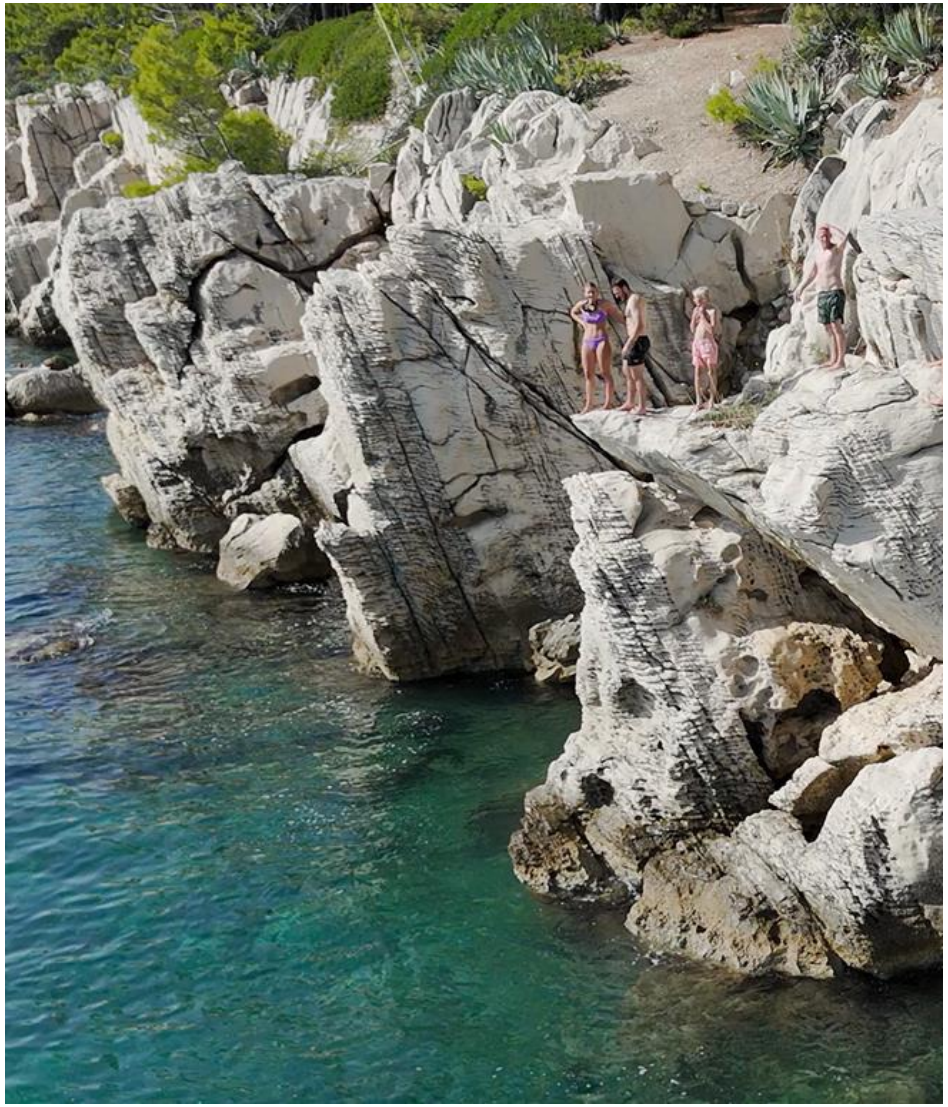

CERN

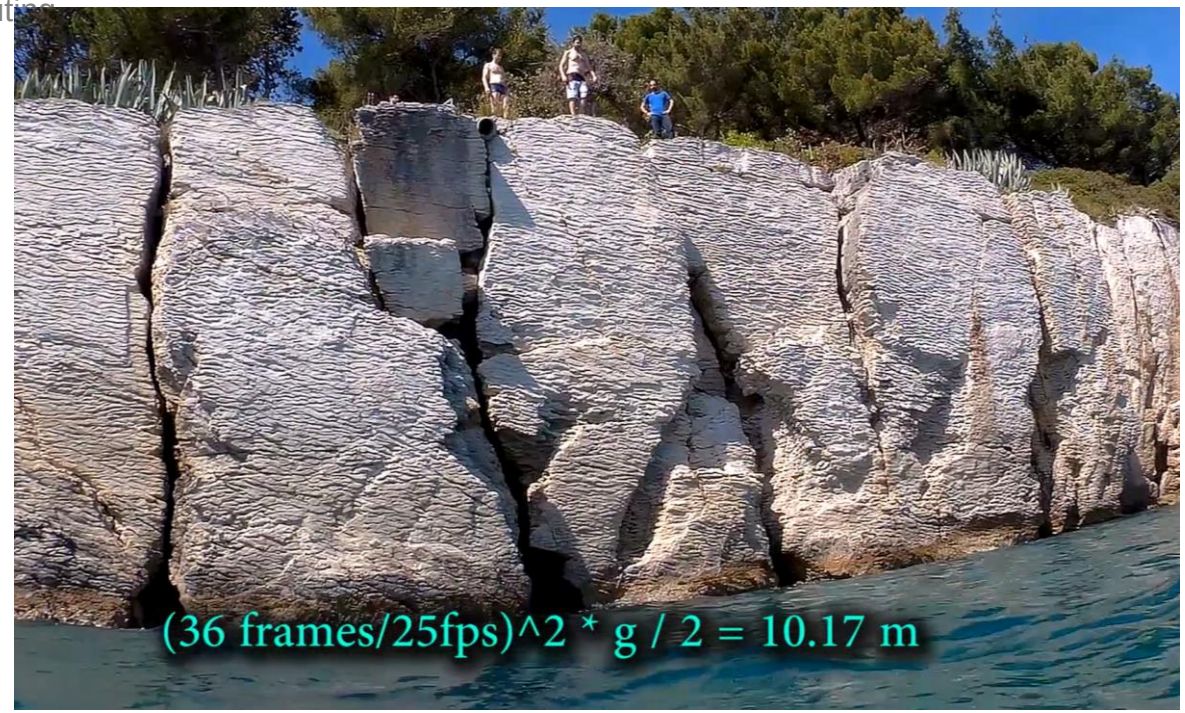
Closing address

Alberto Pace

Drinking Pipi in Split

How high is the cliff ?





Will it rain?

Can weather prevent us having activities??

- No! It only adds to the legend of the School

https://www.youtube.com/watch?v=1dZveoBfiww

Spaceballs, Mel Brooks, 1987

Hiking (Uxbridge, 2010)

Biking (Uxbridge 2010)


Brunel
UNIVERSITY
WEST LONDON
Computing


CAROLIN

Rafting (Split, 2014)

