

## Tuesday 19 September

### MALDI-TOF MS workshop

*Sciensano, 14 rue Juliette Wytsman, 1050 Brussels*

- 9:00: Welcome coffee & registration
- 9:30: Introduction and MALDI-TOF MS basics in microbiology  
*Pierre Becker (BCCM-IHEM, Belgium)*
- 9:50: Implementation of MALDI-TOF MS in the day-to-day operation of the BCCM/LMG Bacteria Collection  
*Anneleen Wieme (BCCM-LMG, Belgium)*
- 10:10: Application of MALDI-TOF MS in mycology and collections of fungal strains  
*Pierre Becker (BCCM-IHEM, Belgium)*
- 10:30: MSI-2, an online identification tool for MALDI-TOF Mass Spectra  
*Anne-Cécile Normand (AP-HP, Sorbonne University, France)*
- 10:55: MALDI Biotyper® - Spectra, Libraries and Identifications  
*Nathalie Grégoire (Bruker Daltonics)*
- 11:20: Lab demonstration & Q/A session
- 12:30: Lunch

### 40 years BCCM

*Royal Belgian Institute of Natural Sciences, 29 rue Vautier, 1050 Brussels*

- 13:00: Welcome & ECCO registration
- 14:00: Keynote lectures
- 16:30: Opening Expo 40 years BCCM & networking reception
- 19:00: Walking buffet & animation

# Wednesday 20 September

Royal Belgian Institute of Natural Sciences, 29 rue Vautier, 1050 Brussels

- 8:30: ECCO registration
- 9:00: Welcome address
- 9:15: Session 1 - Microbes in Health and Disease  
*Chair: Rudi Beyaert (BCCM/GeneCorner, Belgium)*  
*Co-chair: Wouter De Schampelaire (BCCM/GeneCorner, Belgium)*
- 9:15 **Keynote:** *In vitro* technology to study live biotherapeutics and enteropathogens in the human gut  
*Kim De Paepe (Ghent University, Belgium)*
- 9:45 Towards standardization of next-generation real-time bioaerosol monitors  
*Nicolas Bruffaerts (Sciensano, Belgium)*
- 10:10 Is hand disinfectant a public health problem?  
*Teresa Vale Dias (University of Minho, Portugal)*
- 10:25: Coffee break
- 11:00: Session 2 - Microbes in Health and Disease  
*Chair: Rudi Beyaert (BCCM/GeneCorner, Belgium)*  
*Co-chair: Wouter De Schampelaire (BCCM/GeneCorner, Belgium)*
- 11:00 **Keynote:** The oral cavity: a mouthful of opportunities  
*Marie Joossens (Ghent University, Belgium)*
- 11:30 The VirusBank Platform: A new and unique research infrastructure enhancing preparedness against future epi- or pandemics  
*Lorena Sanchez Filipe (KULeuven, Belgium)*
- 11:55 Fungi from marine plastisphere as source of osteogenic and mineralogenic compounds  
*Matteo Florio Furno (University of Turin, Italy)*
- 12:10 Using a polyphasic approach for exploring secondary metabolites from freshwater and thermal cyanobacteria strains from Azores islands  
*Ruben Luz (University of the Azores, Portugal)*
- 12:25: Lunch & posters
- 13:30: Session 3 - Microbes in Food and Agriculture  
*Chair: Stéphane Declerck (BCCM/MUCL, Belgium)*  
*Co-chair: Gerard Verkleij (CBS & NCCB, The Netherlands)*
- 13:30 **Keynote:** Biocontrol of plant pathogens combining AMF and bacteria  
*Marc Ongena (TERRA, Belgium)*
- 14:00 Microfluidics to study microorganisms at the cellular level  
*Felix Richter (Imperial college London, UK)*
- 14:25: Coffee break
- 15:00: Session 4 - Microbes in Food and Agriculture  
*Chair: Stéphane Declerck (BCCM/MUCL, Belgium)*  
*Co-chair: Gerard Verkleij (CBS & NCCB, The Netherlands)*
- 15:00 **Keynote:** Heterogeneity in food spoilage fungi  
*Jos Houbraeken (Westerdijk Institute, The Netherlands)*
- 15:30 Yeast diversity of cocoa bean heap fermentations and their environments  
*Heide-Marie Daniel (Université catholique de Louvain, Belgium)*
- 15:55 Lactobacilli and yeasts for phytate degradation in soy milk fermented products  
*Paola Mattarelli (University of Bologna, Italy)*
- 16:10: End of session
- 17:30: Guided visit Chocolate museum

