

Position Description

College/Division:	ANU College of Science
Faculty/School/Centre:	Research School of Biology
Department/Unit:	Plant Sciences Division
Position Title:	Postdoctoral Fellow
Classification:	Level A
Position No:	
Responsible to:	Prof. David Jones
Number of positions that report to this role:	
Delegation(s) Assigned:	

PURPOSE STATEMENT:

The ANU Research School of Biology (RSB) carries out research in a wide range of biological and biomedical sciences. The education program is 'research-led' and features teaching contributions from leading scientists from a wide range of biological and biomedical discipline

The Postdoctoral Fellow will be expected to undertake work in all three areas of academic activity –research, education and service (including outreach). The allocation of time to each area will be discussed with the position supervisor annually and be reflective of the ARC funding conditions that support the appointment, the appointees' research agenda, school and interdisciplinary teaching requirements and leadership opportunities within the School environment. The Postdoctoral Fellow will be required to supervise or assist in the supervision of students, and contribute cooperatively to the overall intellectual life of the School, College and University.

POSITION DIMENSION AND RELATIONSHIPS:

The Postdoctoral Fellow will be a member of the Plant Sciences Division, Research School of Biology, accountable to Professor David Jones. The Postdoctoral Fellow will be expected to work collegially, leading by example to develop and maintain effective, productive and beneficial workplace relationships with all academic and professional School and College staff, students and honorary appointees.

The Plant-Fungal Interaction laboratory at ANU has two ARC-funded two and half (2.5) year Postdoctoral positions available to understand the molecular interaction between plants and pathogenic fungi through functional analysis of effector proteins involved in fungal pathogenicity and receptor proteins involved in plant disease resistance. One position will focus on plant-Fusarium wilt fungus interactions, using the tomato-Fusarium oxysporum pathosystem to study apoplastic effectors and plant cell surface receptors, The other position will focus on plant-rust fungus interactions, using the flax-Melampsora lini pathosystem to study cytosolic effectors. Both positions will involve collaboration with the Plant Structural Immunology laboratory led by Dr Simon Williams and the rust fungus position will also involve collaboration with Dr Peter Dodds, CSIRO Agriculture and Food.

These positions will also have a role for mentoring students and will engage in collegial and productive collaborations with local, national and where possible, international colleagues.

Role Statement:

In their role as Level A Academics the Postdoctoral Fellow will be expected to:

- 1. Undertake independent research in the area of molecular plant-fungal interactions with a view to publishing original and innovative results in refereed journals, present research at academic seminars and at national and international conferences, and collaborate with other researchers at a national level. This includes working as part of a team on an ARC-funded project subject to milestones.
- 2. Collaborate with senior staff to actively seek and secure external funding, assist to prepare and submit research proposals to external funding bodies as appropriate.
- 3. Subject to the requirements of the ARC / funding source and where an opportunity exists, contribute to the teaching activities of the School at the undergraduate and graduate levels. This includes, but is not limited to, the preparation and delivery of lectures and tutorials, the preparation of online material, marking and assessment, consultations, and with students or acting as subject coordinators.

- 4. Supervise students working on individual or group projects at undergraduate, honours, graduate-coursework levels. Assist with supervision of research students.
- 5. Assist in the supervision of research support staff in their research area.
- 6. Actively contribute to the operation of the School.
- 7. Assist in outreach activities including to prospective students, research institutes, industry, government, the media and the general public.
- 8. Maintain high academic standards in all education, research and administration endeavours.
- 9. Take responsibility for their own workplace health and safety and not wilfully place at risk the health and safety of another person in the workplace.
- 10. Have a demonstrated understanding of equal opportunity principles and policies and a commitment to their application in a university context.
- 11. Undertake other duties as required that are consistent with the classification of the position.

Skill Base

A Level A academic will work with the support and guidance from more senior academic staff and is expected to develop their expertise in research and teaching with an increasing degree of autonomy. A Level A academic will normally have completed four years of tertiary study or equivalent qualifications and experience and may be required to hold a relevant higher degree.

A Level A academic will normally engage in scholarly, research and/or professional activities appropriate to their profession or discipline, contribute to undergraduate teaching at the institution, at a level appropriate to the skills and experience of the staff member, and undertake administration primarily relating to their activities at the institution.

SELECTION CRITERIA:

- 1. A PhD (or awarding of a PhD within six months of appointment commencement) in plant-microbe interactions, or equivalent qualifications and experience in a related area, with a track record of independent research as evidenced by publications in peer-reviewed journals and conferences.
- 2. Evidence of experience in some or all of the following areas: plant molecular biology including plant transformation, protein biochemistry and protein-protein interaction techniques. Specific research experience in CRISPR/Cas9 genome editing, RNA seq analysis, fungal transformation, sub-cellular localisation or yeast two-hybrid analysis would be an advantage but is not essential.
- 3. An ability and commitment to contribute to bids for competitive external funding to support individual and collaborative research activities.
- 4. Evidence of an ability and willingness to teach at all levels.
- 5. The ability to assist in the supervision of students working on research projects.
- 6. The ability to work as part of a team and to meet deadlines.
- 7. Excellent oral and written English language skills and a demonstrated ability to communicate and interact effectively with a variety of staff and students in a cross-disciplinary academic environment and to foster respectful and productive working relationships with staff, students and colleagues at all levels.
- 8. A demonstrated understanding of equal opportunity principles and policies and a commitment to their application in a university context.

Delegate Signature:	Date:
Printed Name:	Position:

References:	
Academic Minimum Standards	