## "Klausurtagung Oberjoch 2024"

18.2. - 22.2.



The site of our annual meeting is the

### **Marburger Haus**

a mountain lodge in the Kleinwalsertal (Austria) at 1140 m above sea level in the midst of the very pleasant surroundings of the Alps. The Berghaus provides full board and lodging and has convenient guest and seminar rooms. Further information can be found on their website at <a href="https://www.marburgerhaus.at">www.marburgerhaus.at</a>

For the time of the meeting we hope for decent weather conditions which permit hiking or skiing during the afternoons.

#### Address:

Marburger Haus Familie Leißing Wäldelestraße 16

A6992 Hirschegg im Kleinwalsertal

Tel: 0043 5517 57680

#### Travel and other issues

## Shuttle (S) Tübingen → Hirschegg

• Departure: Sunday 18.02.2024 13:00, Institut für Angewandte Physik in Tübingen

• Arrival: Sunday 18.02.2024 16:00, car park 'Marburger Haus'

## **Shuttle (S) Hirschegg** → **Tübingen**

• Departure: Thursday 22.02.2024 11:00, car park 'Marburger Haus'

• Arrival: Thursday 22.02.2024 14:00, Institut für Angewandte Physik in Tübingen

#### **Remarks**

• ...

## **Participants**

Name		Title of the talk	Driver	Shuttle	
				18.2.	22.2.
1	Balaz, Damian	Post-processing of deep learning processed 2D X-ray scattering data and potential simulation improvements	х	?	?
2	Banks, Hadra	From protein adsorption to crystallization			
3	Beck, Christian	Protein collective and self diffusion during crystallization- First results from WASP	х		
4	Christmann, Simon	Crystallization of HSA with LaCl3 using H2O and D2O studied by DLS			
5	Chulanova, Elena	Thin films of conjugated chalcogenadiazole: growth, structure and optical properties of substituted selenadiazoloquinoxaline			
6	Cruz, Catherine	Kinetic Monte Carlo simulations on thin film growth: island formation			
7	Dax, Ingrid	XPCS in grazing incidence geometry: Structural surface changes during the annealing of PTCDI-C8			
8	Gerlach, Alexander	Aspects of organic thin film growth and structure formation	Х		
9	Hirschmann, Frank	Coarse-grained simulations of Ig and BSA			
10	Hylinski, Maik	Effect of preprocessing of GIWAXS images on deep learning based feature detection			
11	Kneschaurek, Ekaterina	Tracking perovskite crystallization by in situ GIWAXS and diversity of 2D compositions			
12	Kulinsky, Daniel	Deep learning approaches for classifying crystal XRD data in 1D	х		
13	Lapkin, Dmitry	First steps towards high-throughput studies of multi-component thin films			
14	Merten, Lena	Does perovksite grain growth depend on lead complexing and colloid formation in the precursor ink?			
15	Nasro, Roody	Compositional-resolved optical studies of gradient thin films			
16	Pylypenko, Anton	Studies of the structural properties and photophysics in neat and mixed thin films of pi-extended selenadiazole			
17	Reichart, Lara	DLS microrheology for protein solutions	х		
18	Retzbach, Sebastian	Biological samples studied with XPCS	х		

19	Romodin, Mikhail	ML approaches for crystal structure identification from 2D X-ray scattering data		
20	Rosa, Eduardo	Gold nanoparticles applied to perovskite solar cells		
21	Scheffczyk, Niels	Comprehensive study on crystallization pathways of perovskites via real-time GIWAXS	x	
22	Schreiber, Frank	Introduction and conclusions	х	
23	Schwartzkopff, Sebastian	Analysing perovskite phase segregation using simulations and machine learning	х	
24	Senft, Max	Depletion induced phase behavior of BSA and HSA protein solutions: Specific vs. non-specific interactions	х	
25	Simeonov, Leonard	Phase behaviour of 2D lead iodide perovskites	х	
26	Simon, Alessandro	Machine learning of a density functional for anisotropic patchy particles		
27	Surfaro, Furio	Extended ion activated patchy particle model and application on liquid-vapor coexistence		
28	Unger, Freddy	What determines the optical properties of small organic semiconductors?	х	
29	Völter, Constantin	ML based peak identification of 2D X-ray scattering data	х	
30	Weimar, Jens	Influence of anisotropy in GCMC simulations of coarse-grained BSA		
31	Zaluzhnyy, Ivan	Structure of lead halide perovskites studied by X-ray diffraction		
32	Zimmermann, Michael	Hard rods on lattice systems		
33	Zimmermann, Paul	Interface modulation for perovskite solar cells	х	
34				
35				

## **Notes**

- Coordinate your talk with your close colleagues, especially with the session head.
- Prepare at least two print-outs of your slides.
- Give a summary with finished and future aspects of your project

# **Scientific Program**

Sun												Chair: Lar	a Reichart					
18.2.24												30 min	20 min	20 min	20 min	20 min	20 min	
											Dinner	Frank Schreiber - Intro	Maximilian Senft	Hadra Banks	Simon Christmann	Furio Surfaro	Alessando Simon	
Mon		Chair: Damian Balaz									Chair: Roody Nasro							
19.2.24	+	30 min	30 min 20 min	20 min	break	20 min	20 min	20 min	20 min	20 min	Dinner	30 min	20 min	20 min	20 min	20 min		
	Breakfast	Ivan Zaluzhnyy	Paul Zimmermann	Ekaterina Kneschaurek	Coffee br	Niels Scheffczyk	Leonard Simeonov	Eduardo Rosa	Lena Merten	Sebastian Schwartzkopff		Christian Beck	Lara Reichart	Sebastian Retzbach	Frank Hirschmann	Jens Weimar		
Tue		Chair: Sebastian Schwartzkopff										Chair: Hadra Banks						
20.2.24		30 min	20 min	20 min	Coffee break	20 min	20 min	20 min			Dinner	30 min	20 min	20 min	20 min			
	Breakfast	Alexander Hinderhofer	Constantin Völter	Maik Hylinski		Damian Balaz	Mikhail Romodin	Daniel Kulinsky				Alexander Gerlach	Frederik Unger	Elena Chulanova	Anton Pylypenko			
Wed		Chair: Mikh	ail Romodin							Chair:								
21.2.24		30 min	10 min	20 min	eak	10 min	20 min	20 min	20 min		Dinner							
	Breakfast	Dmitry Lapkin	Roody Nasro	Ingrid Dax	Coffee break	Michael Zimmermann Intro	Catherine Cruz	Michael Zimmermann	Frank Schreiber - Conclusion									