



UNIVERSITY OF LEEDS

CANDIDATE BRIEF

Research Fellow in Wheat Root Growth Angle Control, Faculty of Biological Sciences



Salary: Grade 7 (£33,199 – £39,609 p.a.) Due to funding limitations it is unlikely an appointment will be made above £34,189.

Reference: FBSBY1108

Closing date: 15 July 2019

Fixed-term for 8 months

We will consider job share/flexible working arrangements

Research Fellow in Wheat Root Growth Angle Control

School of Biology

Are you an ambitious researcher looking for your next challenge? Do you have an established background in plant gravitropism research? Do you want to further your career in one of the UKs leading research intensive Universities?

You will work on a BBSRC funded project to perform genome editing and phenotyping of root growth angle traits in cereal crop plants in collaboration with the John Innes Centre. The optimisation of root system architecture is a critical component of maximising resource capture efficiency in crop species. Previous research in the Kepinski lab has identified a method of inducing dramatically more vertical root growth angles, a highly desirable trait. The project will use CRISPR-Cas9-based gene editing and conventional molecular biology techniques to demonstrate the new technology in wheat.

You will have a PhD (or be close to completion) in plant molecular biology, experience in working with cereal crop root systems and the propagation and analysis of transgenic wheat lines. Previous experience in analysis of gravitropic setpoint angle biology is also essential.

The University of Leeds and the Faculty of Biological Sciences are committed to providing equal opportunities for all and offer a range of family friendly policies. The University is a charter member of Athena SWAN (the national body that promotes gender equality in higher education), and the Faculty of Biological Sciences was reawarded a Bronze award in 2017. We are proud to be an inclusive Faculty that values all staff, and are happy to consider job share applications and requests for flexible working arrangements from our employees. Our Athena SWAN [webpage](#) provides more information.

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. Stefan Kepinski](#);



- Generating independent and original research ideas and methods in wheat genome editing and lateral branch growth angle control with an aim to extend the Kepinski group 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;
- To contribute to, and to encourage, 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 plant molecular biology or a closely allied discipline;
- Experience in quantitative GSA analysis in wheat (cereal) species;
- Experience in microgravity-based research and/or the use of clinostats;
- Experience in analysis of gravitropic setpoint angle biology;
- Strong molecular biology skills with experience in cloning, site directed mutagenesis and real time quantitative PCR;
- Experience in the generation of transgenic plant lines;
- Experience in the propagation of wheat transgenic lines;
- A developing track record of peer reviewed publications in international journals;
- Strong analytical skills, with the ability to work accurately and carefully, designing, executing and writing up research independently;
- Excellent communication skills, both written and verbal and the ability to communicate your research at national and international conferences;



- 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;
- A strong commitment to your own continuous professional development.

You may also have:

- Experience in time lapse (kinematic) imaging and image analysis using appropriate software packages;
- Evidence of pursuing external funding to support research.
- Experience of engagement with potential licensees for commercialisation of technology

How to apply

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

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:

[Dr Stefan Kepinski](#)

Tel: +44 (0)113 343 2865

Email: S.Kepinski@leeds.ac.uk

Additional information

Find out more about the [Faculty of Biological Sciences](#) and the [School of Biology](#)



Find out more about research in the [Kepinski Group](#)

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.

Candidates with disabilities

Information for candidates with disabilities, impairments or health conditions, including requesting alternative formats, can be found on our [Accessibility](#) information page or by getting in touch with us at disclosure@leeds.ac.uk.

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 [Criminal Records](#) information page.

