

## Future 3D Additive Manufacturing | The 3DMM20 Conference 2024

<b>7.4.</b>	<b>Sunday</b>	
4:00 PM		Check-In
6:00 PM	8:00 PM	Dinner at Individual Time
8:00 PM		Informal Get-Together

<b>8.4.</b>	<b>Monday</b>	
		Breakfast
9:00 AM	9:05 AM	Opening & Welcome
9:05 AM	9:45 AM	Jennifer Young: Extracellular Matrix Mechanobiology
9:45 AM	10:25 AM	Ayelet Lesman: Fibrous Matrix Mechanics: Orchestrating Cellular Interactions
10:25 AM	10:40 AM	Coffee Break
10:40 AM	10:55 AM	Contributed Talk: Andreas Schoenit Force Transmission is a Master Regulator of Mechanical Cell Competition
10:55 AM	11:10 AM	Contributed Talk: Prof. Claudia Loebel Local Matrix Stiffening to Model Lung Fibrotic Remodeling <i>ex-vivo</i>
11:10 AM	11:25 AM	Industry Talk: Benjamin Richter (Nanoscribe) Revolutionizing Biomedical Fabrication: Two-Photon Polymerization for Multimaterial 3D Printing
11:25 AM	12:05 PM	Andrew Holle: Granular Material Approaches for Presenting Tunable Physiological 3D Confinement to Cells
12:05 PM	12:45 PM	Viola Vogel: The Mechanobiology of Extracellular Matrix: Thinking Beyond the Young's Modulus
12:45 PM	2:00 PM	Lunch
2:00 PM	2:40 PM	Hagan Bayley: Communication in Synthetic Tissues
2:40 PM	3:00 PM	Coffee Break
3:00 PM	3:40 PM	Pavel Levkin: A High-Throughput and Miniaturized Approach to Creating, Assembling, and Manipulating Cell Spheroids
3:40 PM	4:20 PM	Christopher Chen: Engineering Tissues: Build, Learn, Repeat
4:20 PM	4:35 PM	Coffee Break
4:35 PM	5:07 PM	Flashtalks
5:07 PM	7:00 PM	Poster Session I & Drinks
7:00 PM		Dinner

<b>9.4.</b>	<b>Tuesday</b>	
		Breakfast
9:00 AM		Welcome

9:00 AM	9:40 AM	Danijela Vignjevic: Homeostasis of Gut Epithelium Under Mechanical Stress
9:40 AM	10:20 AM	Edouard Hannezo: Mechano-Chemical Bistability of Intestinal Organoids
10:20 AM	10:35 AM	Coffee Break
10:35 AM	11:15 AM	Michael Boutros: Cancer Organoid Models for Drug Discovery
11:15 AM	11:30 AM	Contributed Talk: Prof. Jaroslav Jacak 3D Multiphoton-Lithography Proteinous Scaffolds Moduli for Stem Cell Studies
11:30 AM	11:45 AM	Contributed Talk: Tobias Walther DNA Microbeads for Spatio-Temporally Controlled Morphogen Release Within Organoids
11:45 AM	12:00 PM	Industry Talk: Robert Kirchner (HETEROMERGE) Multi-Material 2-Photon 3D Printing Using an Open-Fluidic <i>in situ</i> Material Exchange
12:00 PM	12:10 PM	Group Picture
12:10 PM	2:00 PM	Lunch
2:00 PM	2:40 PM	Jacopo di Russo: Mesoscale Epithelial Mechanobiology and Cellular Interfaces
2:40 PM	3:20 PM	Daniela Duarte Campos: Bioinspired Strategies and Robotics to Build Tissue with Cell Aggregates
3:20 PM	3:35 PM	Coffee Break
3:35 PM	4:15 PM	Jason Burdick: 3D Biomaterials Processing to Guide Cell Migration and Organization
4:15 PM	4:55 PM	Laura De Laporte: Injectable Synthetic Molecular and Colloidal Building Blocks to Overcome Challenges in Tissue Engineering
4:55 PM	5:05 PM	Coffee Break
5:05 PM	5:23 PM	Flashtalks
5:23 PM	7:00 PM	Poster Session II & Drinks
7:00 PM		Dinner

<b>10.4.</b>	<b>Wednesday</b>	
		Breakfast
9:00 AM		Welcome
9:00 AM	9:40 AM	Roberto Mayor: Mechanics of Cell Migration <i>in vivo</i>
9:40 AM	10:20 AM	Matthias Merkel: Anisotropic Flows Can Organize Multi-Cellular Systems
10:20 AM	10:35 AM	Coffee Break
10:35 AM	11:15 AM	Andreas Bausch: Activity Matters in Organoid Systems
11:15 AM	11:55 AM	Aurélien Roux: Mechanical Generation of Bicephalous and Toroidal <i>Hydra</i> Defines Actin Topological Defects as Force Organizers During Head Regeneration
12:00 PM	1:30 PM	Lunch
1:45 PM	2:00 PM	Meet for Social Program
2:00 PM	6:00 PM	Social Program
7:00 PM		<b>Conference Dinner &amp; Poster Award</b>

<b>11.4.</b>	<b>Thursday</b>	
		Check-Out

		Breakfast
9:00 AM		Welcome
9:00 AM	9:40 AM	Aleksandr Ovsianikov: Multiphoton Lithography – Opportunities for Precise Engineering 3D Cell Environment
9:40 AM	10:20 AM	Ada Cavalcanti-Adam: Material-Based Approaches to Control Cancer Cell Spheroids Dynamics and Invasion
10:20 AM	10:35 AM	Contributed Talk: Grégoire Lemahieu Adhesion Mechanics in Breast Cancer Spheroid Spreading
10:35 AM	10:50 AM	Coffee Break
10:50 AM	11:05 AM	Contributed Talk: Oliver Max Drozdowski Three-Dimensional Force Inference in Budding Intestinal Organoids
11:05 AM	11:20 AM	Contributed Talk: Jasmina Gačanin Cell-Instructive Materials: Versatile Biohybrids and their Guided Assembly to Functional Hydrogels
11:20 AM	11:35 AM	Contributed Talk: Malin Schmidt Combining Two-Photon Polymerization Direct Laser Writing with Soft Lithography for Investigating Plasmodium Sporozoite Migration on Triangular Patterns
11:35 AM	12:15 PM	Motomu Tanaka: Spatiotemporal Order and Dynamics of Tissues and Organoids
12:15 PM	12:55 PM	Peer Fischer: Printing Cells with Sound
12:55 PM	1:00 PM	Farewell
1:00 PM	1:30 PM	Lunch
		<b>Departure</b>