Updated 11.08.2023

Full Program

7 - 11 August 2023

Monday

7.8.2023

08:45 - 09:30	**REGISTRATION**
09:30 - 09:45	**Prof. Mircea Guina** *Opening*
09:45 - 10:30	**Prof. Risto Nieminen (remote)** *From the basics of semiconductor physics to quantum technology in Finland*
10:30 - 10:45	*COFFEE BREAK*
10:45 - 11:30	**Dr. Jose Pozo** *Photonics impact*
11:30 - 12:15	**Dr. Mark Kuznetsov** *Fundamentals of optically pumped semiconductor lasers - VECSELs*
12:15 - 13:15	*LUNCH BREAK*
13:15 - 14:00	**Dr. Mark Kuznetsov** *History of optically pumped semiconductor lasers, VECSELs: past, present, and future*
14.00 - 14.45	**Prof. Armando Rastelli** *Epitaxial semiconductor quantum dots: basic physical and structural properties*
14.45 - 15.15	*COFFEE BREAK*
15.15 - 16.00	**Prof. Armando Rastelli** *Epitaxial semiconductor quantum dots for quantum science and technology*
16:00 - 17:15	**Prof. Federico Capasso (remote)** *Flat optics based on metasurfaces: physics and applications*

Tuesday

8.8.2023

09:00 - 09:45	**Prof. Constantino De Angelis** *Nonlinear optics at the nanoscale*
09:45 - 10:30	**Prof. Constantino De Angelis** *Harmonic generation and image processing with nonlinear and nonlocal flat optics*
10:30 - 10:45	*COFFEE BREAK*
10:45 - 11:30	**Prof. Peter Lodahl** *Single-photon sources*
11:30 - 12:15	**Prof. Peter Lodahl** *Advanced photon sources and applications*
12:15 - 13:15	*LUNCH BREAK*
13:15 - 14:00	**Dr. Timo Aalto** *Silicon photonics*
14:00 - 14:45	**Prof. Frank Wise** *Femtosecond fiber lasers based on new pulse evolutions: introduction*
14:45 - 15:15	*COFFEE BREAK*
15:15 - 16:00	**Prof. Frank Wise** *Femtosecond fiber lasers based on new pulse evolutions: recent advances*
16:00 - 16:45	***Lab tours***
17:15 - 23:30	*Sauna evening and dinner (Bus 17:15 School venue)*

Wednesday

9.8.2023

09:00 - 09:45	**Prof. Fabian Steinlechner** *Quantum communication and the basics of quantum key distribution*
09:45 - 10:30	**Prof. Fabian Steinlechner** *Long-distance quantum communication with satellites*
10:30 - 10:45	*COFFEE BREAK*
10:45 - 11:30	**Prof. Ursula Keller** *SESAM modelocking of diode-pumped solid-state and semiconductor lasers*
11:30 - 12:15	***Lab tours***
12:15 - 13:15	*LUNCH BREAK*
13:15 - 14:00	**Prof. Ursula Keller** *SESAM modelocking of diode-pumped solid-state and semiconductor lasers*
14:00 - 14:45	**Dr. Ioan Dancus** *10 PW peak power femtosecond laser facility at ELI-NP*
14:45 - 15:15	*COFFEE BREAK*
15:15 - 16:15	**Dr. Miranda Vinay** *Publishing in Nature portfolio journals*
16:15 - 18:30	***Poster session with refreshments***

Thursday

10.8.2023

09:00 - 09:45	**Prof. Christoph Hitzenberger** *Basics, history and impact of OCT*
09:45 - 10:30	**Prof. Christoph Hitzenberger** *Current research in retinal OCT*
10:30 - 10:45	*COFFEE BREAK*
10:45 - 11:30	**Prof. Adrian Podoleanu** *Advances in tunable lasers for OCT*
11:30 - 12:15	**Dr. Mark Kuznetsov** *OCT medical imaging with swept-frequency semiconductor lasers*
12:15 - 13:15	*LUNCH BREAK*
13:15 - 13:40	**Dr. Bettina Heise** *OCT in Linz - from non-destructive testing to medical applications*
13:40 - 14:25	**Dr. Ranjan Rajendram** *Imaging the retina: anatomy to clinic*
14:25 - 15:00	*COFFEE BREAK*
15:00 - 15:45	**Dr. Taran Tatla** *Precision surgery and OCT application in head and neck cancer*
15:45 - 16:10	**Dr. Alberto Rosso** *From the eye to the AI*
16:10 - 16:50	***Industry pitch session***
17:00 - 21:00	*Hike to Pynikki tower and visit to Amuri museum*

Friday

11.8.2023

09:00 - 09:45	**NETLAS student presentations session 1** Anikeev/Bhuiyan/Tatar-Mathes
09:45 - 10:30	**NETLAS student presentations session 2** Grijalva/Payandeh/Lamoso
10:30 - 10:45	*COFFEE BREAK*
10:45 - 11:30	**NETLAS student presentations session 3** Tabatabei/Klufts/Bashir
11:30 - 12:30	**NETLAS student presentations session 4** Grelet/Jimenez/Riha/Venugopal
12:30 - 13:15	*LUNCH BREAK*
13:15 - 14:00	**Prof. Aart Verhoef** *Super-resolution multiphoton microscopy for deep sub-diffraction limited imaging*
14:00 - 15:15	**NETLAS industry forum**
15:15 - 15:25	**Prof. Mircea Guina** *Closing*
15:25	*COFFEE BREAK*
15:30 - 16:30	**NETLAS supervisor board meeting (only for NETLAS members)**