

Microbiology University of Fribourg Switzerland





Emerging Antibiotic resistance is being recognized as a crosscutting threat to global health. Multidrug resistance is observed currently mostly in Gram-negative bacteria. One major concern for the public health nowadays corresponds to the widespread dissemination of a pathogenic *Escherichia coli* clone (named ST131) producing a broad-spectrum β-lactamase and other resistance mechanisms, making it extremely resistant to most clinically-available antibiotics. In addition, this clone possesses acquired virulence markers adding to the threat. Our project aims to decipher the successful features of that clone.

To complete the research team of **Dr. Poirel** at the **Dpt. of Medicine of the University of Fribourg** (Switzerland) (head Prof. P. Nordmann), we offer a

## PhD position in Microbiology

to work on a clinically-relevant project at the interface of genetics, biochemistry and medical microbiology. This research project is actually part of an international consortium and financed by the Swiss National Foundation.

**Your project:** You will investigate the mobilization processes of beta-lactamase genes from their natural reservoirs to their targets and contribute to elaborate an in-vitro model from which factors enhancing the spread of antibiotic resistance markers will be investigated.

**You have:** a master degree in Life Sciences or in Medicine (or equivalent) and a strong interest in studying antibiotic resistance in the context of medical microbiology, molecular microbiology and biochemistry. Priority will be given to applicants with experience in molecular microbiology.

**We offer:** You will be joining the team of the Chair of Microbiology/National Reference Center for Emerging Antibiotic Resistance at the University of Fribourg headed by Prof. P. Nordmann.

We offer a cutting-edge research project, excellent research facilities and full fundings in a 11,000 students University located in the middle of Switzerland. Working language would be either English or French.

The position is available starting July 15, 2017 (starting date debatable)

Please send your complete documentation(CV, motivation letter...) to Dr Poirel at: laurent.poirel@unifr.ch