



THE POST

College:	College of Engineering, Mathematics and Physical Sciences http://emps.exeter.ac.uk/
Post:	Postdoctoral Research Associate / Postdoctoral Research Fellow
Reference No:	P55841
Grade:	E / F
HERA:	ARF / RFEL
Reporting To:	Prof. Sean Matt

The above full time post is available to start between April and October, 2017, for a duration of 36 months, in the College of Engineering, Mathematics and Physical Sciences.

Job Description

Main purpose of the job:

The post-holder will carry out original research on the theory of the formation of sun-like and low-mass stars, advancing the goals of the ERC Consolidator Grant project AWESoMeStars, in collaboration with the PI and other research group members. In particular, the post-holder will be expected to create and use multi-dimensional MHD simulations to study the magnetic interactions of these stars with their accretion disks and environments, calculate angular momentum exchange, and carry out comparisons with observations.

POSTDOCTORAL RESEARCH ASSOCIATE

Main duties and accountabilities:

1. To undertake research as appropriate to the field of study including:
 - Writing up research work for publication;
 - Developing research objectives and proposals for own or joint research;
 - Making presentations at national and international conferences and similar events;
 - Dealing with problems which may affect the achievement of research objectives and deadlines;
 - Analysing and interpreting the results of own research and generating original ideas based on outcomes;
 - Using new research techniques and methods;
 - Using initiative and creativity to identify areas for research, developing new research methods and extending the research portfolio;
 - Using creativity to analyse and interpret research data and draw conclusions on the outcomes.
2. To contribute to teaching and to be involved in the assessment of student knowledge including assisting in the supervision of student projects and in the development of student research skills.
3. To work in collaboration with colleagues as appropriate to the field of study including:
 - Contributing to collaborative decision making within the research group;
 - Contributing to the production of collaborative research reports and publications.
 - Preparing papers and presenting information on research progress and outcomes to bodies supervising research, e.g. steering groups.

4. To communicate complex information, orally, in writing and electronically.
5. To prepare proposals and applications to external bodies, e.g. for funding and contractual purposes
6. To contribute to the planning of research projects.
7. To use research resources, laboratories and workshops as appropriate and to take responsibility for reducing hazards and for the health and safety of others. Where appropriate, will also be responsible for conducting risk assessments.
8. To monitor research budgets as appropriate.
9. To engage in continuous professional development and to be responsible for continually updating knowledge and understanding in field of study or specialism and for developing skills.

This job description summarises the main duties and accountabilities of the post and is not comprehensive: the post-holder may be required to undertake other duties of similar level and responsibility. Please visit the Human Resources website to view the Research Fellow role profiles.

Person Specification - POSTDOCTORAL RESEARCH ASSOCIATE

Competency	Essential	Desirable
Attainments/Qualifications	PhD (or nearing completion) or equivalent qualification/experience in a related field of study.	
Skills and Understanding	Sufficient knowledge in the discipline and of research methods and techniques to work within established research programmes.	<p>Expertise in MHD, multi-dimensional computational astrophysics, accretion disks, star-disk interaction, stellar and disk winds, low-mass stars, star formation, and/or stellar angular momentum.</p> <p>Evidence of research activity and published research.</p>
Prior Experience	Understanding of health and safety legislation.	<p>Experience in computational and/or theoretical MHD, working on star formation, accretion, outflows, or stellar rotation.</p> <p>Experience of undergraduate teaching.</p>
Behavioural Characteristics	<p>Excellent written and verbal communication skills.</p> <p>Able to communicate material of a specialist or highly technical nature.</p> <p>Able to manage research and administrative activities and to balance the competing pressures of research and administrative demands and deadlines.</p> <p>Able to liaise with colleagues and students.</p> <p>Able to build contacts and participate in internal and external networks for the exchange of information and collaboration.</p> <p>Able to identify potential sources of funding.</p> <p>Actively participate as a member of a research team.</p> <p>Engage in continuous professional development.</p> <p>Understand equal opportunity issues as they may impact on areas of research content.</p> <p>Where appropriate to the role, willingness to undergo training in order to conduct risk assessments.</p>	
Circumstances	Willing to work flexibly to achieve project demands.	

POSTDOCTORAL RESEARCH FELLOW

Main duties and accountabilities:

1. To undertake research as appropriate to the field of study. The responsibilities may include all or some of the following:
 - Acting as principal investigator on research projects;
 - Developing research objectives, projects and proposals;
 - Conducting individual or collaborative research projects;
 - Identifying sources of funding and contributing to the process of securing funds;
 - Extending, transforming and applying knowledge acquired from scholarship to research and appropriate external activities;
 - Writing or contributing to publications or disseminating research findings using media appropriate to the discipline;
 - Making presentations at conferences or exhibiting work in other appropriate events;
 - Assessing, interpreting and evaluating outcomes of research;
 - Developing new concepts and ideas to extend intellectual understanding;
 - Resolving problems of meeting research objectives and deadlines;
 - Developing ideas for generating income and promoting research area;
 - Developing ideas for application of research outcomes;
 - Deciding on / following research programmes and methodologies, often in collaboration with colleagues and sometimes subject to the approval of the head of the research programme on fundamental issues.
2. To contribute to teaching and learning programmes in the School and to supervise postgraduate research students.
3. To act as research team leader including:
 - Mentoring colleagues with less experience and advising on their professional development;
 - Coaching and supporting colleagues in developing their research techniques;
 - Supervising the work of others, for example in research teams or projects;
 - Developing productive working relationships with other members of staff;
 - Co-ordinating the work of colleagues to ensure equitable access to resources and facilities;
 - Dealing with standard problems and help colleagues to resolve their concerns about progress in research.
4. To routinely communicate complex and conceptual ideas to those with limited knowledge as well as to peers using high level skills and a range of media and to present the results of scientific research to sponsors and at conferences.
5. As determined by the nature of the project and at the direction of the PI, to plan, co-ordinate and implement research programme activity including:
 - Managing the use of research resources and ensure that effective use is made of them;
 - Monitoring and reporting on the use of research budgets;
 - Helping to plan and implement commercial and consultancy activities;
 - Where appropriate, to plan and manage own consultancy assignments.