Table tennis tournament

- Alexandros keeps the tCSC cup
- Congratulations to Alejandro and Robin

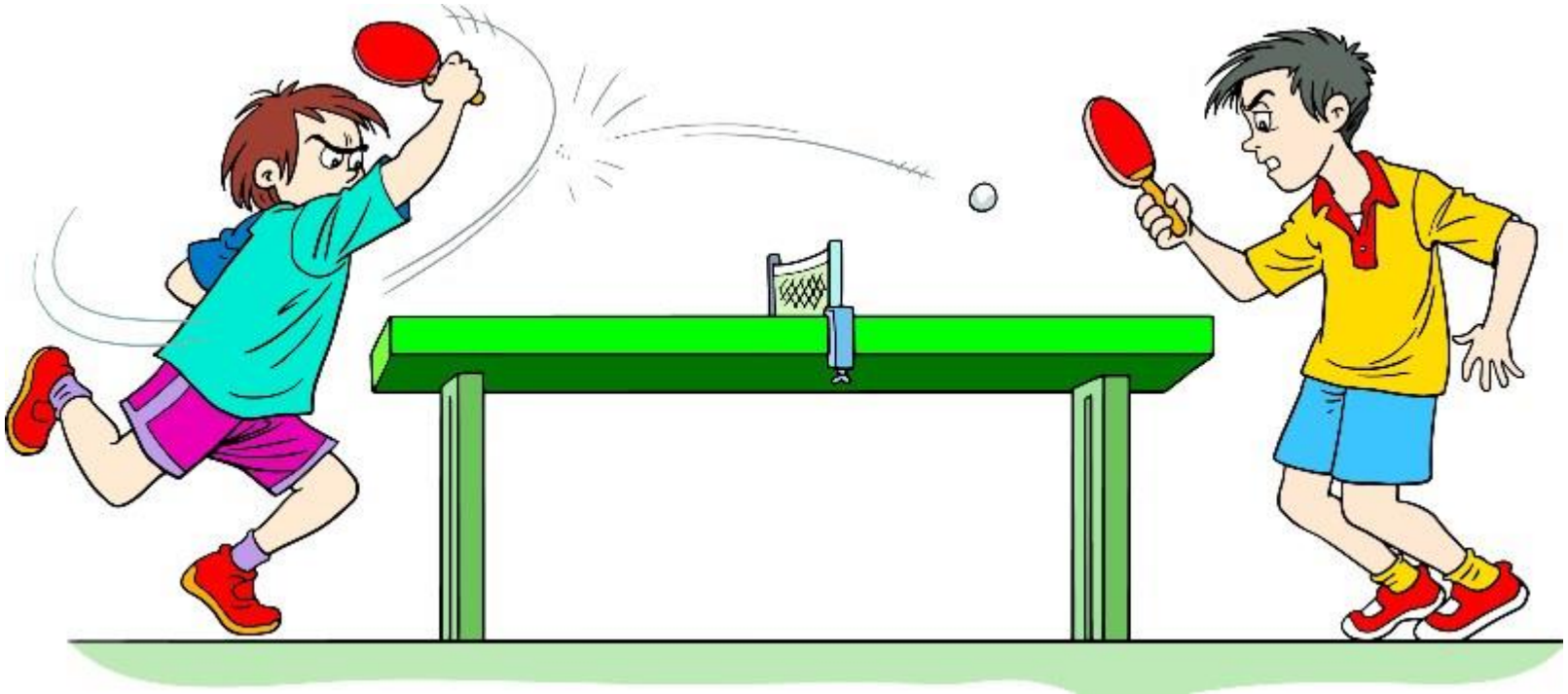


Photo Contest

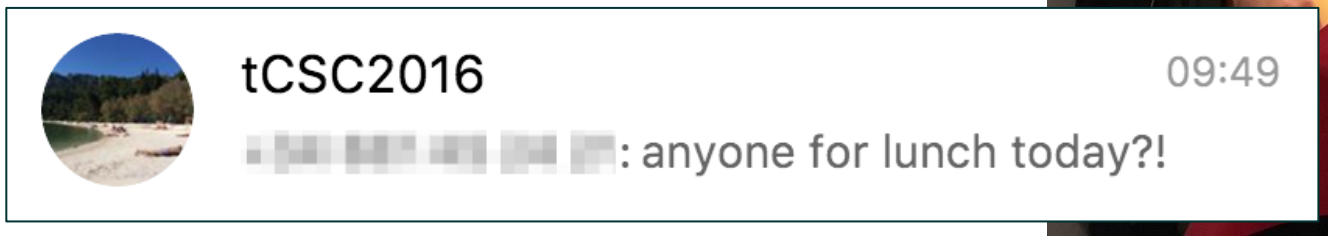
Important points

- Feedback questionnaire
  - anonymous feedback about the School, lectures, exercises
  - details will come by e-mail
  - you **must** complete this feedback questionnaire
  - really, please do – we need your input, so that we can evolve, and get even better!
- Certificate of attendance will be sent out
- Electronic version of the booklet (PDF) is published on tCSC website
  - accessible only for logged-in people

Now, what's next ?

Post-school networking

tCSC lunches at CERN



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Four CERN Schools of Computing

iCSC 2024

April 2024

Apply now as a lecturer !

tCSC 2024

June 2024

Subscription in February

Come back in 2024 !