## Thursday 21 September

Royal Belgian Institute of Natural Sciences, 29 rue Vautier, 1050 Brussels

8:30: Coffee

9:00: Session 5 - Microorganisms in ecological applications

Chair: Annick Wilmotte (BCCM/ULC, Belgium)

Co-chair: Cristina Varese (MUT, Italy)

9:00 **Keynote:** Understanding the mechanisms of stress resistance to optimize the application of cyanobacteria for soil restoration

*Beatriz Roncero Ramos (University of Seville, Spain)*

9:30 Harnessing local rhizobia for soybean cultivation at northern latitudes

*Helena Van den Eynde (Ghent University, Belgium)*

9:55 Exploring the phytoplankton potential in the circular bioeconomy

*Manuela Bordiga (National Institute of Oceanography and Applied Geophysics, Italy)*

10:10: Coffee break

10:50: Session 6 - Microorganisms in ecological applications

Chair: Annick Wilmotte (BCCM/ULC, Belgium)

Co-chair: Cristina Varese (MUT, Italy)

10:50 **Keynote:** Running a photobioreactor in space for the production of oxygen and edible 'spirulina' biomass

*Felice Mastroleo (SCK-CEN, Belgium)*

11:20 Diversifying application of recycled nutrients derived from anaerobic digestion for sustainable algal protein farming

*Jai Sankar Seelam (Ghent University, Belgium)*

11:45 A phylogenomic and comparative genomic analysis of *Commensalibacter*, a versatile insect symbiont

*Juliana Botero (Ghent University, Belgium)*

12:05: Lunch & posters

13:15: Session 7 - Taxonomy, Phylogeny, Phylogenomics, Phylodynamics: new techniques and approaches

Chair: Leen Rigouts (BCCM/ITM, Belgium) and Peter Vandamme (BCCM/LMG, Belgium)

13:15 **Keynote:** Using genomes for the classification and tracking of mycobacteria

*Conor Meehan (Nottingham University, UK)*

13:45 Dermatophytes fungi: Phylogenomics of the *Trichophyton mentagrophytes* species complex

*Frederik Baert (Sciensano, Belgium)*

14:10 Cyanobacterial Taxonomy in the Age of Phylogenomics

*Aniket Saraf (University Paris Cité, France)*

14:25 HAMBI/UHCC: A treasure trove of new cyanobacterial taxa and bioactive metabolites

*Maria Christodoulou (University of Helsinki, Finland)*

14:40: Coffee break

15:10: Session 8 - Data management, infrastructures

Chair: *Philippe Desmeth (BCCM, Belgium)*

Co-chair: *Ayuen Lual (UKHSA, UK)*

15:10 **Keynote:** WDCM services as an information infrastructure for the exploration and utilization of microbial strains preserved worldwide  
*Juncai Ma (WDCM, China)*

15:40 The beauty of data and databasing  
*Vincent Robert (BioAware, Belgium)*

16:05 The GEN-ERA toolbox: unified and reproducible workflows for research in microbial genomics  
*Luc Cornet (University of Liège, Belgium)*

16:30: IS\_MIRRI21: restricted to project partners

18:00: End of session

19:00: Conference dinner

## Friday 22 September

*Royal Belgian Institute of Natural Sciences, 29 rue Vautier, 1050 Brussels*

8:30: Coffee

9:00: Session 9 – Science policy, career skills, valorization of collections

Chair: *Raquel Hurtado-Ortiz (CNM, France)*

9:00 **Keynote:** How to write an influential review article  
*Daniela Ruffell (FEBS Letters, Germany)*

9:30 Impacts of the exchange of strains between culture collections  
*Aurora Zuzuarregui (University of Valencia, Spain)*

9:55 Policy aspects related to EU Research Infrastructures  
*Nelson Lima (University of Minho, Portugal)*

10:20 The FEBS Journal poster award  
*Rudi Beyaert (The FEBS Journal editorial board)*

10:30: Coffee break

11:00: ECCO Annual General Meeting: restricted to ECCO members and candidate members

13:00: Closing lunch

ECCO XLI is supported by

