



International Mini-Symposium and Sino-German Research Cooperation Meeting

Sophisticated analytical approaches and metabolomics application

Organizers: R. Lehmann, M. Lämmerhofer

Thursday 20.11.2025 13.00 – 17.30

Venue: University of Tuebingen, Campus Morgenstelle, "Hörsaalzentrum", Room 7E02 D

Session 1

Chair: M. Lämmerhofer / B. Chankvetadze

13.00 Opening/ Welcome

13.10 Guowang Xu, Dalian Institute of Chemical Physics, Chinese Academy of Sciences
New Annotation Methods of Nontargeted Metabolomics Data from High-Resolution Mass Spectrometry

13.35 Oliver J. Schmitz, University of Duisburg-Essen, Institute of Analytical Chemistry
Breaking Boundaries in Separation Science: LCxLC-IM-qTOF-MS

14.00 Xinyu Liu, Dalian Institute of Chemical Physics, Chinese Academy of Sciences
Metabolomics for Major Chronic Disease: From Risk Factor to Early Diagnosis and Clinical Intervention

14.25 Bernhard Drotleff, EMBL, Heidelberg
Enhancing Untargeted Metabolomics and Lipidomics Workflows: Practical Strategies from a Core Facility Perspective

14.50 – 15.15 Coffee Break

Session 2

Chair: G. Xu / O. Schmitz

15.15 Tibor Toth, Roche Diagnostics, Munich
The Cobas® i601 Mass Spec Solution: A Walkthrough of a Fully Automated LC-MS Workflow

15.40 Bezhan Chankvetadze, Tbilisi State University, Institute of Physical and Analytical Chemistry
Isomeric Drugs of Abuse: Current Bioanalytical Challenges and Possible Solutions

16.05 Xiaoqing Fu, Shanghai University, Medical School
Lipidomics: Empowering Modern Drug Discovery and Clinical Analysis

16.30 Di Yu, Dalian Institute of Chemical Physics, Chinese Academy of Sciences
Exploiting Metabolic Dependencies in Gliomas: From IDH1-Driven Vulnerabilities to Targeted Therapeutic Strategies

16.55 Christoph Trautwein, M3 Research Center, Core Facility Metabolomics, University Clinics Tübingen
Multimodal Metabolomics by NMR, timsTOF LC-MS and MALDI Imaging for Deep Metabolic Phenotyping in Human Cancer

17.20 Closing remarks