CSC 2024

September 2024

Subscription in May

Come back in 2024 !

sCSC 2024

October 2024

Come back in 2024

Attend other CSCs ☺

Advertise CSC to your colleagues

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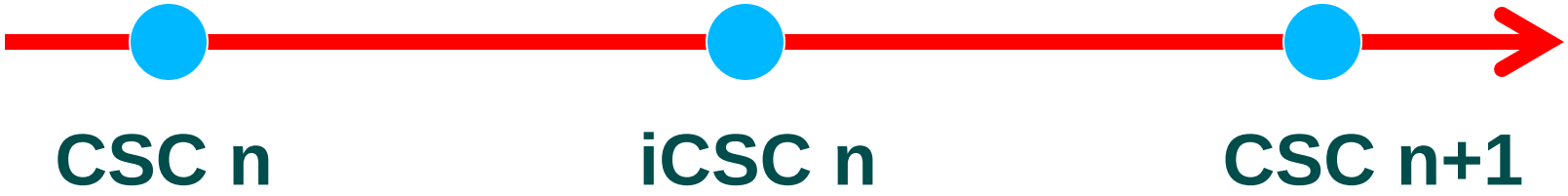
The inverted CERN School of Computing

Why an inverted CSC ?

- At every CSCs, the sum of the knowledge of the students often exceeds the one of lecturer teaching, and that it is frequent to find in the room real experts on particular topics. This is the idea behind iCSC.

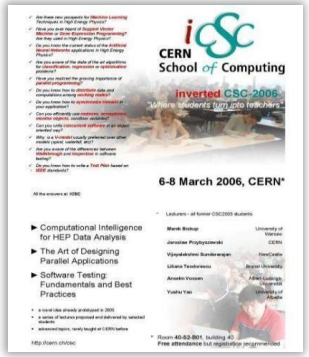
Reversing the roles



2024: will be the 15th edition of the iCSC

2005

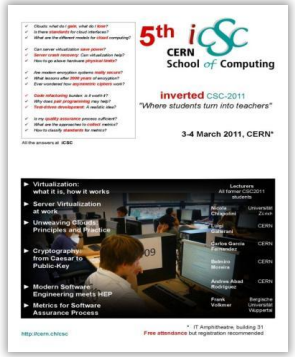
2006



2008

2010

2011

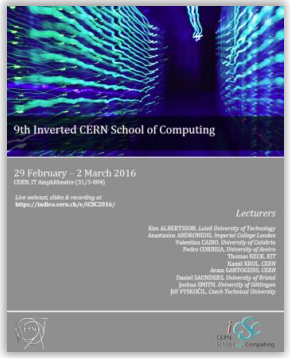


2013

2014

2015

2016

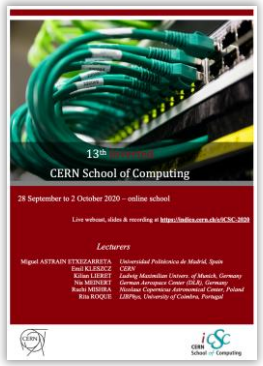


2017

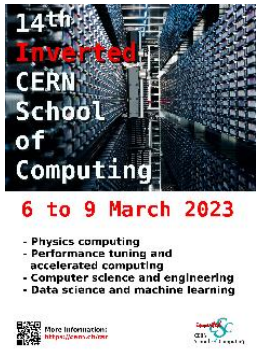
2018

2019

2020



2023



The inverted CSC

- At the end of each main school, we call students present to make proposals. When we receive sufficient proposals of appropriate quality, we organize an inverted school.

- The students combine their skills and elaborate on CSC related subjects.

The 2023 topics were 13, new record !