This job description summarises the main duties and accountabilities of the post and is not comprehensive: the post-holder may be required to undertake other duties of similar level and responsibility. Please visit the Human Resources website to view the Research Fellow role profiles.

Person Specification - POSTDOCTORAL RESEARCH FELLOW

Competency	Essential	Desirable
Attainments/Qualifications	PhD or equivalent qualification/experience in a related field of study.	Be a nationally recognised authority in the subject area.
Skills and Understanding	Possess sufficient specialist knowledge in the discipline to develop/follow research programmes and methodologies. Record of research output in high quality publications.	Expertise in MHD, multi-dimensional computational astrophysics, accretion disks, star-disk interaction, stellar and disk winds, low-mass stars, star formation, and/or stellar angular momentum.
Prior Experience	Experience of managing research projects and research teams.	Experience in computational and/or theoretical MHD, working on star formation, accretion, outflows, or stellar rotation. Experience of undergraduate /postgraduate teaching and supervision. Experience of acting as principal investigator on research projects.
Behavioural Characteristics	Excellent written and verbal communication skills. Able to communicate complex and conceptual ideas to a range of groups. Evidence of the ability to collaborate actively within the Institution and externally to complete research projects and advance thinking. Able to participate in and develop external networks. Able to balance the pressures of research, administrative demands and competing deadlines.	Able to identify sources of funding, generate income, obtain consultancy projects, or build relationships for future activities.

Informal Enquiries

Before submitting an application you may wish to discuss the post further by contacting Prof. Sean Matt, telephone +44 (0) 1392 726611 or email s.matt@exeter.ac.uk

Additional Information Relating to the Post

Salary

Candidates should demonstrate their achievement against the relevant criteria in the accompanying person specifications which will be used to make an appointment at an appropriate level.

Starting salaries at the appropriate grade are: Postdoctoral Research Associate on Grade E from £28,452 - £32,958 per annum. Postdoctoral Research Fellow on Grade F from £33,943 - £38,183 per annum.

An increment will be payable on 1 August each year until the top of the scale is reached (subject to being in post for 6 months and satisfactory performance). The scale will be subject to a cost of living review each year.

Hours of work

Full time appointments are contracted to work a 36.5 hour week, over five days, to suit the requirements of the College, as notified by the College Dean. The hours of part-time staff are specified in the letter of appointment.

Annual Leave

The annual leave entitlement for full-time appointments is 41 days per calendar year (pro rata for part-time appointments). For further information see our website <http://www.admin.ex.ac.uk/personnel/leave.shtml>.

Probationary Period

The appointment will normally be subject to a probationary period of one year.

References & Medical Clearance

All appointments are subject to satisfactory reference and medical checks and individuals will be required to complete a medical assessment form before appointment is confirmed. Applicants should note that the University normally contacts referees for short-listed applicants without further advice to applicants. When advising of referees, if they are resident overseas, please ensure you supply fax numbers and/or email addresses enabling us to contact them (if necessary) without delay.

Right to Work in the United Kingdom

We welcome all applicants and the diversity they bring. However, the nature of this role, the salary and the qualifications required, mean that immigration legislation will not allow the University to apply for a sponsorship certificate for this post. We strongly recommend that applicants that are non EEA nationals consult the Right to Work rules on the Home Office website at: www.ukba.homeoffice.gov.uk.

In particular you are encouraged to undertake a self assessment of your eligibility to work in the UK using the link to www.ukba.homeoffice.gov.uk/pointscalculator.

Terms & Conditions

The Terms and Conditions of Employment can be viewed on line by visiting <http://www.exeter.ac.uk/staff/employment/conditions/terms/>

Pensions

Membership of the Universities' Superannuation Scheme (USS) is automatic provided that you meet the qualifying criteria for membership. For details on the scheme please go to the <https://forthefuture.uss.co.uk>. Staff automatically become members and employee contributions will be taken from your pay unless you opt out in accordance with the current rules of the scheme. More information about the USS scheme can be found at www.uss.co.uk/members. The University, as your employer, contributes such sums as will be required to maintain the full benefits of the scheme. You may opt out of the scheme and if you wish to do so, you should contact the Pensions and Reward Advisor, Mrs Alison Rose (01392 723088/email a.j.rose@exeter.ac.uk) for further information.

Relocation

You may be able to claim relocation expenses in accordance with the University's Relocation Assistance Scheme. The maximum allowance that you can reclaim under the Relocation Assistance Scheme, if eligible, is 10% of salary.

Short-listing Information

We will acknowledge your application by email. The University of Exeter recognises the time and effort taken to apply for a position and will contact you by email to inform you of results of shortlisting

Application Procedure and Interview Information

The closing date for applications is **Wednesday 1 March 2017**.

Data Protection Act (1998)

The information contained within your application is being requested to enable the University to make employment decisions and meet statutory obligations. Any information provided to the University in this context will be treated confidentially and used only by manager(s), member of the University, Human Resources, Superannuation and Payroll during the course of your employment. Where the application relates to a post which is externally funded this information may be passed onto the relevant funding body.