Welcome to

CERN School of Computing

http://indico.cern.ch/e/iCSC-2018

Sebastian Lopienski
CERN School of Computing director

Three CERN Schools of Computing

CSC 2018

Main school

1 Oct - 14 Oct 2018

Tel Aviv University | Tel Aviv | Israel

Applications will open in March 2018

tCSC 2018

Thematic school

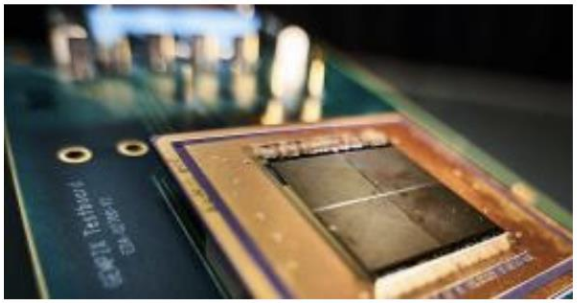
3 Jun - 9 Jun 2018

MEDILS | Split | Croatia

School Website

APPLY NOW!

iCSC 2018



Inverted school

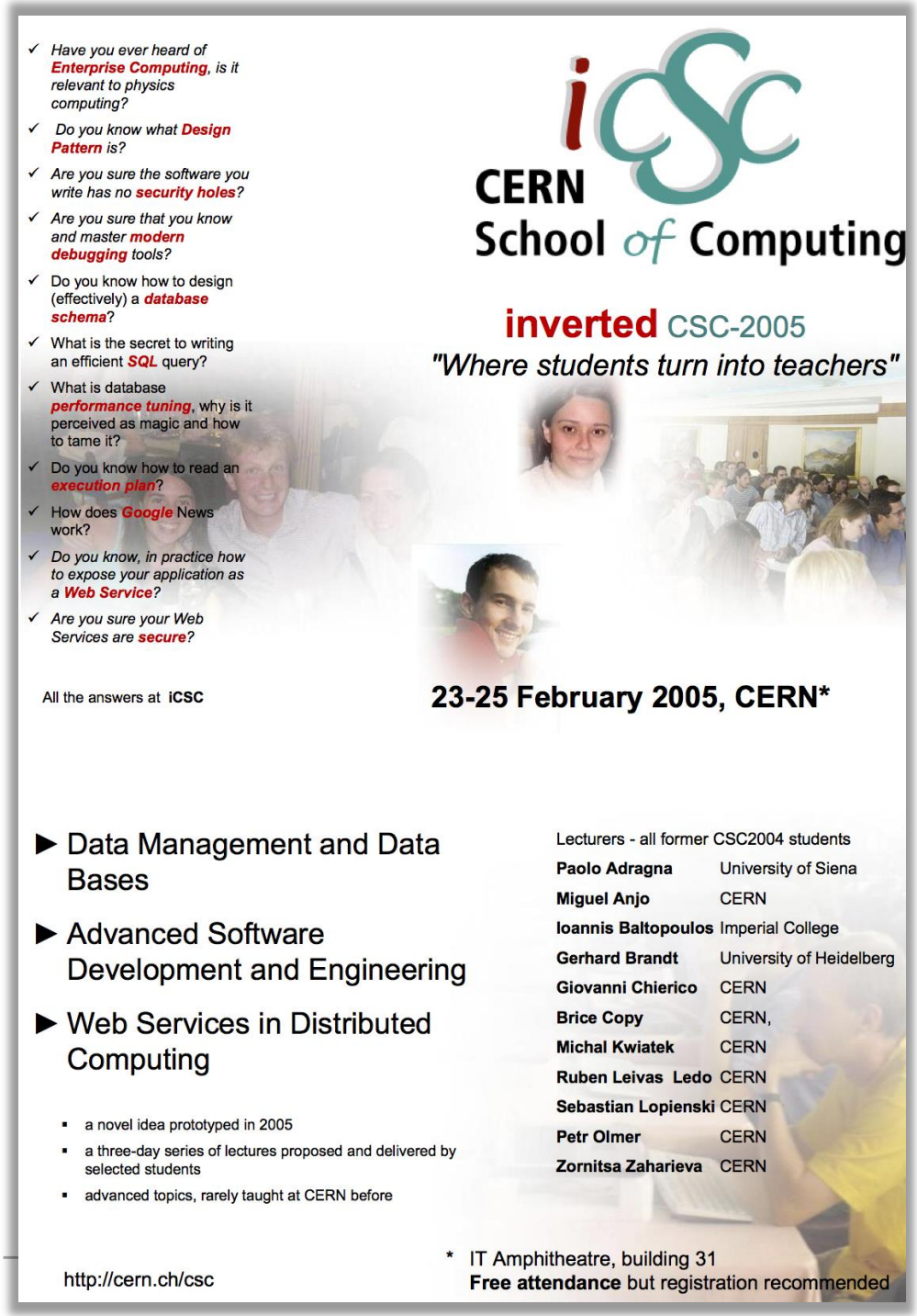
5 Mar - 8 Mar 2018

CERN | Geneva | Switzerland

School Website

register

Back in 2005…



"Where students turn into teachers"

2018: the 11th edition of the iCSC

