## Modeling strongly correlated electrons: Numerics, analytics, and quantum simulations

	мо	TUE	WED	THU	FRI
9:00 - 10:30	Thomas Chalopin	Thomas Schäfer - 2	Zoe Yan - 2	Kaden Hazard - 1	Simon Fölling
10:30 - 11:00	Coffee break	Coffee break	Coffee break	Coffee break	Coffee break
11:00 - 12:30	Thomas Schäfer - 1	Philip Philipps - 1	Shiwei Zhang - 1	Shiwei Zhang - 2	Kaden Hazard - 2
12:30 - 14:00	Lunch break	Lunch break	Lunch break	Lunch break	FREE
14:00 - 15:30	Dima Efetov	Zoe Yan - 1	FREE	Steve White - 2	
15:30 - 16:00	Coffee break	Coffee break		Coffee break	
16:00 - 17:30	Monika Aidelsburger	Steve White - 1		Philip Philipps - 2	
17:30	POSTER	DINNER Atzinger (starting 18:30)		FREE	

(Schellingstr. 9)

## Monika Aidelsburger (MPQ Garching / LMU Munich):

Quantum simulation with bosonic atoms in optical lattices under the microscope

**Thomas Chalopin** (Paris-Saclay / CNRS): Quantum gas microscopy of the Fermi-Hubbard model: probing strongly correlated states

**Dmitri Efetov** (LMU Munich): Engineering flat-bands in moiré materials

**Simon Fölling** (LMU Munich): Beyond (typical) FHM with ultracold Yb atoms in optical lattices

Kaden Hazzard (Rice University): Theory of SU(N) Systems

Philip Phillips (Urbana-Champaign):
1) Solving the Mott Problem
2) 1/4 is the new 1/2: Topology and Strong Interactions

Thomas Schäfer (MPI-FKF Stuttgart):

The dynamical mean-field description of strong correlations
 Beyond DMFT: weak and strong coupling pseudogaps and fluctuation diagnostics

**Steven White** (University of California, Irvine): Introduction to DMRG and Tensor networks

**Zoe Yan** (University of Chicago): *Quantum many-body physics with cold atoms and molecules* 

## Shiwei Zhang (Flatiron):

Quantum Monte Carlo methods for fermion Hamiltonians with sign problem, and applications in the Hubbard model