

# Workshop of the ERC project MUSEUM : Multi- Scale Eco-Evolutionary population dynamIcs



ID de Contribution: 16

Type: Non spécifié

## Evolutionary ecology of structured populations

*vendredi 9 janvier 2026 09:15 (45 minutes)*

In natural populations, individuals may have different vital rates depending on their age, size, location, infection status, or immunity. This demographic heterogeneity has important ecological and evolutionary consequences. In evolutionary epidemiology, two important sources of heterogeneity are imperfect vaccination and infection age structure. As a result of this heterogeneity, hosts do not have the same quality for the pathogen depending on their immune or age class. In this talk I will discuss theoretical results that show how this variation in host quality can affect the evolution of pathogen life history traits (e.g. transmission, virulence...).

**Orateur:** LION, Sébastien (Centre d'écologie fonctionnelle et évolutive-Montpellier)