

Job Description

Job Title: Scientist: metallurgy (12 month fixed term contract)

Reports to: Susan La Niece

Department: CSR

Grade: C3C

Main purpose of Job:

To undertake scientific examination of museum objects for their identification, provenance or technological investigation, and to understand their deterioration and conservation, using a range of analytical techniques, including x-radiography. The role will focus on the scientific examination and analysis of metals and studies into metallurgy within the British Museum collection, including research into the raw materials, identification, provenancing, technology, authentication and deterioration mechanisms of metallic artefacts. The role will also help support the Museum's commitments to the Treasure process and the Portable Antiquities Scheme.

Key Responsibilities:

- To provide specialist scientific expertise (in response to conservation and curatorial enquiry) in the characterization of metals, including raw materials and technology, using a variety of techniques such as metallographic microscopy, SEM-EDX, X-radiography and XRF
- To be a member of multi-disciplinary project teams (curators, conservators and scientists) investigating the technology, deterioration, storage and conservation of museum objects, predominantly focusing on metal objects
- To be involved in the delivery of Museum-wide projects such as exhibitions, preparation of catalogues and excavation reports
- Undertake (after training) routine X-radiographic analysis of objects
- To assist in the interpretation of data obtained and to document and report the results obtained and disseminate results to a range of audiences as appropriate
- To initiate new projects within the Museum and CDS research strategies and participate in the development of research collaborations with external museum and HE partners
- To participate in outreach activities and to contribute to in-house lecture programmes
- To work within the health and safety requirements for all activities, including production of COSHH and risk assessments

What are the main work pressures and challenges?

- Undertaking analytical work and research to a tight deadline as that will benefit the knowledge and conservation of BM collections
- Responsibility for accurate, quantitative data production and initial interpretation, documentation and archiving, for timely delivery of written reports, input into publications and quality lecturing
- Working within multidisciplinary teams across the Museum, establishing good working relationships with scientific, conservation and curatorial staff
- Providing scientific support as required
- Dealing with the demands of working in a small team with a heavy work load

Key Dimensions [e.g. number of staff directly managed, budget responsibilities, specific authority levels, types of decisions taken etc]:

- Responsible for using appropriate analytical techniques and the accurate interpretation and dissemination of analytical and experimental results and assisting with the running and maintenance of the Department's analytical facilities
- Responsible for management, archiving and reporting all data
- Responsible for managing and delivering specified projects within time and resource allocations
- No staff management or budget responsibilities

What are the performance targets or standards?

- Delivery of analytical results and research which impacts directly on the curation, preservation and conservation of the collection
- Delivery of reports, publications and lectures that disseminate this work both in the wider archaeometric, conservation, museum and related science community and to the public
- Enhancing the standing and reputation of science in the British Museum and more widely

What changes are likely to occur in the next two years to this job?

N/A

Who are the main contacts of the jobholder and what are the relationships to these contacts [e.g. managing, influencing, advising]?

- Line Manager – direct management role: influencing, advising & taking advice from on a day-to-day basis
- Other scientists – influencing, informing and advising (both ways)
- Conservators and curators – influencing, informing and advising (both ways)
- CSR senior management team – influencing, taking advice from and advising
- Colleagues from other Museums and HE partners – collaborative research and keeping abreast of developments in the sector
- Public – engaging with and informing the Museum's visitors

Person Specification

	Essential	Desirable
Education – levels & subjects	Degree or Masters in chemistry, archaeological science, materials science, metallurgy or a related science-based subject	Further degree in a relevant specialism
Other qualifications		Additional qualification (any level) in science, conservation or archaeology
Specific technical/ professional skills & experience	<p>Experience in application and use of a range of analytical techniques including XRF and ideally including experience with some of the following: SEM-EDX, specific gravity measurements, digital X-radiography, (metallographic) microscopy techniques, XRD, Raman or FTIR spectroscopy and/or ICP-AES and associated sample preparation</p> <p>IT literacy including familiarity with using databases</p>	Track record of analytical research into the technology and/or deterioration/conservation of museum or archaeological objects in a museum, university or other archaeometric context
Work experience, likely former jobs	Experience in a research and/or analytical laboratory environment, e.g. in university or museum or industry	Experience of working in a laboratory in a museum or an institution which has a reputation for investigation of museum or archaeological materials and particularly in the study of metals from artefacts or archaeological contexts
Specific managerial skills	<p>Experience of problem solving</p> <p>An ability to work independently, to self-manage and to work to deadlines</p> <p>Good organisational skills with the ability to pay close attention to detail</p> <p>Project management experience</p>	<p>Training and/or supervisory experience</p> <p>Experience in the design and execution of research projects</p>

Specific interpersonal skills	<p>Good communication skills (verbal and written English)</p> <p>Strong team working ability</p>	
Publications record (if appropriate)	<p>Appropriate publication record or provide other evidence of ability to write fluently for different audiences</p>	<p>Excellent publication record</p>

Employee Benefits

Salary

The agreed starting salary for this post is non-negotiable and clearly stated on the advert and covering letter. Normal salary arrangements apply for internal applicants upon promotion or level transfer.

