

THE POST

College /Service: Engineering, Mathematics and Physical Sciences - <http://emps.exeter.ac.uk/>
Camborne School of Mines, Tremough Campus

Post: Experimental Officer (Electron-Beam Techniques) & Technical Team Leader

Reference No: R11073

Grade: F

Reporting To: Assistant College Manager (Infrastructure & Technical Services)

The above full-time permanent post is available immediately in the Engineering, Mathematics and Physical Sciences.

Job Description

Main purpose of the job:

The post holder will support research and teaching activities in the area of responsible mining, sustainable use of natural resources and renewable energy at Camborne School of Mines (CSM). The post holder will carry out research activities, support grant and income generation and provide teaching support to undergraduate students within the analytical lab in the area of electron-beam analysis. The post holder will be the technical team lead for the analytical labs.

Main duties and accountabilities:

1. Manage the CSM Analytical laboratory/equipment area and staff including:
 - i) Data processing, validation and analysis
 - ii) Quality assurance and control
 - iii) Line management and personnel administration
 - iv) Day to day monitoring of staff activities and management of workloads
 - v) Conduct of staff interviews and personnel development
 - vi) Health and safety
 - vii) Sourcing and ordering approved capital equipment
 - viii) Ensuring routine repair and maintenance of equipment
 - ix) Organisation of formal lab visits
 - x) Liaison with Campus Services on maintenance issues.

2. Personally maintain and operate the electron-beam analytical instruments including:
 - i) Operate and provide technical advice on JEOL JXA 8200 electron microprobe and JEOL JSM 5600LV low-vacuum scanning electron microscope actively solving any problems that may arise from research and/or experiments
 - ii) Carry out basic mechanical, electronic and software maintenance
 - iii) Conduct calibration, testing and fault finding

3. To work with academic staff on research topics including geology, mineralogy, minerals engineering, mining and renewable energy, and to identify grant and other income opportunities to include contributing to grant applications and tender bids.

4. To manage own research outputs on grants where the post holder is name and/or charged to, working within specific research and academic parameters ensuring that budgets are tracked and managed appropriately.
5. To cost, in line with University Regulations, consultancy work and complete this work to the required standard, ensuring that IPR and research outputs are exploited appropriately.
6. To meet new and existing clients of Camborne School of Mines to discuss and plan their projects and to recommend, advise and specify the most suitable research, technology and methods to meet their aims and objectives.
7. To provide design and technical advice for research projects and equipment used in electron microscopy and analysis, engaging with users to design and develop analytical protocols and experiments for use in research projects.
8. Conduct original research at national level independently or collaboratively with academic staff on research topics including geology, mineralogy, minerals engineering, mining and renewable energy leading to peer review publications in journals agreed by the College's Director of Research.
9. Plan, design, teach and supervise electron beam techniques and use of equipment to undergraduate and postgraduate students to ensure that students are competent in using specialised experimental techniques in an academic environment.
10. Provide undergraduate and postgraduate teaching support to include; delivering specified modules, marking, supporting student project work and providing demonstrations and workshops for student teaching.
11. Participate in internal and external committees and networks such as learned societies and user groups and College committees such as Health and Safety.

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.

Person Specification

Competency	Essential	Desirable
Attainments/Qualifications	Degree in mineralogy, petrology, geochemistry, analytical chemistry or related subject, or a minimum of 3 years' experience of working in a similar post at an equivalent level within HE	PhD or 5 years equivalent research experience
Skills and Understanding	Proven track record of strong team leadership	Experience of leadership in a laboratory team environment
Prior Experience	Possess in-depth understanding of own specialism to enable the development of new knowledge and understanding within the field i.e. Substantial experience of electron beam analytical techniques	Experience with JEOL microprobes Experience of automated mineralogy e.g. QEMSCAN; XRD; XRF; ICP-MS
Behavioural Characteristics	The ability to design and construct complex experimental procedures and protocols	
Circumstances	Proven scientific data collection and processing skills	

Informal Enquiries

Before submitting an application you may wish to discuss the post further by contacting Sam Livy, Assistant College Manager for Infrastructure and Technical Services, e-mail S.A.Livy@exeter.ac.uk or telephone (01392) 724477.

Additional Information Relating to the Post

Salary

The starting salary will be from £31,948 up to £39,257 on Grade F, depending on qualifications and experience.

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

Hours of work will be 36.5 hours per week (full-time) but staff at this level may be required to work additional hours to meet the requirements of the role.

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.

Appraisals

In line with best practice your appraisal will be carried out by the University with input from your Trust.

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

If you do not have the right to work in the UK, this appointment will be subject to the University successfully obtaining a Certificate of Sponsorship under the UK's Points Based System for migrant workers and to you obtaining Entry Clearance/Leave to Remain.

For further information, see the links to the UK Border Agency and UK Visas websites at <http://www.exeter.ac.uk/working/new/international/>. 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.

The USS is a contracted-out scheme and with effect from 01/10/2011 will have two benefit sections. To find out more about the structure of the scheme and which section is applicable for you please visit the USS web site at www.uss.co.uk and read the information for new entrants.

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; if you wish to do so, you should contact the Pensions Manager, Mrs Alison Rose (01392 263088/email a.j.rose@exeter.ac.uk) for further information and to complete the necessary documentation.

The University now operates a Pension Salary Exchange scheme. Under the rules of the scheme, new employees who become members of the pension scheme become eligible to participate in Pension Salary Exchange after three full calendar months of employment. You will automatically participate in the Pension Salary Exchange scheme from the 1st of the month following this date. However, you also have the right to opt-out of Pension Salary Exchange at any time up to the completion of three full calendar months of employment. In the event that you do not wish to participate in Pension Salary Exchange, you should request an opt-out form by contacting the Pensions Office on extension 3088 (or email a.j.rose@exeter.ac.uk).

Further information about Pension Salary Exchange is available from the Human Resources website www.admin.exeter.ac.uk/personnel or from the Pensions Office.

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 completed applications is **15th April 2012**.

Applicants are invited to apply on-line via our e-recruitment system. This can be found at www.exeter.ac.uk/jobs . Please quote reference number **R11073** in any correspondence.

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.