

StraSoft22 Program

Day 1 , June 2

9:15-9:20 OPENING

Session 1: Active and Non-equilibrium Systems [Chairperson: Igor Kulic]

- **9:20-10:00 Juliane Simmchen (TU Dresden): Active matter mimicking biological behaviours**
- 10:00-10:20 **Rémi Goerlich (ISIS Strasbourg) : Harvesting information to control non-equilibrium states of active matter**
- 10:20-10:40 **Priyanka Sharan (TU Dresden): Microfluidics for micromotors: Fabrication and Environments**

10:40-11:00 COFFEE BREAK

Session 2: Colloids [Chairperson: Antonio Stocco]

- **11:00-11:40 Pascal Hebraud (IPCMS Strasbourg): Flow anisotropy and flow reversibility of concentrated colloidal suspensions**
- 11:40-12:00 **Roman Adamski (ICS Strasbourg): Diffusion coefficient of metal ions in oil painting**
- 12:00-12:20 **Doru Constantin (ICS Strasbourg): Packing spindles**

12:20-13:20 LUNCH BREAK / POSTER SESSION

Session 2: Membranes and Interfaces I [Chairperson: Florent Fessler]

- 13:20-13:40 **Friedrich Walzel (ICS Strasbourg): Perturbing the catenoid: stability and mechanical properties of non-axisymmetric minimal surfaces**
- 13:40-14:00 **Lisa Berezovska (ICS Strasbourg): Non-ideality in lipid mixtures: Molecular dynamics study**
- 14:00-14:20 **Eulalie Lafarge (ICS Strasbourg): Lipid membrane hydroperoxidation favors ion permeability**
- 14:20-14:40 **Jean-Baptiste Fleury (Uni Saarland): Lipid Droplets Embedded in a Model Cell Membrane Create a Phospholipid Diffusion Barrier**

14:40-15:00 COFFEE BREAK / POSTER SESSION

Session 3: Macromolecules and Superstructures I [Chairperson: Amparo Ruiz Carretero]

- **15:00-15:40 Delphine Chan-Seng (ICS Strasbourg): Tuning the morphology and properties of microfibers by microfluidic photopolymerization**
- 15:40-16:00 **Mehdi Vahdati (ICS Strasbourg): Underwater Adhesion of Polysaccharides-based Complex Coacervates**
- **16:00-16:40 Christophe Chassenieux (ICS Strasbourg): Formation de nanofeuillets de fullerene C60 templatée par des auto-assemblage de copolymères amphiphiles en peigne, vers des hydrogels nanocomposites "tout organique"**

16:40-17:30 POSTER SESSION

17:30 Visite du musée de minéralogie / musée de sismologie

Day 2 , June 3

Session 4: Biophysics [Chairperson: Daniel Riveline]

- **9:00-9:40 Nacho Molina (IGBMC Strasbourg) : Modelling chromatin and protein diffusion dynamics in the nucleus**
- 9:40-10:00 **Bastien Molcrette** (ENS Lyon) : Catch and Thread: experimental study of a nanoscale translocation ratchet
- **10:00-10:40 Hervé Morhbach (UdL Nancy) : Helical Superstructure of Intermediate Filaments.**
- 10:40-11:00 **Karen Amaral De Oliveira** (IGBMC Strasbourg): Modelling Transcription Factors Search and Polymerase Recruitment Dynamics within a complex chromatin structure

11:00-11:20 COFFEE BREAK / POSTER SESSION

Session 5: Macromolecules and Superstructures II [Chairperson: Fabrice Thalmann]

- **11:20-12:00 Hong Xu (UdL Metz): Simulation of model binary mixtures: viscosity, viscoelasticity and effects of scalar activity**
- 12:00-12:20 **William Fall** (ICS Strasbourg): Learning the Crystallisation Behaviour of Bidisperse Branched Model Polymers using Coarse-Grained Molecular Dynamics Simulations

12:20-13:20 LUNCH BREAK / POSTER SESSION

Session 6: Membranes and Interfaces II [Chairperson: Eulalie Lafarge]

- 13:20-13:40 **Pierre Muller** (ICS Strasbourg): Can we use ring deformation to measure surface tension?
- 13:40-14:00 **Florent Fessler** (ICS Strasbourg): Bare and Lipid-coated Colloidal Particles Interacting with Biomimetic Membranes
- 14:00-14:20 **Swen Helstroffer** (ICS Strasbourg): Friction of stacked phospholipid layers

14:20-14:40 COFFEE BREAK

Session 7: Chemical and Non-equilibrium Systems [Chairperson: Christophe Chassenieux]

- **14:40-15:20 Giulio Ragazzon (ISIS Strasbourg): Non-equilibrium chemical reaction networks**
- 15:20-15:40 **Jorge Valera** (Univ. Strasbourg): Photoredox catalysis to achieve orthogonality in chemical reaction cycles
- 15:40-16:00 **Kyeong-Im Hong** (ICS Strasbourg): Hydrogen bonded supramolecular polymerization of rhodanine conjugated polythiophene for chiral semiconductor

16:00 PRIZES & CLOSING