Pension Benefits

British Museum employees are eligible to join the Civil Service pension schemes, you will be provided with information to assist you in making your choice.

Hours

Full time roles are based on a 5 day week of 41 hours including a daily lunch break of one hour.

Annual Leave

The annual leave allowance is 25 days, rising to 30 days after 10 years service. The annual leave year commences on 1 April and new staff will receive their annual leave allowance on joining. In addition there are 10 ½ days public and privileges days.

Additional Benefits

Are subject to change but currently include access to a subsidised restaurant, the opportunity to purchase books, replicas and other items from the Museum shops at discount prices. Museum staff also have access to a Personal Support Service through Workplace Options. There are free eye tests for VDT users and assistance with the purchase of glasses if appropriate

Season Ticket or Bicycle Loan

After two months in post, staff on permanent contracts (or contracts longer than two years) will be eligible to apply for an interest free loan to purchase a season ticket or bicycle

Guidance Notes for Applicants

These notes are intended to guide you through The British Museum's application procedure and help you to participate in the selection process as effectively as possible. Please read these notes carefully before completing your application.

Job Description/Person Specification

The job description and person specification that outline the purpose, main duties and responsibilities of the job as well as the knowledge, skills and experience that we are looking for. It is essential that you read the person specification thoroughly before completing the application form so that you are able to assess how your experience fits with the requirements for the post.

Application Form

The first stage of the selection process is your completion of the application form. This allows us to shortlist applicants for interview and provides a basis for the interview itself. To ensure fairness to all applicants, any decision during the initial sift is based solely upon the information that you include in your application form.

ELIGIBILITY TO WORK IN THE UK

Please ensure that you give details of any restrictions that you have to work in the EU. If you are selected for interview you will be asked to provide us with proof of your eligibility to work in the UK (e.g. passport or Home Office visa). Additionally, under the asylum and immigration act, we are required to check that anyone taking up employment with us has the legal right to work in the EU.

EDUCATION AND TRAINING

Please give details of your full educational career including any qualifications that you have obtained and any further scholarships/awards that you feel would help your application.

EMPLOYMENT

Please give details of all of your previous employment for the past 10 years, beginning with your current/most recent post. If you are successful after interview we will need to contact your last employer and another previous employer before we are able to offer you the post.

PERSONAL STATEMENT

This is your opportunity to give us any further additional information about why you have applied for this post, including experience that you feel is relevant to the main tasks and essential criteria, as outlined in the job description and person specification.

DECLARATION

It is essential that you read the declaration before submitting your application form. Successful candidates may be disqualified later if any information given on the application form is found to be false.

Short Listing

Short listing prior to interview will take place as soon as possible after the closing date for applications and will be carried out by at least two people. Short listing will be based upon how closely candidates have demonstrated they fit the criteria, as set out on the job description and person specification.

Interview

Short listed candidates will be normally contacted by email and given details of the interview date, time, location and any special requirements. If you are able to attend the interview you must confirm with the Human Resources that you wish to do so. The interview process may vary from post to post, any activities such as tests or presentations that we require you to undertake as part of the selection process will be outlined in your invitation to interview.

Offer of Employment

All offers of employment from The British Museum are subject to satisfactory references, health and security clearances.

Data Protection

Information that you provide for the purpose of your application will be used as part of the recruitment process. Any data supplied will be held securely and access restricted to those involved in dealing with your application and the recruitment and selection process. Once this process is completed, the data relating to unsuccessful applicants will be stored for a maximum of 6 months and then destroyed. If you are the successful candidate, your application form will be retained and form the basis of your personnel record. Information provided on the Diversity Monitoring Form will be used to monitor The British Museum's equal opportunities policy and practices.

All processing of personal data by The British Museum is undertaken in accordance with the principles of the 1998 Data Protection Act. For more information please go to:
<http://www.thebritishmuseum.ac.uk/corporate/guidance/DataProtectionCodeofPractice.pdf>