Brnoregion Microscopy – Scientific Programme at IMC21 Liverpool 2026

Date & Time	Name	Organisation	Programme / Contribution	Location
Mon 31 Aug 2026, 13:40–15:25	Petr Klímek	TESCAN	SEM as a Surface-Engineering Platform for Nanoprototyping: In Situ FEBID/FEBIE, Scripted Workflows, and Digital-Twin Process Control	2L (Hall 2)
Mon 31 Aug 2026, 13:40–15:25	Sina Shahbazmohamadi	TESCAN	High-Throughput TEM and NanoCT Specimen Preparation by Femtosecond Laser Micromachining	2L (Hall 2)
Mon 31 Aug 2026, 17:30–18:30	Kamila Hrubanová	ČSMS / ISI CAS	IP1 281: Freeze-Fracture Analysis of Polyhydroxybutyrate Granules in Cupriavidus necator at Liquid Helium Temperatures	Exhibition Hall
Mon 31 Aug 2026, 17:30–18:30	Tomáš Láznička	ISI CAS / Young CSMS	IP1 284: A microfluidic platform for high-pressure freezing: current development and performance	Exhibition Hall
Mon 31 Aug 2026, 17:30–18:30	Jaromír Bačovský	Delong Instruments	IP1 178: Enhanced Dark-Field Imaging in Low-Voltage Transmission Electron Microscopy for Materials Science Applications	Exhibition Hall
Mon 31 Aug 2026, 17:30–18:30	Jan Čermák	ISI CAS	Robust Cross-Modal Registration in Correlative Microscopy Using XoFTR and Detector-Aware Preprocessing	Exhibition Hall
Mon 31 Aug 2026, 17:30–18:30	Ondřej Ambrož	ISI CAS	In-situ SEM Observation of Composition-Controlled Reversible Phase Transformation in CuSn22 Using High-Temperature BSE Imaging	Exhibition Hall
Mon 31 Aug 2026, 17:30–18:30	Tomáš Březina	ISI CAS	From SSIM to Foundation-Model Embeddings: Evaluating Image Similarity Metrics for Digital Microscopy	Exhibition Hall
Tue 1 Sep 2026, 14:10–14:25	Ali Hasan	CEITEC BUT	Atomic-Scale Mapping of Magnetic Circular Dichroism in the Scanning Transmission Electron Microscope – Session: Advances in Spectroscopy and Spectral Imaging Techniques (Instrumentation)	Hall 2
Tue 1 Sep 2026, 14:25	Markéta Gáliková	IPM CAS	Deformation mechanisms under thermomechanical fatigue loading in additively manufactured superalloy Inconel 939	Room 11C
Tue 1 Sep 2026, 14:40 - 14:55	Martin Olbert	ISI CAS	Multimodal CLEM imaging of biological samples in their native state using CLSM and A-ESEM	Room 11B
Tue 1 Sep 2026, 15:45–17:30	Tomáš Láznička	ISI CAS / Young CSMS	The International Science Slam	Room 14
Wed 2 Sep 2026, 15:45–17:30	Daniel Němeček	TESCAN	Increasing the efficiency of new materials development using advanced analytical 4D-STEM approaches: A case study of the AA2099 aluminum alloy	2E (Hall 2)
Wed 2 Sep 2026, 17:30–18:30	Vendula Hrabalová	Delong Instruments	PP3 739: Visualization of environmental-like microplastic and nanoplastic (eMNPs) using low voltage electron microscopy	Exhibition Hall
Thu 3 Sep 2026, 10:50–11:05	Pavel Stejskal	AdvaScope	Diffract, reveal, retract: high speed 4d STEM imaging with a retractable hybrid pixel detector for diffraction in SEM	2E (Hall 2)
Thu 3 Sep 2026, 17:30–18:30	Ivo Kuběna	IPM CAS	Optimisation of the additive manufacturing of the oxide-strengthened CrCoNi alloy for extreme environments	Exhibition Hall
TBC	Jana Moravcová	CEITEC MU	Preparation of mammalian cells specimen for cryo-electron microscopy using the HPF "Waffle" method	TBC
TBC	Lenka Šmerdová	CEITEC MU	Correlative microscopy reveals phage-biofilm interactions in situ	TBC

TBC	Pavel Křepelka	CEITEC MU	Automated high-resolution Cryo-FIB-SEM Volume EM enables sub-volume averaging of cellular structures	TBC
TBC	Jan Michalička	CEITEC BUT	1) Unique Upgrades of a TITAN Themis by the Latest Cs-Probe Corrector, Post-Column Filter, and Direct Electron Detection Cameras; 2) Imaging of atomically sharp domain walls in antiferromagnetic thin films	TBC