

# **CANDIDATE BRIEF**

Research Fellow in Genomics of senescence in the Seychelles warbler, Faculty of Biological Sciences



Salary: Grade 7 (£32,004 – £38,183 p.a.), due to funding limitations an appointment cannot be made above £32,004 p.a.

Reference: FBSBY1069

Closing date: 10 July 2017

Lastest start date 1 September 2017

Fixed-term for 3 years, funded through an external grant.

# Research Fellow in Genomics of senescence in the Seychelles warbler School of Biology

Are you an ambitious researcher looking for your next challenge? Do you have an established background in evolutionary genomics, quantitative genetics or a related relevant discipline?

As individuals reach older ages their bodies deteriorate - a process known as senescence. It is clear that individuals differ greatly in the age at which they start to senesce, and how quickly they then deteriorate. However, why individuals senesce so differently remains unresolved. Understanding this question is fundamentally important from an evolutionary perspective. It also has massive ramifications for human health, animal husbandry and conservation, as reducing exposure to factors that negatively impact senescence would enable individuals to live longer healthier lives

You will work on the Natural Environment Research Council funded project 'The genomics of senescence in the Seychelles warbler' which is led by Dr Hannah Dugdale (Leeds) and Professor David Richardson (East Anglia), in collaboration with Professor Terry Burke (Sheffield) and Professor Jan Komdeur (Groningen). The project uses the outstanding Seychelles warbler dataset, a major model system in the study of evolution, cooperative breeding and senescence. Crucially, this study focuses on an isolated island population, which has allowed us to follow all individuals (over many generations) throughout their lives, collect blood samples (thus allowing individual genetic characteristics and intrinsic biomarkers to be measured) and measure concurrent environmental conditions, social experiences and individual characteristics.

You will oversee the collation of genomic data and the quantitative genetic analysis of senescence. You will quantify the overall relative impact of environmental, social, transgenerational and genetic factors, across the genome, on when and how quickly individuals deteriorate with age. There will be an opportunity to get involved in the other components of the wider Seychelles warbler project, including fieldwork.



You will have a PhD in evolutionary genomics, quantitative genetics or a closely allied discipline along with experience in generating and analysing data using bioinformatics, quantitative genetics and statistical skills in R.

### What does the role entail?

As a Research Fellow your main duties will include:

- Designing, planning and conducting a programme of investigation, in consultation with Dr Hannah Dugdale;
- Generating independent and original research ideas and methods in evolutionary genomics with an aim to extend the Seychelles warbler research portfolio;
- Making a significant contribution to the dissemination of research results by publication in leading peer-reviewed journals, and by presentation at national and international meetings;
- Working independently and as part of a larger team of researchers, both internally and externally to develop new research links and collaborations and engage in knowledge transfer activities where appropriate;
- Contributing to the supervision of junior researchers and PhD students and acting as a mentor to less experienced colleagues;
- Evaluating methods and techniques used and results obtained by other researchers and relating such evaluations to your own research;
- Contributing to, and encouraging, a safe working environment.

These duties provide a framework for the role and should not be regarded as a definitive list. Other reasonable duties may be required consistent with the grade of the post.

## What will you bring to the role?

As a Research Fellow you will have:

- A PhD (or close to completion) in evolutionary genomics, quantitative genetics or a closely allied discipline;
- Experience in generating and analysing data using bioinformatics, quantitative genetics and statistical skills in R;
- Strong analytical skills, with the ability to work accurately and carefully, designing, executing and writing up research independently;



- A developing track record of peer reviewed publications in international journals;
- Excellent communication skills, both written and verbal and the ability to communicate your research at national and international conferences;
- The ability to work well both independently and as part of a team;
- A strong initiative and a pro-active approach, with excellent organisational, planning and self-management skills, including the ability to prioritise workloads to meet deadlines/demand and deliver high quality under pressure.

#### You may also have:

- Experience in extracting and analysing data from long-term study systems e.g. using MS Access;
- Evidence of perusing external funding to support research.

# How to apply

You can apply for this role online; more guidance can be found on our <u>How to Apply</u> information page. Applications should be submitted by **23.59** (UK time) on the advertised <u>closing date</u>.

Your application should include:

- A supporting statement providing evidence to support each requirement listed on the 'What will you bring to the role' section of the Candidate Brief (no more than two sides of A4, minimum font size 11);
- An academic curriculum vitae, including a list of your publications.

## **Contact information**

To explore the post further or for any queries you may have, please contact:

## Hannah Dugdale, Lecturer in Conservation Biology

Tel: +44 (0)113 343 5598 Email: <u>h.dugdale@leeds.ac.uk</u>

## Additional information

Find out more about the Faculty of Biological Sciences.



Find out more about the **School of Biology**.

#### Working at Leeds

Find out more about the benefits of working at the University and what it is like to live and work in the Leeds area on our Working at Leeds information page.

#### A diverse workforce

The Faculty of Biological Sciences is proud to have been awarded the Athena SWAN Bronze Award from the Equality Challenge Unit, the national body that promotes equality in the higher education sector. Our equality and inclusion webpage provides more information.

#### Candidates with disabilities

Information for candidates with disabilities, impairments or health conditions, including requesting alternative formats, can be found on our <u>Accessibility</u> information page or by getting in touch with us at <u>disclosure@leeds.ac.uk.</u>

## **Criminal record information**

#### Rehabilitation of Offenders Act 1974

A criminal record check is not required for this position. However, all applicants will be required to declare if they have any 'unspent' criminal offences, including those pending.

Any offer of appointment will be in accordance with our Criminal Records policy. You can find out more about required checks and declarations in our <u>Criminal Records</u> information page.

