

The Kenneth B. Fraser Symposium

WWIEM Basement Seminar Room and Inner Atrium

7th November 2024

Session 1

Chair: Dr Gunnar N. Schroeder

09.00-09.05 *Welcome*

Prof Charuhas V. Thakar

WWIEM Director

09.05-09.15 *The Prof Kenneth B. Fraser Lectures*

Prof Miguel A. Valvano

09.15-10.00 *Decoding the Ecological and Evolutionary Dynamics of Colonization Resistance*

Prof Bärbel Stecher,

Ludwigs-Maximilians-Universität (LMU) Munich, Germany

10.00-10.20 *Post-transcriptional regulation of influenza A virus*

Dr David G. Courtney

10.20-10.45 Coffee break in Inner Atrium

Session 2

Chair: Prof Miguel A. Valvano

10.45-11.30 *One Health and pan-genomic epidemiology of a superbug*

Prof Santiago Castillo Ramírez

Universidad Nacional Autónoma de México (UNAM), Campus Morelos, Mexico

11.30-11.50 *Uncovering rhinoviruses' host subversion mechanisms to design new antivirals*

Dr Aurélie Mousnier

11.50-12.10 *Single aminoacid polymorphism dictates the type VI secretion system defensive versus offensive behaviour in *Klebsiella pneumoniae* affecting horizontal gene transfer*

Prof José A. Bengoechea

12.10-13.30 Lunch and Poster session in Inner Atrium

Session 3

Chair: Prof José A. Bengoechea

13.30-14.30 *The Microbiome and Gut Homeostasis*

Prof Andreas J. Bäuml

University of California (UC), Davis, USA

14.30-14.50 *Turning up the heat on NLRP3: a novel mechanism of inflammasome regulation*

Dr Rebecca C. Coll

14.50-15.10 *Extracellular ATP is an environmental cue in gut bacteria*

Dr Andrea Puhar

15.10-15.40 Coffee break in Inner Atrium

Session 4

Chair: Dr Andrea Puhar

15.40-16.00 *The Bacteroides type VI secretion system: linking assembly to function*

Dr David A. Cisneros

16.00-16.20 *Disruption of the nucleoli and translation by a Legionella Dot/ Icm T4SS effector protease*

Dr Gunnar N. Schroeder

16.20-16.40 *Testing novel treatment strategies in clinically-relevant models of Mycobacterium avium lung infection*

Dr Timothy D. Shaw

16.40-17.00 *ESKAPE pathogens of Enterobacter species persist in human macrophages without eliciting pyroptosis*

Prof Miguel A. Valvano