

A three-year postdoc position funded by the Luxembourg Research Fund is available in the Zoology Department of the National Natural History Museum, Luxembourg (MNHNL). The postdoc will work with Alain Frantz (MNHNL) and Ximo Mengual (Zoologisches Forschungsmuseum Alexander Koenig, Bonn)

#### The project

The overall objective of the proposed study is to use landscape genetic resistance modelling to analyse the functional connectivity of typical Luxembourg and Western European landscapes from the viewpoint of hoverflies (Diptera: Syrphidae). We aim to understand whether urbanisation and the structural diversity of agro-ecosystems have an impact on hoverfly dispersal and which landscape features facilitate or hinder gene flow. The approach will be conducted for four target species in three urbanised areas and two pairs of rural areas with different degrees of habitat diversity. Among other aims, we will also test whether hoverfly size and habitat specialisation may influence the impact of habitat fragmentation on the flies.

#### What we require

Applicants should have a doctorate (PhD) in natural sciences with a background in genetics, molecular ecology, entomology and/or related disciplines. Applicants should have a strong interest in landscape genetics, i.e. in the use of large genetic datasets to make inferences about effective dispersal in animals. Ideally, candidates should have experience in bioinformatics, a proven track record in entomological field work and they should not shy away from laboratory work.

The successful applicant will be responsible for collecting samples in the field, performing some laboratory work and analysing the landscape genetic data. She/he will disseminate the results of the project through presentations and scientific publications.

Applicants should have a strong interest to work in an interdisciplinary team so that excellent knowledge of English is required. A driving licence is essential.

#### What we offer

A three-year contract with a competitive salary is offered. The post-doc will be based mainly in the Zoology research group at the MNHNL in Luxembourg City. The group has recently been re-established and is a well-funded, ambitious research group. As a postdoc you will benefit from easy access to your supervisors, but are expected to take on a leadership role relative to the more junior members of the team. While the project at hand is very ambitious, the position offers the prospect of significant autonomy. Throughout the years, a large number of genetic data sets have accumulated in the department that would lend themselves to landscape genetic analyses.

The MNHNL is an equal opportunity employer and is committed to increasing the proportion of women in academics. Consequently, we actively encourage applications by women. We also welcome applications from candidates with severe disabilities. Disabled candidates with equivalent qualifications will be preferentially considered.

#### How to apply

Applications should be written in English and compiled into a single PDF file. The application should include a cover letter (including the date on which the applicants could start the

position, their motivation for this position and future research interests), curriculum vitae and copies of university degrees.

Application material should be submitted no later than 15<sup>th</sup> of December to [alain.frantz@mnhn.lu](mailto:alain.frantz@mnhn.lu). The same address can be used for informal inquiries. The (strongly) preferred starting date is 1st February 2021.