2005

2006

2008

2010

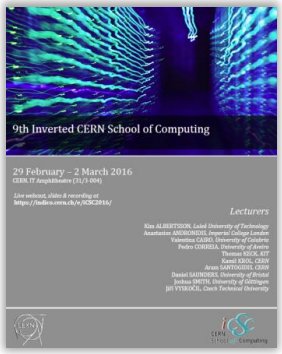
2011

2013

2014

2015

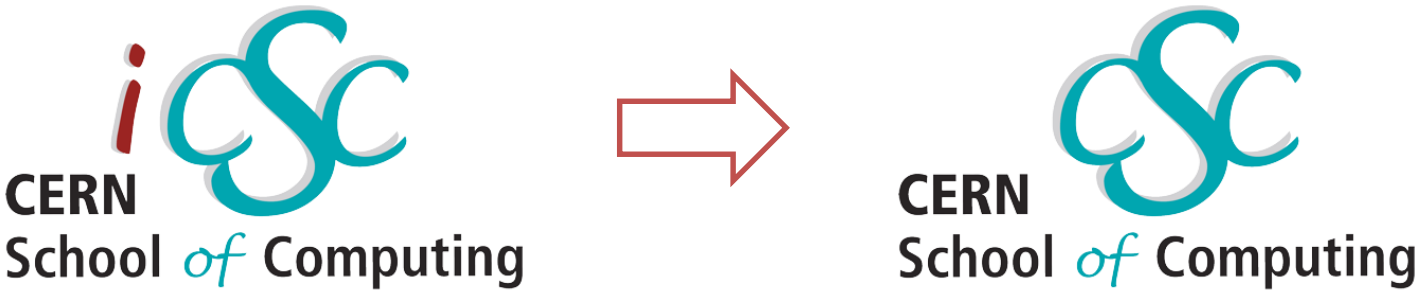
2016



2017

2018

iCSC lecturers becoming full CSC lecturers



- Sebastian Lopienski *(iCSC 2005)*
- Andrzej Nowak *(iCSC 2008)*
- Benjamin Radburn-Smith *(iCSC 2010)*
- Thomas Keck *(iCSC 2016)*
- Eamonn Maguire *(iCSC 2017)*


iCSC
CERN
School of Computing 2018

Inverted CSC 2018

We encouraged lecturers to propose hands-on exercises

Received 13 proposals of lectures and exercises
for a total of 43 (25+18) hours by students from:

- CSC 2017 *(Madrid, Spain)*
- tCSC 2017 *(Split, Croatia)*
- CSC 2015 *(Kavala, Greece)*

