)

Eli De Poorter (Ghent University, Belgium)

Assessing the Impact of Fog and Cloud Computing on an IoT Service Running over an Optical/Wireless Network- An Experimental Approach

Aloizio P. Silva (Federal University of Minas Gerais, Brazil)

Bernardo A. Abreu (Federal University of Minas Gerais, Brazil)

Erik de Britto e Silva (Federal University of Minas Gerais, Brazil)

Marcos Carvalho (Federal University of Minas Gerais, Brazil)

Matheus Nunes (Federal University of Minas Gerais, Brazil)

Marcelo Marotta (Federal University of Rio Grande do Sul, Brazil)

Ali Hammad (University of Bristol, UK)

Carlos F. M. Silva (Federal University of Ceara, Brazil)

Joao F. N. Pinheiro (Federal University of Ceara, Brazil)

Cristiano B. Both (Federal University of Rio Grande do Sul, Brazil)

Johann M. Marquez-Barja (CONNECT Centre for Future Networks and Communications, Ireland)

Luiz A. DaSilva (CONNECT Centre for Future Networks and Communications, Ireland)

PopperCI: Automated Reproducibility Validation

Ivo Jimenez (UC Santa Cruz, USA)

Sina Hamedian (UC Santa Cruz, USA)

Jay Lofstead (Sandia National Laboratories, USA)

Carlos Maltzahn (UC Santa Cruz, USA)
Kathryn Mohror (Lawrence Livermore National Laboratory, USA)
Remzi Arpaci-Dusseau (University of Wisconsin, USA)
Andrea Arpaci-Dusseau (University of Wisconsin, USA)
Robert Ricci (University of Utah, USA)

Enabling High-Throughput Big Data Transfers Across Campus Networks

Sergio Rivera (University of Kentucky, USA)
Jacob Chappell (University of Kentucky, USA)
Mami Hayashida (University of Kentucky, USA)
Andrew Groenewold (University of Kentucky, USA)
Peter Oostema (University of Kentucky, USA)
Caleb Voss (University of Kentucky, USA)
Hussamuddin Nasir (University of Kentucky, USA)
Charles Carpenter (University of Kentucky, USA)
Yongwook Song (University of Kentucky, USA)
Zongming Fei, (University of Kentucky, USA)
James Griffioen (University of Kentucky, USA)

Rapid Development of IoT Applications with TinyLink

Gaoyang Guan (Zhejiang University, China)
Kaibo Fu (Zhejiang University, China)
Zhihao Cheng (Zhejiang University, China)
Yi Gao (Zhejiang University, China)
Wei Dong (Zhejiang University, China)

Telco Localization Techniques

Peng Zhao (Tongji University, China)
Chenxi Zhang (Tongji University, China)
Yukun Huang (Tongji University, China)
Weixiong Rao (Tongji University, China)
Fangzhou Zhu (Huawei Noah's Ark Lab, Hong Kong)
Ning Liu (Huawei Noah's Ark Lab, Hong Kong)
Jie Geng (Huawei Noah's Ark Lab, Hong Kong)
Mingxuan Yuan (Huawei Noah's Ark Lab, Hong Kong)
Jia Zeng (Huawei Noah's Ark Lab, Hong Kong)

CDMA-based IoT Services with Shared Band Operation of LTE in 5G

Siddarth Mathur (Rutgers University, USA)
Shweta S. Sagari (Huawei Research Center, USA)
Syed Obaid Amin (Huawei Research Center, USA)
Ravishankar Ravindran (Huawei Research Center, USA)
Dola Saha (University at Albany, USA)
Ivan Seskar (Rutgers University, USA)
Dipankar Raychaudhuri (Rutgers University, USA)
Guoqiang Wang (Huawei Research Center, USA)

HyDRA: A Hypervisor for Software Defined Radios to Enable Radio Virtualization in Mobile Networks

Maicon Kist (Federal University of Rio Grande do Sul, Brazil)

Juergen Rochol (Federal University of Rio Grande do Sul, Brazil)

Luiz A. DaSilva (Trinity College Dublin, Ireland)

Cristiano Bonato Both (Federal University of Health Sciences of Porto Alegre, Brazil)

Prototyping M2I Communication System for Underground and Underwater Networks

Hongzhi Guo (State University of New York at Buffalo, USA)

Zhi Sun (State University of New York at Buffalo, USA)

An Integrated Tool of Applying Stochastic Network Calculus for Network Performance Analysis

Michael A. Beck (City University of Hong Kong, Hong Kong)

Sebastian Henningsen (Humboldt University of Berlin, Germany)

Qian Xu (University of Victoria, Canada)

Jianping Wang (City University of Hong Kong, Hong Kong)

Kui Wu (City University of Hong Kong, Hong Kong)

Xian Liu (Huawei Technologies Ltd. Co., USA)

