

23rd Scientific Meeting

Cystic Fibrosis Omics: From Complex Alleles to Host-Pathogen Interactions

Date 21st-22nd May 2026
Location Bonn (Germany)
Chairs Laura Schaupp (DE/Berlin), Julia Hentschel (DE/Leipzig),
Burkhard Tümmler (DE/Hannover)

Preliminary schedule

Thursday		Friday	
12:30 am	Get together + Lunch		
13:00 pm	Opening of the meeting Sessions Discussions	9:00 am	Sessions Discussions
5:30 pm	Keynote + Discussion	1:45 pm	Closing of the meeting
7:30 pm	Dinner		To Go Lunch

Registration

You can register **until April 30th 2026**: www.muko.info/sciem

The Meeting is sponsored by:



Chiesi GmbH/3.450 €; Mylan Germany GmbH (a Viatriis Company)/3.450 €

Program

Thursday, May 21st

- 1:00-1:15 pm** **Opening of the meeting**
Chairs of the meeting
 Laura Schaupp (DE/Berlin), Julia Hentschel (DE/Leipzig),
 Burkhard Tümmler (DE/Hannover)
- 1:15-2:55 pm** **Session I: Translating CFTR Variant Complexity into Targeted Therapeutic Strategies**
chaired by Julia Hentschel (DE/Leipzig)
- 1:15-1:45 pm **Workflow of CFTR France to classify singular and complex CFTR alleles**
 Caroline Raynal (FR/Montpellier)
- 1:45-2:00 pm **CFTR Complex Alleles in Individuals with Cystic Fibrosis Showing Limited Response to Elexacaftor/Tezacaftor/Ivacaftor (ETI) Triple Modulator Therapy***
 Maike Karnstedt (DE/Leipzig)
- 2:00-2:10 pm **Effectiveness of ETI in CF patients with complex alleles of the CFTR gene***
 Tatjana Jakjovska Maretti (MKD/Skopje)
- 2:10-2:25 pm **Targeted Nanopore Sequencing as a Key to Improving CF Diagnostics: Characterization of Splicing Variants to Increase Diagnostic Yield***
 Simone Ahting (GE/Leipzig)
- 2:25-2:40 pm **Transcriptomic analysis of G542X-CFTR bronchial epithelial cells indicates inhibition of nonsense mediated decay by IL-4 treatment***
 Anna Borrelli (IT/Pozzuoli)
- 2:40-2:55 pm **Identification of novel pharmacological inhibitors of the nonsense-mediated RNA decay mechanism to rescue CFTR function in patients carrying nonsense mutations***
 Arianna Venturini (IT/Pozzuoli)
- 2:55-3:30 pm *Break*
- 3:30-5:00 pm** **Session II: Precision Therapeutics: Functional Profiling and Next-Generation Modulators**
chaired by Burkhard Tümmler (DE/Hannover)
- 3:30-4:00 pm **Functional single airway cell transcriptomics / new technologies in research**
 Saskia Trump (DE/Berlin)
- 4:00-4:15 pm **Expanding the therapeutic landscape: Vanzacaftor-Tezacaftor rescues orphaned ETI-resistant genotypes***
 Nicoletta Pedemonte (IT/Genoa)
- 4:15-4:30 pm **Primary nasal epithelial cells for personalized medicine in cystic fibrosis patients with rare mutations***
 Jasmin Berger (DE/Berlin)

- 4:30-4:45 pm **Multi-omics Analysis of Airway Epithelial Cells following CFTR Modulator Therapy***
Mengjie Ma (CH/Geneva)
- 4:45-5:00 pm **Omics to understand the side effects of CFTR Modulators***
Andrea Armirotti (IT/Genoa)
- 5:00-5:30 pm *Break*
- 5:30-6:30 pm** **Keynote-Session**
chaired by Burkhard Tümmler (DE/Hannover)
Proteostasis landscapes of rare CFTR variants to emerging correctors and off-targets of elexacaftor/vanzacaftor
Lars Plate (USA/Nashville)

Friday, May 22nd

- 9:00-11:00 am** **Session III: Targeting the Airway Interface: Microbial Persistence, Immunity, and Clinical Outcomes**
chaired by Burkhard Tümmler (DE/Hannover) and Laura Schaupp (DE/Berlin)
- 9:00-9:30 am **Microbiota–mucin interactions in chronic lung disease**
Laura Schaupp (DE/Berlin)
- 9:30-10:00 am **Characterization of mucin glycan structures**
Kevin Pagel (DE/Berlin)
- 10:00-10:15 am **Deficiency of a repressor of maltodextrin metabolism in commensal *Streptococcus* correlates with *Pseudomonas aeruginosa* growth inhibition***
Sébastien Boutin (DE/Lübeck)
- 10:15-10:30 am **Characterization of mucoid hyper biofilm forming *Staphylococcus aureus* isolates recovered from the airways of a person with cystic fibrosis with a double mutation in the *ica* operon***
Christine H. Rumpf (DE/Münster)
- 10:30-10:45 am **IL-17A and IL-17F differentially modify transcriptomic profile of human bronchial epithelia***
Daniela Guidone (IT/Naples)
- 10:45-11:00 am **Linking highly neutralizing human antibodies targeting multidrug-resistant *Pseudomonas aeruginosa* to clinical and immunological phenotype in people with cystic fibrosis***
Robert Brock (DE/Köln)
- 11:00-11:30 am *Break*

- 11:30-12:45 pm** **Session IV: Developmental and Epigenomic Network Dynamics in Airway Disease**
chaired by Laura Schaupp (DE/Berlin)
- 11:30-12:00 pm **Microbial and fungal dynamics in the respiratory tract of infants with cystic fibrosis**
Ruth Steinberg (CH/Bern)
- 12:00-12:15 pm **The airway microbial metagenome of people with cystic fibrosis and bronchiectasis***
Ilona Rosenboom (DE/Hannover)
- 12:15-12:45 pm **Antisense regulation of genome structure and of epigenomics**
Marie-Madlen Pust (USA/Boston)
- 12:45 pm** **Closing of the Meeting**

**submitted Abstracts*