



UNIVERSITY OF  
LINCOLN

## UNIVERSITY OF LINCOLN JOB DESCRIPTION

<b>JOB TITLE</b>	Research Information Services Developer				
<b>DEPARTMENT</b>	Library (with links to ICT)				
<b>LOCATION</b>	Brayford Pool, Lincoln				
<b>JOB NUMBER</b>	LR4068	<b>GRADE</b>	7	<b>DATE</b>	May 2013
<b>REPORTS TO</b>	Head of Electronic Library Services (with dotted line to ICT IS Head)				

### CONTEXT

The University Library supports the University's research aims through the provision of specialist bibliographic and information services and support, including management of the Institutional Repository.

The ICT Department is responsible for the provision and support of ICT services across all departments and colleges of the University.

Research activity at the University of Lincoln has grown significantly over the last few years and consequently we are expanding and developing our research information services to meet funder and researcher expectations. During 2011-13, the University piloted a technical infrastructure for Research Data Management (RDM) and is now embarking on a two-year roadmap to establish a fully operational service.

### JOB PURPOSE

Based in the Library and working closely with ICT Services, this post will be responsible for leading the technical design and development of research information services at Lincoln, including Research Data Management, bibliometrics and research intelligence, research dashboarding, and the University's Institutional Repository (EPrints).

As a newly established service, the post-holder can expect to contribute towards significant institutional change in the way research information and research data is managed, analysed and disseminated.



## KEY RESPONSIBILITIES

### Research Information Services – Management

- Work closely with colleagues in the Library, ICT Services and Research and Enterprise, to identify the on-going technical requirements for a research information service, encompassing RDM, research intelligence and bibliometrics, and data and paper publication repositories.
- Work with ICT Information Services and Technical Services colleagues to ensure alignment with the ICT strategy and target application and technical architectures, plan, design and implement a scalable university-wide research information infrastructure based on existing technologies and make recommendations for the adoption of new technologies, where necessary.
- Work with researchers and other developers to identify and document the on-going requirements for the management of research information and research data.
- Working with colleagues in the Library and Research and Enterprise, develop policies and processes which enable the University to meet funders' requirements for the management, preservation, and access to research data and publications.
- Working with Library and ICT colleagues support the use of research information management applications.
- Prepare the University for significant growth in data intensive research by making best use of storage and human resources through strategic curation, preservation, and appropriate disposal of research data.
- Contribute to library support for researchers and the Research Excellence Framework (REF); for example, by implementing tools for analysis of bibliometric and impact data.
- Seek and bid for external funding to further the University's innovative development of new technological responses to the research 'data deluge'.

### Research Information Services – Systems Design

Work within ICT Information Services policies and procedures to:

- Design, code, test, correct and document large and/or complex programs and program modifications using agreed standards and tools, to achieve a well engineered result. Take part in reviews of own work and lead reviews of colleagues' work.
- Produce outline system specifications, main system functions and information flows, data load and implementation strategies, phasing of development. Specify user/system interfaces, including for example: menus, screen dialogues, inputs, reports, validation and error correction procedures, processing rules, access, security and audit controls, recovery routines and contingency procedures.
- Produce logical system designs showing processes, objects, data flows, inputs, stored data and outputs. Identify common processes. Produce or update system object/data models and correlate these with data architecture models.
- Translate logical designs into physical designs taking account of target environment, performance requirements and existing systems. Produce detailed designs including physical data flows, class diagrams, file layouts, common routines and utilities, program specifications or prototypes, and backup, recovery and restart procedures.
- Document all work using agreed standards, methods and tools, including prototyping tools where appropriate.
- Construct, interpret and execute test plans to verify correct operation of completed systems.



### **Research Services – Systems Development**

Work within ICT Information Services policies and procedures to:

- Ensure the implementation of and compliance with systems development standards, methods and procedures.
- Ensures that appropriate technical records are maintained. Performs quality and structured reviews of technical products and work.
- Designs large and/or complex programs and program modifications using agreed standards and tools, to achieve a well engineered result.
- Plans, designs and conducts tests of programs; corrects errors and re-tests to achieve an error-free result.
- Conducts reviews of supplied specifications, with others as appropriate.
- Take part in reviews of own work and leads reviews of colleagues' work.
- Document all work in accordance with agreed standards.

### **Networking, Liaison and Professional Development**

- Contributes as appropriate to national research information infrastructure projects (e.g. data.ac.uk).
- Develop and maintain a network of formal and informal contacts within the University and with external partners.
- Maintain a personal and professional development plan. Maintain awareness of the higher education sector agendas and developments nationally and internationally.
- Maintain up-to-date knowledge of emerging technology trends and developments in areas of interest to the University by reading relevant academic research, professional publications and suppliers' information, attending conferences and seminars, and through direct contacts and other information sources.