An Open Source Toolchain for Planning and Visualizing Highly Directional mm-Wave Cellular Networks in the 5G Era

Ljiljana Simic (RWTH Aachen University, Germany)

Janne Riihijarvi (RWTH Aachen University, Germany)

Amulya Venkatesh (RWTH Aachen University, Germany)

Petri Mahonen (RWTH Aachen University, Germany)

An Intent Solver for Enabling Intent-based SDN

Haodi Zhang (Hong Kong University of Science and Technology, Hong Kong)

Yu Wang (Hong Kong University of Science and Technology, Hong Kong)

Xiangtong Qi (Hong Kong University of Science and Technology, Hong Kong)

Weiping Xu (Huawei Technologies Co., Ltd., China)

Tao Peng (Huawei Technologies Co., Ltd., China)

Shucheng Liu (Huawei Technologies Co., Ltd., China)

Wednesday, 3 May 2017

10:00 – 12:00 • Georgia Prefunction

Demo Session 2

Full-Duplex with a Compact Frequency Domain Equalization-based RF Cancellor

Tingjun Chen (Columbia University, USA)

Jin Zhou (University of Illinois at Urbana-Champaign, USA)

Mahmood Baraani Dastjerdi (Columbia University, USA)

Jelena Diakonikolas (Boston University, USA)

Harish Krishnaswamy (Columbia University, USA)

Gil Zussman (Columbia University, USA)

Evaluating Video Delivery over Wireless Multicast

Varun Gupta (Columbia University, USA)
Andy Lianghua Xu (Columbia University, USA)
Bohan Wu (Duke University, USA)
Craig Gutterman (Columbia University, USA)
Yigal Bejerano (Columbia University, USA)
Gil Zussman (Columbia University, USA)
Stemflow: Inter-Datacenter Overlay as a Service
Shuhao Liu (University of Toronto, Canada)
Baochun Li (University of Toronto, Canada)

A Research Platform for Real-World Evaluation of Routing Schemes in Delay Tolerant Social Networks

Corey E. Baker (University of California, San Diego, USA)
Allen Starke (University of Florida, USA)
Shitong Xing (University of California, San Diego, USA)
Janise McNair (University of Florida, USA)

Clock Syntonization Using CFO Information in Wireless Sensor Networks

Baofeng Zhou (University of Nebraska-Lincoln, USA)
Fujian Guo (University of Nebraska-Lincoln, USA)
Mehmet C. Vuran (University of Nebraska-Lincoln, USA)

An Ultrasonic Intra Body Area Network for Ehealth Applications

Laura Galluccio (University of Catania, Italy)
Sebastiano Milardo (University of Catania/University of Palermo, Italy)
Elisabetta Sciacca (University of Catania, Italy)

Sender-Triggered Selective Wake-Up Receiver for Low-Power Sensor Networks

Johannes Blobel (Paderborn University, Germany)
Falko Dressler (Paderborn University, Germany)

MExR: Mobile Edge Resource Management for Mixed Reality Applications

Qiang Liu (University of North Carolina, USA)
Siqi Huang (University of North Carolina, USA)
Yang Deng (University of North Carolina, USA)
Tao Han (University of North Carolina, USA)

Context-Aware Adaptive Video Streaming for Mobile Users

Sami Mekki (Huawei Technologies, France)
Theodoros Karagioules (Huawei Technologies, France)
Stefan Valentin (Huawei Technologies, France)

Automated Offloading of Android Applications for Computation/Energy Optimizations

Alessandro Zanni (University of Bologna, Italy)

Se-young Yu (UPMC Univ Paris 06, France)

Stefano Secci (UPMC Univ Paris 06, France)

Rami Langar (University Paris Est Marne-la-Vallee, France)

Paolo Bellavista (University of Bologna, Italy)

Daniel F. Macedo (Universidade Federal de Minas Gerais, Brazil)

An Experimentation Facility Enabling Flexible Network Control for the Internet of Things

George Violettas (University of Macedonia, Greece)

Tryfon Theodorou (University of Macedonia, Greece)

Sophia Petridou (University of Macedonia, Greece)

Antonios Tsioukas (University of Macedonia, Greece)

Lefteris Mamas (University of Macedonia, Greece)

Alzimio: A mobile App with Geofencing, Activity-recognition and Safety Features for Dementia Patients

Jad Helmy (University of Florida, USA)

Ahmed Helmy (University of Florida, USA)

Thursday, 4 May 2017

10:00 – 12:00 • Georgia Prefunction

Poster Session

Chairs: Bechir Hamdaoui (Oregon State University, USA) and **Dario Pompili** (Rutgers University, USA)

Lightweight Flow Management for Software-defined Wireless Sensor Networks with Link Fault in Data Plane

Mithun Mukherjee (Guangdong University of Petrochemical Technology, China)