9 proposals retained – 20 (13+7) hours

Exercises in 513-1-024
Come with your laptop

Schedule

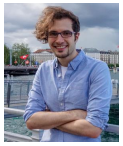
Data Centre visit registration – see email

https://indico.cern.ch/event/671879/timetable/

Monday, 5 March 2018	Tuesday, 6 March 2018	Wednesday, 7 March 2018	Thursday, 8 March 2018
	08:30 **Welcome coffee**	08:30 **Welcome coffee**	
	09:00 **Bayesian Data Analysis (lecture 1)** - Christian Graf	09:00 **Computing for Decentralized Systems (lecture 1)** - Alejandro Avilés	09:00 **Computing for Decentralized Systems (lecture 2)** - Alejandro Avilés
	10:00 **Algorithms and Data Structures (lecture 2)** - Lennaert Bel	10:00 **K.I.S.S. Parallel Coding (lecture 1)** - Gabriele Gaetano Fronze'	10:00 **Coffee**
	11:00 **Coffee**	11:00 **Coffee**	10:30 **K.I.S.S. Parallel Coding (exercise 1)** - Gabriele Gaetano Fronze'
	11:30 **Speeding up image reconstruction in computed tomography** - Victoria Tokareva	11:30 **From sequential to parallel programming with patterns** - Placido Fernandez Declara	11:30 **K.I.S.S. Parallel Coding (exercise 2)** - Gabriele Gaetano Fronze'
	12:30 **Lunch break**	12:30 **Lunch break**	12:30 **Lunch break**
13:15 **Welcome coffee**			
13:45 **A word from the IT Department Head**			
13:50 **Introduction to the Inverted CSC**			
14:00 **Algorithms and Data Structures (lecture 1)** - Lennaert Bel	14:00 **Bayesian Data Analysis (lecture 2)** - Christian Graf	14:00 **CERN Data Centre visit**	14:00 **Computing for Decentralized Systems (exercise 1)** - Alejandro Avilés
15:00 **Modern Backend Systems** - Georgios Voulgarakis	15:00 **Securing Distributed Research** - Hannah Short	15:00 **Coffee**	15:00 **Coffee**
16:00 **Coffee**	16:00 **Coffee**	15:30 **Algorithms and Data Structures (exercise 1)** - Lennaert Bel	15:30 **K.I.S.S. Parallel Coding (lecture 2)** - Gabriele Gaetano Fronze'
16:30 **Modern Backend Systems (exercise)** - Georgios Voulgarakis	16:30 **Securing Distributed Research (exercise)** - Hannah Short	16:30 **Algorithms and Data Structures (exercise 2)** - Lennaert Bel	16:30 **Closing remarks**

Topics


Backend Systems


Blockchain and Decentralized Consensus

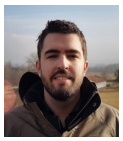

Complexity and Data Structures


Bayesian Data Analysis


Identity Federation


Medical Imaging


Parallel Programming with OpenMP


Parallel Programming Patterns

Lecturers

https://indico.cern.ch/event/671879/page/11702-speakers

Alejandro Avilés
Bity SA (Switzerland)

Lennaert Bel
Nikhef (Netherlands)

Plácido Fernández
CERN, and University Carlos III of Madrid (Spain)

Gabriele Fronzé
INFN Torino (IT), Subatech Nantes (FR)

Christian Graf
Max Planck Institute (Germany)

Hannah Short
CERN

Victoria Tokareva
JINR (Russia)

Georgios Voulgarakis
CERN

Conveners (session chairs)

Julio Calvo

Daniel Campora

Stefan Chitic

Michael Davis

Eva Hansen

Miguel Hermo

Benedikt Wurkner

Mentors (providing advice&feedback to lecturers)


Danilo Piparo


Nikos Kasioumis


Sebastian Lopienski


Alberto Pace


Sebastien Ponce


Are Strandlie


Enric Tejedor


Ivica Puljak

CSC Organizers

Joelma Tolomeo
(CSC Administrative Manager)

Nikos Kasioumis
(CSC Technical Manager)

Logistics

- You can attend only selected lectures
  - but please be on time for the start,
    and avoid leaving in the middle of a lecture
- Please silence your phone 
- Please use the microphone when asking questions
  - lectures are webcast and recorded
- Enjoy coffee and snacks
  - an opportunity to discuss with lecturers and colleagues

iCSC booklet

For those registered participants
… and others, if enough copies

Enjoy the School!


CERN