

## Frontiers in Microbial Systems 2023

Classes will take place at the Collège de France in **room D2, 2<sup>nd</sup> floor, building D** on Monday, Wednesday, Thursday and Friday morning. The classes of Tuesday and the exam of Friday afternoon will take place in **room B1, 1<sup>st</sup> floor landing, building B**.

### Monday November 13<sup>th</sup> — Welcome at the frontiers — room D2

- 9h – 10h30 **Olivier Espéli**, CIRB — Introduction to bacterial cell physiology.
- 11h – 12h30 **Alice Lebreton**, IBENS — Introduction to infection biology.
- 14h – 15h30 **Benoît Chassaing**, Institut Cochin — Host-Microbiota interactions in health and disease  
— why mucus matters.
- 16h – 17h30 **Olivier Espéli & Alice Lebreton** — Group discussions on the course topics.

### Tuesday November 14<sup>th</sup> — Evolution of host-pathogen relationships — room B1

- 9h – 10h30 **Aude Bernheim**, Institut Pasteur — Genomics driven discovery of antiphage systems.
- 11h – 12h30 **Martial Marbouty**, Institut Pasteur — Phage-bacteria network of interaction in the environment.
- 14h – 16h **Javier Pizarro-Cerda**, Institut Pasteur — *Yersinia* species as model bacteria to study host/pathogen interactions & evolution.

### Wednesday November 15<sup>th</sup> — Shaping ecosystems through cross-kingdom interactions — room D2

- 9h – 10h30 **Marc-André Selosse**, MNHN — Fungi-plant interactions in mycorrhiza.
- 11h – 12h30 **Laura Eme**, Université Paris-Saclay — Archaea and the origins of eukaryotes.
- 14h – 16h **Lionel Navarro**, IBENS — Small RNA-directed reprogramming of gene expression in host-bacteria interactions.

### Thursday November 16<sup>th</sup> — Heterogeneity among microbes and their hosts — room D2

- 9h – 10h30 **Giulia Manina**, Institut Pasteur — Functional significance of heterogeneity in *Mycobacterium tuberculosis*
- 11h – 12h30 **Isabelle Virlogeux-Payant**, INRAE Nouzilly — Impact of the intestinal microbiota on the low and super shedder phenotypes of chicks infected by *Salmonella*.

**Free afternoon**

### Friday November 16<sup>th</sup> — Evolution and crosstalk of human microbial communities — room D2

- 10h – 12h **Samuel Alizon**, CIRB — The vaginal microbiota in light of community ecology.
- 14h – 16h **Evaluation** — room B1

