

WELCOME TO CPS ED 2017



CPS Ed • 2017

Organisation

- <http://cpsied.org>
- WIFI access
- Coffee
 - Room B 316
- Lunch
 - Follow the organizer in the Télécom ParisTech maze
- Local Organizers
 - People with the red badge

Social event

- ❑ Dinner and Cruise in a "Bateau Mouche"
- ❑ 2 metro tickets
- ❑ How many vegetarian meals ?

IMPORTANT :
19:45 at last at the
departure
platform

Pier number 5 at "Port de la
Conférence".

Boat: "Le Zouave".



Many Thanks to

Koç Lab

Ecole Normale Supérieure

Télécom ParisTech

NSF

Sandia National Laboratories

Program Day 1

Opening and Introduction

08:30-09:00 | Patrick Duvaut and Çetin Kaya Koç

Reinforcement Learning for Cyber-Physical Safety Engineering

09:00-09:45 | Sam Green, Jieliang Luo, and Çetin Kaya Koç

Monitoring the state of the physical plant in a CPS to detect and counter benign faults and malicious attacks

9:45-10:30 | Israel Koren

Break | 10:30-11:00

Design and Verify CPS with a CSP Approach

11:00-11:45 | Alexandre Chapoutot

Promoting Cyber-Physical Education through Cyber Defense Competitions

11:45-12:30 | Nathaniel Evans, Benjamin Blakely, and Jennifer Fowler

Lunch | 12:30-14:00

Extended Math Programming as a Framework for CPS Models and Analysis

14:00-14:45 | John D. Sirola and Carl D. Laird

Value-Focused Assessment of Cyber-Physical Security Education for Critical Infrastructure Protection

14:45-15:30 | Juan Lopez Jr. and Gurpreet Dhillon

Teaching theoretical foundations of CyberPhysical Systems: Overview and Challenges

15:30-16:15 | Georgios Fainekos

Break | 16:15-16:45

Embedded Classifiers for Energy Constrained IoT Network Security

16:45-17:30 | Jennifer Hasler and Sahil Shah

Attack tree construction: an application to the connected vehicle

17:30-18:15 | Khaled Karray, Jean-Luc Danger, Sylvain Guilley, and Moulay Abdelaziz El Aabid

Program Day 2

Robust Digital Computation in the Physical World

09:00-09:45 | Jackson Mayo

"Beyond Moore's Law" Accelerators for Cyber-Physical Systems

09:45-10:30 | Sam Green, İhsan Çiçek, and Çetin Kaya Koç

Break | 10:30-11:00

Transmedia Learning Tactics for Enhancing Hands-On Cybersecurity Training & Education

11:00-11:45 | Elaine M. Raybourn

Advancing Vehicle Cybersecurity Education through Simulation and Test Environments

11:45-12:30 | Jennifer Fowler, Roland Varriale, and Nathaniel Evans

Lunch | 12:30-14:00

Optimal Scheduling of Automated Intersections: A Modeling Framework for Traffic Analysis, Control, and Security

14:00-14:45 | Gianluca Bianchin and Fabio Pasqualetti

Why we should care about parallel programming in securing Cyber-physical systems

14:45-15:30 | Sandro Bartolini and Biagio Peccerillo

The multiple ways to automate the application of software countermeasures against physical attacks: pitfalls and guidelines.

15:30-16:15 | Nicolas Belleville, Thierno Barry, Damien Couroussé, Karine Heydemann, Henri-Pierre Charles, and Bruno Robisson

Break | 16:15-16:45

Challenges in cyber security - Ransomware Phenomenon

16:45-17:30 | Emil Simion and Vlad-Raul Pasca

Dinner

19-45 | Bateau mouche