



## **UNIVERSITY OF NAIROBI EXTERNAL JOB VACANCIES (PROJECT POSITION)**

Applications are invited for the following position:

**PHD FELLOW (QUANTITATIVE GENETICS OF BLACK SOLDIER FLY), FLYGENE PROJECT IN DEPARTMENT OF ANIMAL PRODUCTION, FACULTY OF VETERINARY MEDICINE, AD/9/193/23 - 1 POST**

### **The Project**

The University of Nairobi, in collaboration with Aarhus University's Center for Quantitative Genetics and Genomics (AU-QGG), the International Centre of Insect Physiology and Ecology (ICIPE), Jomo Kenyatta University of Agriculture and Technology (JKUAT), and Makerere University (MU), has received funding from the DANIDA Fellowship Centre (DFC) for a project on sustainable and efficient insect production for livestock feed through selective breeding (FLYgene). The project aims to improve the quantity and quality of Black Soldier Fly products through selective breeding in Kenya and Uganda. It will generate new knowledge in Black Soldier Fly (BSF) genetics, genomics, and phenomics for designing sustainable breeding programs in Kenya and Uganda. The project will bring together a multi-disciplinary team of entomologists, geneticists, bioinformaticians, electronic and computer engineers, and nutritionists to investigate innovative BSF phenotyping and family identification systems before establishing a breeding program. The project results are expected to lead to job creation opportunities and climate-friendly bio-waste management in a circular bioeconomy and cover several UN Sustainable Development Goals. To successfully implement the assignment, the Project seeks to competitively fill the following position.

### **The position**

Reporting to the Project teams at the University of Nairobi, AU-QGG, ICIPE, JKUAT, and MU, the position entails carrying out quantitative genetics' tasks in the FLYgene project. The PhD fellowship will focus on genetic parameters estimation for prioritized Black Soldier Fly (BSF) traits with the goal of implementing selective breeding programs in Kenya and Uganda. It also involves recording of phenotypes in founder BSF populations, estimation of genetic parameters, and developing breeding value prediction models.

### **Location**

This is a full-time position based in Nairobi. The PhD position will be primarily based at the University of Nairobi (UoN), Kenya, with a minimum of one year research stay at Aarhus University (AU), Center for Quantitative Genetics and Genomics (AU-QGG), Denmark, with a possibility of double-degree arrangement (AU-UoN) depending on availability of additional funding.

## **Job specifications**

- i) Have an MSc. in Animal Breeding and Genetics or an equivalent degree recognized by the UoN Senate.
- ii) Have solid knowledge of quantitative genetics, statistics, and animal breeding.
- iii) Have a good publication record, commensurate with their research experience.
- iv) Having prior research experience on BSF would be an added advantage.
- v) Be available to start working on as soon as possible.

## **Duties and Responsibilities**

Conduct high-quality research leading to practical impact and publications in high-impact journals (must be ready to work towards publishing a minimum of one quality paper per year).

Contribute to research capacity building, including the training of undergraduate and MSc students in the Principal Investigator's (PI) Department.

## **Key skills/ experience required include:**

Have good skills in scientific programming, at ease with Linux and the R language and other software such as DMU or ASREML.

## **Personal attributes:**

- i) Strong analytical, organizational and communication (in English, both oral and written) skills.
- ii) Highly motivated and independent with strong research skills and the ability to work effectively as part of a team.
- iii) Be a person of integrity and have an eye for details.

## **Terms of appointment**

The appointment is for one year and is renewable based on satisfactory performance, mutual agreement, and the availability of funds.

## **Tenure**

The PhD Fellowship is for a period of thirty-six (36) months.

## **Salary and benefits**

The position offers an attractive salary in addition to professional and personal development for the duration of the project.

## **NOTES**

1. Applicants should email their application letters, certified copies of certificates and curriculum vitae (CV) giving details of their qualifications, experience and three (3) referees indicating their telephone contacts and e-mail contacts;
2. Applications and related documents should be forwarded addressed to the Director, Human Resource, University of Nairobi;
3. A PhD concept aligning with the research theme. The concept should include a background, possible research questions/hypotheses, objectives and a proposed technical approach (Maximum 3 pages-- including bibliography, font size 12pt, margin 1-inch, single line spacing);
4. The application letter must bear the reference code indicated in the advertisement;
5. Late applications will not be considered and
6. Applications should be emailed as one file in PDF: [recruit-pfflydoap@uonbi.ac.ke](mailto:recruit-pfflydoap@uonbi.ac.ke)

**CLOSING DATE: THURSDAY, OCTOBER 5, 2023**

**THE UNIVERSITY OF NAIROBI IS AN EQUAL OPPORTUNITY EMPLOYER.  
ONLY SHORTLISTED APPLICANTS WILL BE CONTACTED.**