University of Edinburgh - Job Description

1. Job Details

Job title: **Systems Administrator 020**

School/Support Department: **Management Information Services**

Unit (if applicable): **Technical Services, part of Development Services Group**

Line manager: **Technical Services Manager**

2. Job Purpose

To work as a member of the Technical Services team to maintain and develop all aspects of the department’s technical infrastructure. In particular to employ the Oracle Relational Database Management System (RDBMS), UNIX and Windows hosts together with associated software to maintain a smooth running, secure, efficient and up-to-date environment in which to store and access the University’s data. This data and the associated corporate applications are essential to maintain a smooth running, secure, efficient and up-to-date environment from which the University’s vital business systems are delivered.

3. Main Responsibilities

1. To maintain the corporate applications infrastructure and ensure the day-to-day smooth running, with minimal downtime 9am – 5pm of services closely monitoring service levels and alerting senior colleagues of problems or issues where action is required. **Approx. % of time 40**

2. To provide specialist input to business projects in areas including database administration, application and web server configuration, server administration and configuration, network security and firewall administration. **30**

3. To work on infrastructure improvement projects to implement new technologies, products and tools whilst minimising service impact and adhering to agreed technical standards and MIS procedures. **20**

4. To assist the Senior Systems Administrator and the Senior database Administrators to maintain and develop appropriate technical standards and procedures covering regular day to day and specialist activities. **10**

4. Planning and Organising

- Technical Services Team normally works to a plan three to six months ahead, although projects up two years ahead may be on the schedule. Planning involves balancing inputs required for business driven IT projects with the essential technology driven projects undertaken team, e.g. major software upgrades.
- Managing personal workload of support tasks liaising with colleagues and customers and reporting issues to senior colleagues when guidance or prioritisation advice is required.
- Working closely with Project Managers to plan and execute specialist infrastructure tasks within the framework of the overall project plan.
- Following regular, usually weekly, Advisories from CERT the post holder is required to respond to any risk and implement any necessary software patching as stipulated by the Senior Applications Administrator across all MIS production and development servers.
• Maintaining application documentation, change control records etc in line with established policies, standards and procedures.

5. Problem Solving

• Support of production systems is a major part of the job and can demand prompt solutions to unanticipated problems requiring a degree of flexibility and a pragmatic approach.
• In the event of service failure or performance problems, often associated with business critical activities such as matriculation, the post holder is required to work with team members to rapidly evaluate the problem, agree corrective action and implement a solution.
• Assessing the potential impact of service issues on planned or current project work and advising Project Managers on the appropriate course of action.
• Using the MIS help desk to manage and prioritise support calls, working closely with colleagues to develop a comprehensive set of procedures covering regular support activities and raising issues with the Technical Services Manager. An essential requirement to manage the workload and respond quickly and appropriately to support calls which are frequently of a business critical nature.
• Monitoring systems and resources interpreting measurement data and reacting to service issues to implement effective and appropriate corrective action.
• The Systems Administrator works closely with the colleagues in MIS and the user community to implement new technologies and assists the Senior Systems Administrator in establishing the guidelines and standards to which the services and technologies should be developed and maintained.

6. Decision Making

• Day to day work responding to support problems is carried out with minimum supervision under the post holder’s own initiative. Problem resolution actions are executed in accordance with agreed department standards and procedures, e.g. Production Service Change Control and Service Announcements.
• Project work is generally carried out in close collaboration with Project Managers who will be directed and advised by the post holder but will, perhaps in conjunction with the Technical Services Manager or other senior colleagues, make the final decision on how best to proceed.
• Direction comes mainly from the Technical Services Manager and/or other senior colleagues. Regular meetings are held to discuss progress and determine priorities.

7. Key Contacts/Relationships

• Technical Services Team Leader and/or senior colleagues on a daily basis to discuss work progress and priorities.
• EUCS Unix Facilities Management Team on a daily basis to discuss issues relating to the UNIX environment and security.
• Colleagues in MIS on a daily basis to provide detailed technical support to meet agreed project objectives.
• Staff in the University user community to provide technical support and resolve problems as required.
• Regular contacts with hardware and software suppliers.

8. Knowledge, Skills and Experience Needed for the Job

• A relevant degree or equivalent qualification.
• A professional qualification or other evidence of competence in specialist technology areas, e.g. Firewall-1 certification.
• Excellent verbal and written communication skills.
• Clear ability to work effectively in a team environment.
• Confidence to work under pressure and to deliver effective and high quality solutions to problems.
9. Dimensions

The post holder has shared operational responsibility for:

- Administration of 31+ production UNIX application servers
- Administration of 11 UNIX database servers
- Administration of 10+ Windows/Linux Servers
- Administration, configuration of secure Firewall infrastructure protecting all Corporate Services running from Old College. (100+ websites, 42+ servers, 1500 mailboxes/diaries 2TB (1 TB is 1 million megabytes) of client data)
- Management of 3+ TB of critical University data. (1 TB is 1 million megabytes)
- Maintaining services for 35000+ registered customers (staff, students, alumni) in SG2 and the wider academic community.
- Ensuring that services are available 24*7.
- Delivering 70+ business application systems.
- Providing technical guidance to 30+ development and support staff in MIS.
- Microsoft Windows, Active Directory and Windows server support.

10. Job Context and any other relevant information