CPS&IoT'2025 Summer School on
Cyber-Physical Systems and Internet-of-Things
Budva, Montenegro, June 10-14, 2025

Schedule

Day 1, Tuesday 10 June:
09:00-09:15 Event Chairs and Special Guests
Title: Opening Ceremony of the CPS&IoT'2025 Summer School, and MECO'2025 and CPS&IoT'2025 Conferences
09:15-10:15 Wolfgang Ecker, Infineon and TU Munich, DE
Keynote: **How to Circumvent a RISCV Dead End**
10.15-10.30 Break
10.30-11.00 Lech Jóźwiak, TU/e, NL and Radovan Stojanović, University of Montenegro, ME
Title: Introduction to the CPS&IoT'2025 Summer School
11.00-13.00 Lech Jóźwiak, TU/e, NL
Title: Green CPS and IoT for Green World
13.00-14.00 Lunch Break
14.00-15.30 Said Hamdioui, TU Delft, NL
Title: The Future of Energy-Efficient Computing: Beyond CMOS and Von Neumann
15.30-17.00 Natalie Simson & Wolfgang Ecker, DE
Title: RISCV vs. ARM
17.00-17.30 Break
17.30-19.00 Natalie Simson & Wolfgang Ecker, DE
Title: RISCV vs. ARM
21.00 Gala Dinner
Day 2, Wednesday 11 June:
09.00-10.00 Reiner John, AVL, AT
Title: Keynote: **AI+ — Self-Awareness as the Key to Resilience, Efficiency, and ROI**
10.00-10.30 Break
10.30-12.00 Reiner John, AVL, AT
Title: Applications of Quantum Sensing and AI in Real-Time Edge Computing Systems (lecture/hands-on)
12.00-13.00 Lunch Break
13.00-16.00 Nabil Abdennadher, Univ. of Applied Sciences, West. Switzerland, CH
Title: Towards a decentralized Federated Learning based edge-to-edge Continuum Computing Framework
16.00-16.30 Break
16.30-18.00 Iryna DE ALBUQUERQUE SILVA, CEA, FR
Title: Aidge: Embedded AI Open Source Platform
Day 3, Thursday 12 June:
09.00-10.15 Samir OUCHANI, CESI, FR
Title: Designing Trustworthy Smart Systems: Bridging Artificial Intelligence and Formal Methods
10.15-10.45 Break
10.45-12.15 Zakaria Chihani, CEA, FR
Title: Trustworthy AI: Methods & Tools
12.15-13.15 Lech Jóźwiak, TU/e, NL
Title: Quality-driven Design of Cyber-Physical Systems
13.15-14.30 Lunch Break
14.30-16.30 Hans Vangheluwe and Joachim Denil, University of Antwerp, BE
Title: General systems engineering concepts (for CPS) and General modelling and simulation concepts
16.30-17.00 Break
17.00-18.00 Joachim Denil, University of Antwerp, BE
Title: Requirements Modelling for Testing and Run-time Monitoring
18.00-19.00 Rakshit Mittal and Hans Vangheluwe, University of Antwerp, BE
Title: Modelling and simulation of physical systems using OpenModelica (lecture/hands-on)
Day 4, Friday 13 June:
09.00-10.00 Rakshit Mittal and Hans Vangheluwe, University of Antwerp, BE
Title: Calibration and control of physical systems using OpenModelica (lecture/hands-on)
10.00-12.00 Joeri Exelmans and Hans Vangheluwe, University of Antwerp, BE
Title: Modelling, simulation, and synthesis of discrete-event systems using Statecharts (lecture/hands-on)
12.00-13.00 Lunch Break
13.00-16.30 Anish Bhobe, Dominique Blouin, and Yara Hallak, Telecom Paris, FR
Title: Modelling, verification, and synthesis of embedded cyber-physical systems using AADL and RAMSES (lecture/hands-on)
16.30-17.00 Break
17.00-18.30 Radovan Stojanovic, University of Montenegro and MECOnet, ME
Title: Design of performance and energy efficient nodes for smart systems
18.30-19.00 Closing of the CPS&IoT'2025 Summer School

+ Free participation in sessions of the CPS&IoT'2025 Conference and MECO'2025 Conference
Summer School participants are expected to come with their own laptops. Internet access will be guaranteed.

Day 5, Saturday 14 June: Excursion possible (excursion fee is not included in the summer school fee)