

Technical program

08:45 – 09:00 Welcome speech

Speaker: Mario Di Francesco

09:00 – 10:00 Keynote speech

> What is 5G? The Nokia vision

Kimmo Kittunen (*Nokia Solutions and Networks*)

10:00 – 10:15 Short break

10:15 – 11:30 Session 1: Best papers

> How dense are cell towers? An experimental study of cell tower deployment

Ashok Rajendran (Tutor: Zhonghong Ou)

> Multimedia Streaming over Cognitive Radios

Pranvera Kortoçi (Tutor: Mario Di Francesco)

> MOOCs and Authentication

Jan Pennekamp (Tutor: Sanna Suoranta)

11:30 – 12:30 Lunch

Lunch will be served in hall 2 (first floor)

12:30 – 14:00 Session 2A: Localization and mobile devices

> Survey on indoor localization methods using radio fingerprint-based techniques

Christian Cardin (Tutor: Jiang Dong)

> User trajectory recognition in an indoor environment

Sami Karvonen (Tutor: Jiang Dong)

> A survey on performance of SfM and RGB-D based 3D indoor mapping

Junyang Shi (Tutor: Jiang Dong)

> Review of energy profiling methods for mobile devices

Antti-Iivari Kainulainen (Tutor: Dung Vu Ba Tien)

12:30 – 14:00 Session 2B: Security in technologies and services

> Survey of ARM TrustZone applications

Pawel Sarbinowski (Tutor: Thomas Nyman)

> Secure Public Instant Messaging: A survey

Dawin Schmidt (Tutor: Sandeep Tamrakar)

> Something you need to know about Bluetooth smart

Rui Yang (Tutor: Çağatay Ulusoy)

> A survey of password managers

Can Zhu (Tutor: Sanna Suoranta)

14:00 – 14:15 Short break

14:15 – 15:45 Session 3A: the Internet of Everything

- > **Software technology challenges in 3D printing**
Ari Oinonen (Tutor: Jukka K. Nurminen)
- > **A survey on communication protocols and standards for the IoT**
Gayathri Srinivaasan (Tutor: Manik Madhikermi)
- > **IPv6 over networks of resource-constrained nodes**
Lauri Luotola (Tutor: Yang Deng)
- > **Bacteria Nanonetworks**
Erik Berdonces Bonelo (Tutor: Mario Di Francesco)

14:15 – 15:45 Session 3B: Biometrics, reputation and policies

- > **Biometric Identification Methods**
Juho Saarela (Tutor: Sanna Suoranta)
- > **User Authentication or Identification Through Heartbeat Sensing**
Sowmya Ravidas (Tutor: Otto Huhta)
- > **Website reputation and classification systems**
Sridhar Sundarraman (Tutor: Otto Huhta)
- > **Security-Enhanced Linux policy analysis techniques**
Filippo Bonazzi (Tutor: Thomas Nyman)

15:45 – 16:15 Coffee break**16:15 – 18:00 Session 4A: Smart energy and cloud**

- > **New applications to reduce energy consumption of cellular network using Smart Grid**
Toni Mustajärvi (Tutor: Jukka K. Nurminen)
- > **Virtual Machine Consolidation with Multi-Resource Usage Prediction**
Kimmerlin Maël (Tutor: Nguyen Trung Hieu)
- > **A Survey on Performance of Scalable Video Coding Compared to Non-Scalable Video Coding**
Martijn Roo (Tutor: Matti Siekkinen)
- > **More ICT to Make Households More Green**
Hylke Visser (Tutor: Sanja Šćepanović)
- > **Software market of network functions virtualization**
Aarno Vuori (Tutor: Sakari Luukkainen)

16:15 – 18:00 Session 4B: Big data and applications

- > **Design trade-offs for building a real-time Big Data system based on Lambda architecture**
Hussnain Ahmed (Tutor: Keijo Heljanko)
- > **Cloud datastores: NewSQL solutions**
Dmytro Arbuzin (Tutor: Keijo Heljanko)
- > **Big Data Platforms Supporting SQL**
Markku Hinkka (Tutor: Keijo Heljanko)

> **Security and privacy in smart energy communities**

Kari Niiranen (Tutor: Sanja Šćepanović)

> **Delay-sensitive cloud computing and edge computing for road-safety systems**

Jan van de Kerkhof (Tutor: Mehrdad Bagheri Majdabadi)

18:00 – 18:15 Short break

18:15 – 18:30 Concluding remarks