**In addition to the above, undertake such duties as may reasonably be requested and that are commensurate with the nature and grade of the post.**



### ADDITIONAL INFORMATION

Key working relationships/networks	
Internal	External
<ul style="list-style-type: none"><li>• Head of Electronic Library Services</li><li>• Electronic Resources Librarian</li><li>• Senior Academic Subject Librarian</li><li>• Head of ICT IS</li><li>• ICT IS team lead</li><li>• ICT Information Services Team</li><li>• ICT PMO and Enterprise Architecture Team</li><li>• Dean of Research</li><li>• Research and Enterprise Services</li><li>• Graduate School</li><li>• College staff (academic and administrative)</li><li>• Professional service staff</li><li>• Student Union</li><li>• Students</li></ul>	<ul style="list-style-type: none"><li>• JISC</li><li>• Digital Curation Centre (DCC)</li><li>• EPrints Services</li><li>• The Open Knowledge Foundation (OKF)</li><li>• The UK Higher Education developer community</li><li>• Key Suppliers and Commercial Partners</li><li>• Relevant professional bodies</li></ul>



**UNIVERSITY OF LINCOLN  
PERSON SPECIFICATION**

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<b>Selection Criteria</b>	<b>Essential (E) or Desirable (D)</b>	<b>Where Evidenced Application (A) Interview (I) Presentation (P) References (R)</b>
<b>Qualifications:</b>		
Educated to degree level or equivalent	<b>E</b>	<b>A</b>
Postgraduate qualification in computer science or information management	<b>D</b>	<b>A</b>
Relevant software development qualification (e.g. RedHat Certification or equivalent)	<b>D</b>	<b>A</b>
Membership of relevant professional bodies	<b>D</b>	<b>A</b>
<b>Experience:</b>		
Developing and supporting large complex application environments including SOA environments and web-based (e.g. RESTful) services	<b>E</b>	<b>A,I</b>
Higher education sector or Research environments	<b>D</b>	<b>A,I</b>
Full project life cycle management	<b>D</b>	<b>A,I</b>
Requirements definition and business analysis for complex demands	<b>E</b>	<b>A,I</b>
Building of business cases, return on investment, cost and benefit analysis	<b>D</b>	<b>A,I</b>
Stakeholder management within project and business as usual environments	<b>D</b>	<b>A,I</b>
Leading, managing, developing and motivating staff	<b>D</b>	<b>A,I</b>
<b>Skills and Knowledge:</b>		
PHP, Perl and Python programming languages	<b>E</b>	<b>I</b>
Linux System Administration	<b>E</b>	<b>I</b>
Analysis modelling and design methods	<b>E</b>	<b>I</b>
Software engineering methods and techniques	<b>E</b>	<b>I</b>
Understanding of the relevance and application of technology to enhance business processes	<b>E</b>	<b>I</b>
Good Communication and interpersonal skills	<b>E</b>	<b>I</b>
Emerging technology trends	<b>D</b>	<b>I</b>
Relevant issues, developments and trends within the education and research sectors	<b>D</b>	<b>A,I</b>
Able to present to a wide range of audiences ranging in knowledge of technology, business awareness and seniority	<b>D</b>	<b>A,I</b>
Planning and project management techniques and methods	<b>D</b>	<b>A,I</b>



<b>Competencies and Personal Attributes:</b>		
Credibility and integrity	<b>E</b>	<b>I</b>
Positive and open in communication	<b>E</b>	<b>A,I</b>
Initiative and confidence	<b>E</b>	<b>A,I</b>
Analytical in approach to acquiring knowledge and information	<b>E</b>	<b>I</b>
Creative approach to solving problems	<b>E</b>	<b>I</b>
Collaborative, able to build working networks	<b>E</b>	<b>A,I</b>
Commitment to service quality	<b>E</b>	<b>A,I</b>
<b>Business Requirements:</b>		
Able to work flexibly as and when required in accordance with the needs of the University	<b>E</b>	<b>A,I</b>
Able to travel between campuses, to suppliers, other partner locations and sites as required	<b>E</b>	<b>A,I</b>

**Essential Requirements** are those, without which, a candidate would not be able to do the job. **Desirable Requirements** are those which would be useful for the post holder to possess and will be considered when more than one applicant meets the essential requirements.

<b>Author</b>	IS	<b>HRBA</b>	HF
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