

Patterned surfaces and complex liquids

Discussion leader: S. Dietrich, MPI Institute for Intelligent Systems, Stuttgart, Germany

The discussion will address, but not be limited to, the following:

- Development of experimentally validated models for the wetting of ionic fluids, with a view to electro-wetting applications.
- Effect of surface patterning and topological defects on the wetting properties of liquid crystals, with a view to applications in the LCD industry.
- Interplay between additional length scales that characterise these fluids and the scale of the surface texture, and how this interplay may impact the wetting properties of such complex fluids.
- Role of thermal fluctuations and spatial correlations in determining wetting behavior.