- Cloud & Containers - Everything you need to know
- Everything that can go wrong in a message passing system
- Authentication and Authorization for the WLCG
- Quantum Computing
- How a real-world C++ compiler works
- CPU Performance Profiling on Linux in the HEP Context
- Multiplatform Programming with Python
- A simple introduction to accelerated computing
- The most beautiful line you can draw with Kalman filter
- An introduction to Bayesian neural networks and uncertainty quantification in neural networks
- Graph Neural Networks: From fundamentals to Physics application
- MLOps - Going from Good to Great
- A Crash Course on Reinforcement Learning

This year's lecturer, 10 different institutes

Ahmed Abdelmotteleb
Warwick University

Martin Cejp
CERN

Tom Dack
STFC

Jack Henschel
CERN

Ivan Kabadzhov
Freiburg University

Peter Kicsiny
CERN and EPFL

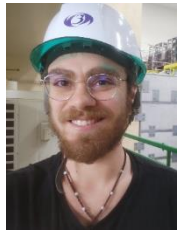
Piotr Konopka
CERN

Charis Kleio Koraka
Wisconsin Madison

Valeriia Lukashenko
NIKHEF, NL

Michal Maciejewski
Roche

Jacopo Talpini
Milano-Bicocca



Ilias Tsaklidis
CERN

Felix Wagner
HEPHY

Lecturers at the iCSC

- Many iCSC lecturers have become lecturers at various CSC schools
  - Sebastian Lopienski (2005), Brice Copy (2005), Zornitsa Zaharieva (2005), Andrzej Nowak (2008), Benjamin Radburn-Smith (2010), Thomas Keck (2016), Daniel Campora (2017) , Eamonn Maguire (2017), Hannah Short (2018), Tom Dack (2023), …
- ... And one of them became director of the school

Diplomas and/or Certificate of Attendance

Access your exam result

- https://cern.ch/frog2023

sCSC – Students' distinctions

- 25 points of 26
  - Benedikt Bieringer
  - Diogo Reis Santos
  - Vasvi Sharma
  - Vlad Nastase

Thanks

The lecturers …

Sebastian Lopienski

Tom Dack

David Crooks

Sven Gabriel

Ste

Barbara Krasovec

Daniel Kouřil

To the Technical and Administrative managers

Kristina Gunne
Administrator

Andrzej Nowicki
Technical Manager

… and the MEDILS staff !

Finally …

- **Thanks to the sCSC 2023 participants**

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Finally …

- **Thanks to the sCSC 2023 participants**

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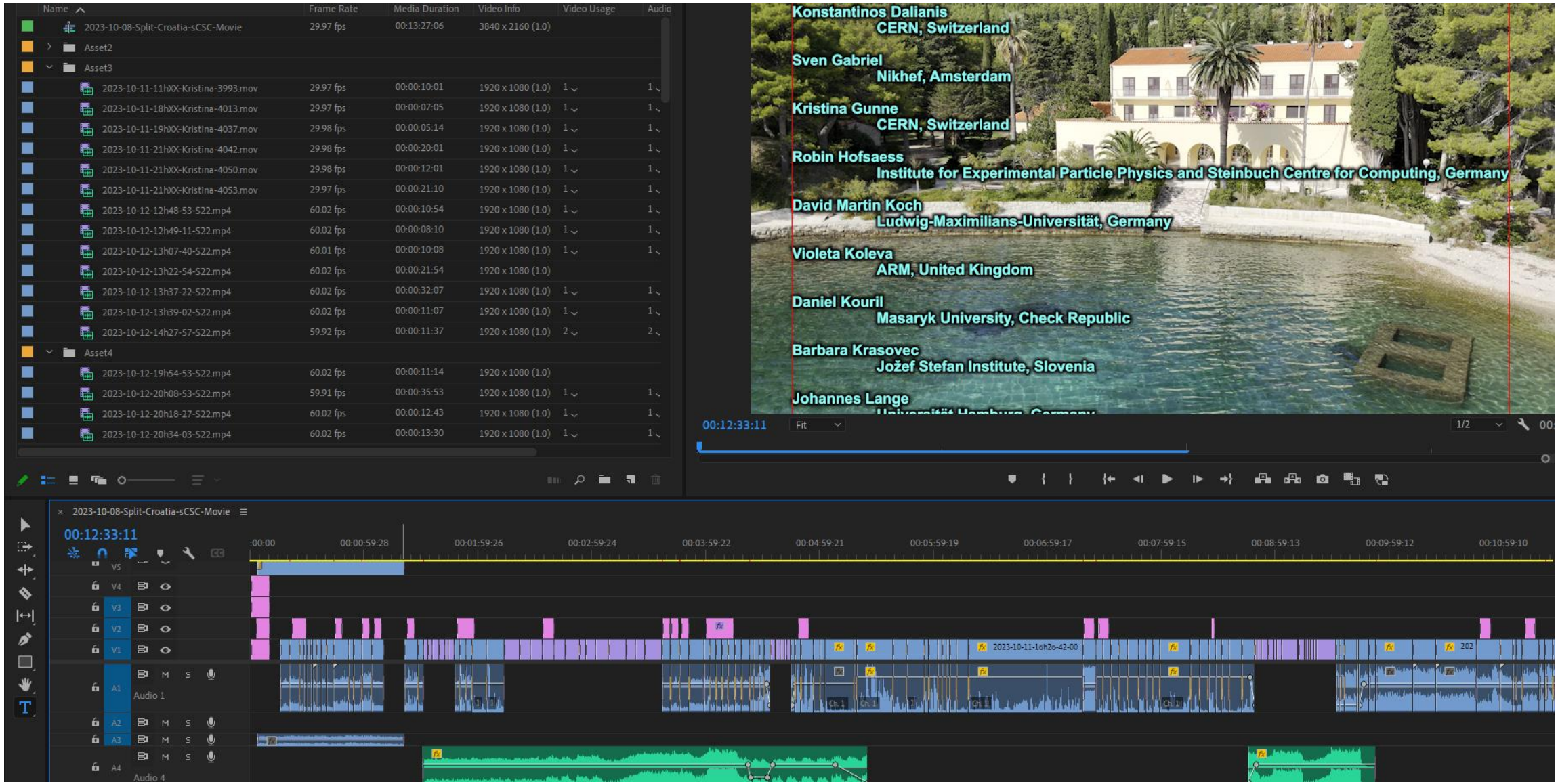
sCSC 2023 participants

