

Programme

Tuesday, June 16

- 9.00 – 18.00 Arrival and Registration
18.00 Opening of the School – **Didier Mazon – Director of the School**
18.15 Introductory Lecture – **Tony Donné** – *Diagnosing the Fusion Roadmap*
19.15 **Urszula Woźnicka** - *IFMIF /ELAMAT podkarpackie*
19.30 Welcome reception

Wednesday, June 17

8.00 Breakfast

8.45 – 13.15 Lectures

Chairman: **Marek Sadowski**

- 8.45 – 9.45 Lecture 1 (L1): **Jef Ongena** – *Introduction to the energy problem and fusion research*
9.45 – 10.45 Lecture 2 (L2): **Martin O’Mullane** – *Theory of SXR, simulation and reconstruction data*

10.45 – 11.15 *Coffee break*

11.15 – 12.15 Lecture 3 (L3): **Robin Barnsley** – *Status of SXR ITER project; different diagnostics aspects*
12.15 – 13.15 Lecture 4 (L4): **Didier Mazon** – *Technical difficulty of SXR diagnostics and reconstruction data*

13.15 – 14.15 *Lunch*

14.15 – 18.00 **Lectures, Tutorials and Students Session**
Chairman: **Krzysztof Drozdowicz**

14.15 – 15.00 Lecture 5 (L5): **Christian Ingesson** – *Advanced analysis methods for SXR diagnostics: tomography*
15.00 – 15.15 SS1: **Grzegorz Kasprowicz** – *Data acquisition system for SXR plasma diagnostics*
15.15 – 15.30 SS2: **Martin Imrisek** – *Optimization of soft X-ray tomography on the COMPASS tokamak*
15.30 – 15.45 SS3: **Ewa Szymańska** – *Diagnostics of plasma parameters based on the K x-ray line positions for various 3d, 4d, and 4f metals*
15.45 – 16.15 *Coffee break*

Chairman: **Didier Mazon**

- 16.15 – 16.45 Tutorial Ad. L2 – **Martin O’Mullane**
16.45 – 17.15 Tutorial Ad. L4 – **Jakub Bielecki**
17.15 – 18.00 Tutorial Ad. L5 – **Christian Ingesson**

18.30 *Dinner*

Thursday, June 18

8.00 *Breakfast*

8:40 *Excursion*

14.00 – *Lunch*

15.00 – 19.30 **Lectures, Tutorials and Students Session**

Chairman: ***Hans-Joachim Kunze***

15.00 – 16.00 Lecture 6 (L6): **Jan Stöckel** – *Electric probes in magnetized plasmas*

16.00 – 16.15 SS4: **Klara Mitosinkova** – *Energy composition of high-energy neutral beams on the COMPASS tokamak*

16.15 – 17.00 Tutorial Ad. L6 – **Jan Stöckel**

17.00 – 17.30 *Coffee break*

17.30 – 18.30 Lecture 7 (L7): **Dimitri Batani** – *Diagnostics of laser produced plasmas*

18.30 – 19.30 Lecture 8 (L8): **Luigi Allocca** – *Optical and PolyCo-based X-Ray Radiography/Tomography Investigations on High-Dense Transient Fluids*

20.00 *Banquet*

Friday, June 19

8.00 *Breakfast*

9.00 – 13.30 **Lectures, Tutorials and Students Session**

Chairman: ***Marek Rubel***

9.00 – 10.00 Lecture 9 (L9): **Tom Todd** – *Technical difficulties of implementation plasma diagnostics in DEMO or a fusion power plant*

10.00 – 10.15 SS5: **Iaroslav Morgal** – *Plasma parameters measured on the IShTAR test facility*

10.15 – 11.00 Tutorial Ad. L9 – **Tom Todd**

11.00 – 11.30 *Coffee break*

Chairman: ***Krzysztof Drozdowicz***

11.30 – 12.30 Lecture 10 (L10): **Marek Rubel** – *Wall Probes: Diagnostic methods and tools in studies of erosion - deposition processes in controlled fusion devices*

12.30 – 12.45 SS6: **A. Garcia-Carrasco** – *First Mirror Test in JET with the ITER-Like Wall*

12.45 – 13.30 Tutorial Ad. L10 – **Marek Rubel**

13.45 – 14.45 *Lunch*

14.45 – 18.00 **Lectures, Tutorials and Students Session**

Chairman: **Marek Scholz**

14.45 – 15.30 Lecture 11 (L11): **Marek Sadowski** – *Soft X-ray studies of microstructures in dense plasma pinches*

15.30 – 15.45 SS7: **Władysław Surata** – *Study of X-ray emission and fine structure of a Plasma-Focus pinch column*

15.45 – 16.00 SS8: **Dariusz Twaróg** – *Mechanism of X-ray Emission in Plasma Focus*

16.00 – 16.15 SS9: **Łukasz Marciniak** – *Possibilities of diagnostics development for nuclear fusion in the PF-24 system*

16.15 – 16.45 *Coffe break*

16.45 – 17.00 SS10: **Matej Tomes** – *Calculation of edge ion temperature and poloidal rotation velocity from carbon III triplet measurements*

17.00 – 17.15 SS11: **Natalia Krawczyk** – *Comparison of Silicon Drift Detectors made by Amptek and PNDetectors in application to the PHA system for W7-X*

17.15 – 17.30 SS12: **Łukasz Syrocki** – *Modeling of the soft X-ray tungsten spectra registered by GEM detection system for WEST*

17.30 – 17.45 SS13: **Jan Dankowski** – *CVD diamond detectors for measurements of fusion-plasma products*

17.45 – 18.00 SS14: **Konrad Tkocz** – *Design concept of the experimental setup for edge illumination X-ray phase-contrast imaging at the Institute of Nuclear Physics PAN*

18.30 *Dinner*

Saturday, June 20

7.30 *Breakfast*

8.00 – 10.45 **Lectures and Tutorials**

Chairman: **Urszula Woźnicka**

8.00 – 9.00 Lecture 12(L12): **Andreas Dinklage** – *Integrated Data Analysis - a tutorial in probabilistic methods in fusion*

9.00 – 09.45 Tutorial Ad. L12 – **Andreas Dinklage**

9.45 – 10.45 *Summary:* **Hans-Joachim Kunze** – *Experimental Spectroscopy*

10.45 – 11.00 Feedback and Prize Award Session

11.00 Closing of the School

12.30 *Lunch*

13.30 *Departure*