

# Peyresq Physics 2022

## Micro and macro structure of spacetime

June 12 – 18, 2022

### Monday 13

- 9:00** Erik Curiel “*Why Marolf is excruciatingly clever and elegant yet still wrong*”  
10:30 *Coffee break*  
**11:00** Ted Jacobson “*Thermodynamic ensembles with cosmological horizons*”  
12:45 *Lunch*  
14:00 Free discussion time  
15:30 *Coffee break*  
**16:00** Jorinde van de Vis “*Higgs cosmology: from inflation to baryogenesis*”  
**17:30** Mikel Sanchez Garitaonandia “*Gravitational waves from first-order phase transitions*”  
19:30 *Dinner*  
After dinner Introduction to Genepi and the Dahu for the newcomers

### Tuesday 14

- 9:00** Simone Speziale “*Gravitational energy dependence on boundary conditions*”  
10:30 *Coffee break*  
**11:00** Venkatesa Chandrasekaran “*Operator algebras in gravity and the generalized entropy of black holes and de Sitter*”  
12:45 *Lunch*  
14:00 Free discussion time  
15:30 *Coffee break*  
**16:00** Eugenio Bianchi “*Page curves and the typical entanglement entropy in constrained systems*”  
**17:30** Bob Wald “*Black Holes Decohere Quantum Superpositions*”  
19:30 *Dinner*  
After dinner Alexandre: Extracts from Grothendieck’s *Recoltes et Semailles*

### Wednesday 15

- 9:00** Diego Blas “*On detecting GWs in the microHertz and in the high frequency bands*”  
10:30 *Coffee break*  
**11:00** Eugene Lim “*Looking for Weird Stuff using Gravitational Waves*”  
12:45 *Lunch*  
14:00 Excursion

### Thursday 16

- 9:00** Alexandre Le Tiec “*The shape of black hole Love*”  
10:30 *Coffee break*  
**11:00** Maciej Kolanowski “*Cold charged black holes in AdS - a few surprises*”  
12:45 *Lunch*  
14:00 Free discussion time  
15:30 *Coffee break*  
**16:00** Marc Casals “*Semiclassical effects on the Cauchy horizon of Kerr*”  
**17:30** Manus Visser “*Newton’s second law from entanglement*”  
19:30 *Dinner*  
After dinner Eugene: piano impromptu

### Friday 17

- 9:00** Marija Tomasevic “*dS through holography*”  
10:30 *Coffee break*  
**11:00** Ruth Gregory “*Quantum Simulators for Fundamental Physics*”  
12:45 *Lunch*  
14:00 Free discussion time  
15:30 *Coffee break*  
**17:00** Goncalo Araujo-Regado “*Cauchy-slice holography*”  
**18:00** Bob Wald “*Infrared Finite Scattering in QFT and QG*”  
19:30 *Dinner*

Breakfast: 8:00 – 8:45 every day