James Acris	Science and Technology Facilities Council, United Kingdom
Benedikt Bieringer	Westfälische Wilhelms-Universität-Münster, Germany
Diego Cabas Alvarez	CERN, Switzerland
Anna (Annika) Churilova	CERN, Switzerland
Alessio Cosenza	CERN, Switzerland
David Crooks	UK Research and Innovation, United Kingdom
Tom Dack	Science and Technology Facilities Council, United Kingdom
Konstantinos Dalianis	CERN, Switzerland
Sven Gabriel	Nikhef, Amsterdam
Kristina Gunne	CERN, Switzerland
Robin Hofsaess	Steinbuch Centre for Computing, Germany
David Martin Koch	Ludwig-Maximilians-Universität, Germany
Violeta Koleva	ARM, United Kingdom
Daniel Kouril	Masaryk University, Check Republic
Barbara Krasovec	Jožef Stefan Institute, Slovenia
Johannes Lange	Universität Hamburg, Germany
Sebastian Lopienski	CERN, Switzereland
Stefan Lueders	CERN, Switzereland
Roberta Miccoli	INFN CNAF, Italy
Vlad-Iulius Nastase	University Politechnica of Bucharest, Romania
Andrzej Novicki	CERN, Switzerland
Raul Nunez Garcia	CERN, Switzerland
Alberto Pace	CERN, Switzerland
Alexandros Petridis	CERN, Switzerland
Callum Pollock	Science and Technology Facilities Council, United Kingdom
Elizaveta Ragozina	CERN, Switzerland
Diogo Reis Santos	CERN, Switzerland
Andries Roeland J Reyskens	CERN, Switzerland
Pavithran Sakamuri	Frankfurt Institute for Advanced Studies, Germany
Alejandro Sanchez Teruel	CERN, Switzerland
Anton Schwarz	CERN, Switzerland
Vasvi Sharma	CERN, Switzerland
Shrija Rajen Sheth	CERN, Switzerland
Roman Sumailov	CERN, Switzerland
Miguel Viana	LIP, Portugal
Romain Wartel	CERN, Switzerland
Leon Welchert	Westfälische Wilhelms-Universität-Münster, Germany

