

## 5<sup>th</sup> workshop in *Mechanobiology and Physics of Life* in Lyon

Monday June 27<sup>th</sup>, 2022, Amphi Mérieux, ENS de Lyon

### SCIENTIFIC PROGRAM

09h00-09h15	Welcome, coffee
09h15-9h25	Opening
	<i>Session “Pathologies and cancer 1”</i>
09h25-10h10	<b>Keynote: Gaëlle Recher</b> <i>Confined 3D cell culture used for both investigating cell self-organisation and engineering modular tissue units, (LP2N, Institut d’Optique d’Aquitaine,)</i>
10h10-10h25	<b>Pauline Bregigeon</b> <i>Microfluidic system for culture, monitoring and electroporation of spheroids based on a hydrogel scaffold (Ampère, ECL, Lyon)</i>
10h25-10h40	<b>Léa Chazot-Franguiadakis</b> <i>Nanofluidics for the study of viral particle transport (LPENSL, Lyon)</i>
10h40-10h55	Poster teaser 1/2
10h55-11h25	Coffee break
	<i>Session “Pathologies et Cancer 2”</i>
11h25-11h40	<b>Malèke Mouelhi</b> <i>Long-term nuclear regulation of cancer cells under confinement (ILM, Lyon)</i>
11h40-11h55	<b>Léa Barral</b> <i>Impairment in mechanotransduction pathways, a key for AML Chemoresistance (CRCL, Lyon)</i>
12h55-12h10	<b>Fabien Delebosse</b> <i>Characterization of the mechanical properties of lung adenocarcinoma (LTM/Cell&amp;Soft, Grenoble)</i>
12h10-12h15	Idylle-labs presentation
12h15-12h30	Poster teaser 2/2
12h30 -14h15	Lunch and Poster session
	<i>Session “Subcellular and Cellular mechanics”</i>
14h15-14h30	<b>Sigolène Lecuyer</b> <i>Substrate stiffness impacts early biofilm formation by modulating bacterial surface motility (LPENSL, Lyon)</i>
14h30-14h45	<b>Delphine Débarre</b> <i>Mechanical regulation of cell adhesion to a soft wall under flow (LiPhy, Grenoble)</i>
14h45-15h00	<b>Sylvain Monnier</b> <i>Probing cell crowding in cells and tissues with Brillouin light scattering (ILM, Lyon)</i>
15h00-15h30	Coffee break
	<i>Session “From cells to tissue and development”</i>
15h30-15h45	<b>Benoit Landrein</b> <i>The mechanics of seed size control in plants (RDP, Lyon)</i>
15h45-16h00	<b>Vincent Mirouse</b> <i>WAVE regulatory complex facilitates cell rearrangements through the generation of a protrusive F-Actin subpopulation at tricellular junctions. (iGReD, Clermont-Ferrand)</i>
16h00-16h15	<b>Jocelyn Etienne</b> <i>Friction when changing neighbours: adhesion-regulated junction slippage controls cell intercalation dynamics in living tissue (LiPhy, Grenoble)</i>
16h15-17h00	<b>Keynote: Julien Derr</b> <i>Plant morphogenesis: motions, growth and mechanics (RDP, ENS de Lyon)</i>
17h00-17h15	Poster prizes and closing remarks