Lei Shu (Guangdong University of Petrochemical Technology, China and University of Lincoln, UK)

Teng Zhaoz (Wuhan Institute of Technology, China and Guangdong University of Petrochemical Technology, China)

Di Wang (Guangdong University of Petrochemical Technology, China)

Haihui Wangz (Wuhan Institute of Technology, China)

MicroBrain: Compressing Deep Neural Networks for Energy-efficient Visual Inference Service

Shiming Ge (University of Chinese Academy of Sciences, China)

Zhao Luo (University of Chinese Academy of Sciences, China)

Qiting Ye (University of Chinese Academy of Sciences, China)

Xiao-Yu Zhang (University of Chinese Academy of Sciences, China)

Feasibility of Floating Content in VANETs

Gaetano Manzo (University of Bern & HES-SO Valais, Switzerland)

Gianluca Antonio Rizzo (HES-SO Valais, Switzerland)

A Trust Evaluation Framework Using in a Vehicular Social Environment

Xiao Chen (Jiangsu University, China)
Liangmin Wang Chen (Jiangsu University, China)

A Synchronized Wireless Sensor Network for Monitoring the Structural Health

Deepa Phanish (Georgia Institute of Technology, USA)
Randal Abler (Georgia Institute of Technology, USA)
Edward J. Coyley (Georgia Institute of Technology, USA)

A Fog Computing-based Framework to Reduce Traffic Overhead in Large-scale Industrial Applications

Mithun Mukherjee (Guangdong University of Petrochemical Technology, China)
Lei Shu (Guangdong University of Petrochemical Technology, China and University of Lincoln, UK)
Di Wang (Guangdong University of Petrochemical Technology, China)
Kailiang Li (Guangdong University of Petrochemical Technology, China)
Yu Chenz (Guangdong University of Petrochemical Technology, China)

Traffic Flow Prediction with Big Data: A Deep Learning based Time Series Model

Yuanfang Chenyx (Guangdong University of Petrochemical Technology, China and Universite' Pierre et Marie CURIE, France)
Lei Shuyz (Guangdong University of Petrochemical Technology, China and Dalian University of Technology, China)
Lei Wang (Dalian University of Technology, China)

A Sliding Counting Bloom Filter

Ran Ben Basat (Technion, Israel)
Gil Einziger (Nokia Bell Labs)
Roy Friedman (Technion, Israel)
Yaron Kassner (Technion, Israel)

Local Voting: Optimal Distributed Node Scheduling Algorithm for Multihop Wireless Networks

Dimitrios J. Vergados (National Technical University of Athens, Greece)
Natalia Amelinay (Saint-Petersburg State University, Russia)
Yuming Jiangz (Norwegian University of Science and Technology, Norway)
Katina Krlevskaz (Norwegian University of Science and Technology, Norway)
Oleg Granichiny (Saint-Petersburg State University, Russia)

Lancet: Extracting Forwarding Models from NF Programs

Wenfei Wu (Tsinghua University, China)
Ying Zhang (Hewlett Packard Labs)

Streamlined Anomaly Detection in Web Requests Using Recurrent Neural Networks

Arne Bochém (University of Goettingen, Germany)
Hang Zhang (University of Goettingen, Germany)
Dieter Hogrefe (University of Goettingen, Germany)

Resource Allocation with Service Availability & QoS Constraints in Mobile Fog Networks

Nader Daneshfar (Linköping University, Sweden)
Nikolaos Pappas (Linköping University, Sweden)
Vangelis Angelakis (Linköping University, Sweden)

SDN-based Handover Management in Enterprise Networked Femtocells with X2-Forwarding Scheme

Tewelde Degefa Assefa (Foundation for Research and Technology Hellas (ICS-FORTH), Greece)

Rashedul Hoque (Cyprus Telecommunications Authority (CYTA-Hellas), Greece)

Elias Tragos (Foundation for Research and Technology Hellas (ICS-FORTH), Greece)

Xenofontas Dimitropoulos (Foundation for Research and Technology Hellas (ICS-FORTH), Greece and University of Crete, Greece)

TAMOR a Thermal-Aware Multihop Routing Protocol for Ultrasonic Intra Body Area Networks

Laura Galluccio (University of Catania, Italy)

Sebastiano Milardo (University of Catania, Italy and University of Palermo, Italy)

Elisabetta Sciacca (University of Catania, Italy)

En Route Towards Trace-based Simulation of Vehicular Mobility

Roozbeh Ketabi (University of Florida, USA)

Babak Alipour (University of Florida, USA)

Ahmed Helmy (University of Florida, USA)

Location-Centric Relationship Graph for Indoor Mobility Using WLANs

Mimonah Al Qathrady (University of Florida, USA)

Ahmed Helmy (University of Florida, USA)