Thank you

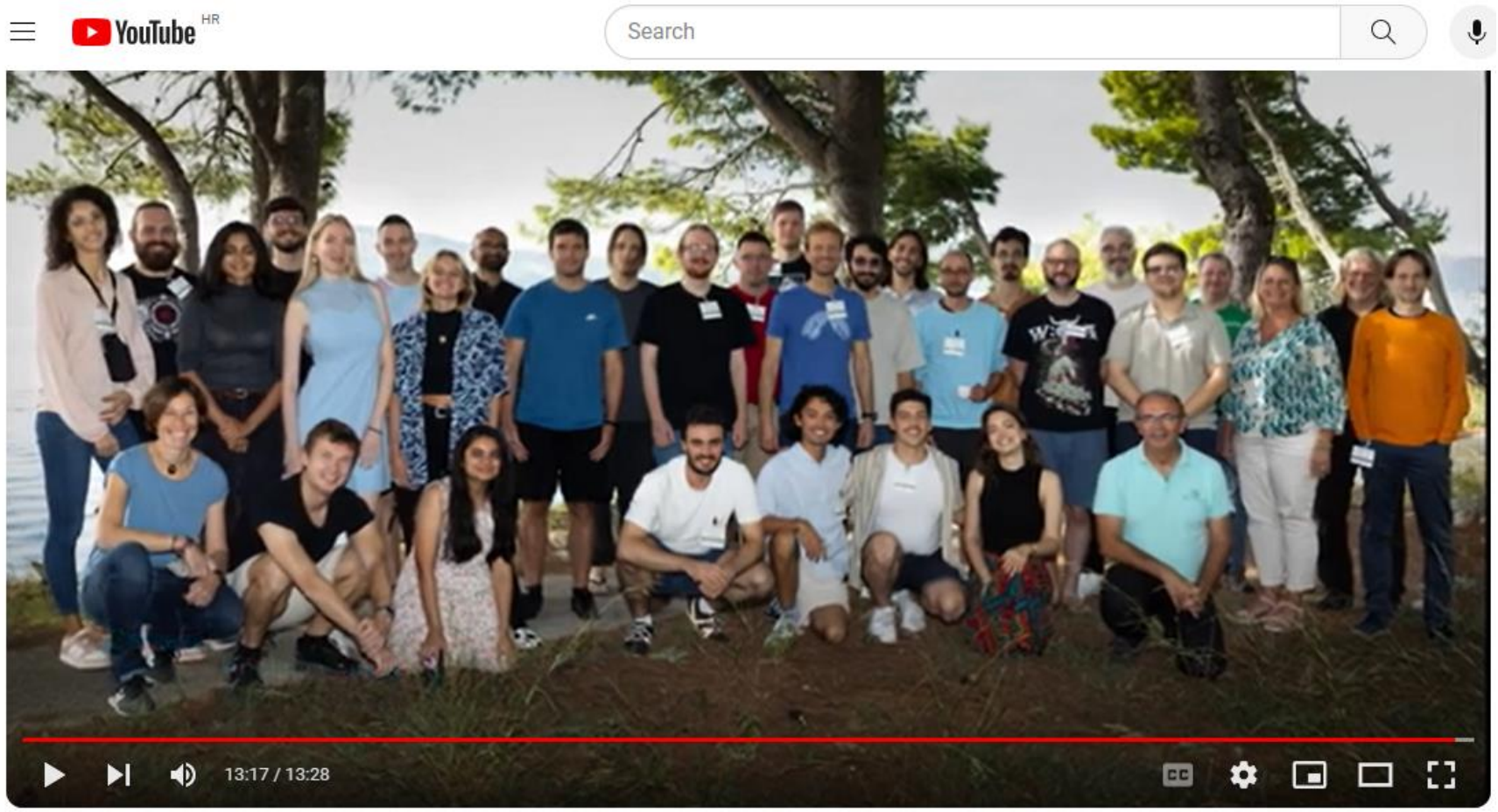
All good things come to an end…

But before closing the school



Summary of the School

- https://youtu.be/F6PqgNUWOzM

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