



Canadian Research
Knowledge Network

Réseau canadien
de documentation
pour la recherche

Systems Administrator

Summary

Reporting to the Director, Infrastructure & Development or designate and under the supervision of the Senior Systems Analyst, the Systems Administrator configures, monitors and maintains the TDR network infrastructure, Linux servers, monitoring systems, Swift clusters, systems configurations and Docker container deployments, and other networking and infrastructure elements. The Systems Administrator coordinates with staff at partner data centres to manage the installation and maintenance of hardware and network infrastructure, and with vendors to purchase and configure new and replacement hardware. The Systems Administrator also participates as a member of the Infrastructure & Development team to design and implement new services and capabilities using agile processes.

The Systems Administrator maintains the network and hardware layers of the Canadiana Trustworthy Digital Repository (TDR) platform and associated services, and contributes to the design and implementation of new services and applications.

Duties and Responsibilities

System and Network Administration (70%)

- Configure, deploy, upgrade, manage and monitor servers and network hardware
- Manage server configurations and deployment of Docker containers using Puppet
- Develop recommendations for new hardware, operating system and server configurations and deployment practices
- Develop and implement monitoring strategies for system resource usage and performance
- Other system administration activities as required

System Development (15%)

- As a member of the Infrastructure & Development team, contribute to the design and implementation of new services and enhanced capabilities through an ongoing process of agile development

Security Policy Development and Implementation (10%)

- Provide support and guidance to the Director of Finance and Administration relating to the development and implementation of information security controls, policies and best practices
- Implement and monitor security processes, practices and tools to ensure the security of CRKN systems and information

Other (5%)

- Coordinate the purchase, delivery and installation of hardware with vendors and data centre staff
- Provide input and reports to the Preservation and Access Committee and Platform Technical Task Group
- Other duties as required

In a small team environment, every individual is expected to work towards overall CRKN goals and at times a team effort is required that may involve taking on tasks outside the normal or expected scope of their role. Other duties may be assigned as required.

Qualifications:

The ideal candidate will have a degree in computer science and at least five years' experience in a systems role, or an equivalent combination of education and experience. Extensive knowledge of and experience with server and

networking hardware is essential, and an understanding of cybersecurity practices is required. The candidate should possess or be eligible for Reliability Status from PWGSC. Other relevant and desirable education, skills and experience include:

- Extensive Windows/Entra administration and networking experience
- Unix/Linux administration and networking experience
- Supermicro or equivalent server hardware and IPMI knowledge
- Knowledge of Strongswan, OpenVPN, Bastion, backupninja, easysrsa
- Knowledge of monitoring systems (such as icinga, nagios) and practices
- Experience in advising on and implementing network security practices
- Ability to master complex and evolving technologies, frameworks and service architectures
- Strong written and oral communication skills
- Ability to accurately track and report on work (including tracking errors and resolutions) within a distributed, remote work environment
- Familiarity working in an agile team environment
- Ability to lift up to 30 kg with the assistance of another person
- Ability to obtain Government of Canada reliability status.
- Experience with OpenStack components would be an asset
- Experience with Linux containers and orchestration, especially using Docker, would be an asset
- Scripting and programming experience using a variety of languages and frameworks would be an asset
- Proficiency in both English and French, written and spoken is highly desirable.

Responsibility:

An individual in this position:

- Reports to the Director, Infrastructure & Development
- Operates with significant discretion and minimal supervision
- Understands how to prioritize and adapts work accordingly
- Has access to sensitive and confidential information
- Has control over business-critical services and infrastructure

Salary scale

This position falls within CRKN's Professional 2 category, with a salary range of \$80,000-\$95,000.

Term

Full-time, Permanent

Location

CRKN's office and IT infrastructure are located in Ottawa, ON. Applications from across Canada are welcome, however being based in the National Capitol Region where CRKN's IT infrastructure resides, will be an asset.

To Apply

Please send a letter of application and resume via email to:

Canadian Research Knowledge Network

Attn: James MacGregor, Director, Research Infrastructure & Development

Email: hr@crkn.ca

Please reference "Systems Administrator" in the email subject.

Closing date: January 6 2025

CRKN welcomes and encourages applications from all qualified individuals, including but not limited to women, members of Indigenous, Black, and racialized communities; Two-Spirit, non-binary, trans, lesbian, gay, bisexual, and queer people; people with disabilities; and members of other equity-deserving groups. All qualified candidates are welcome to apply; however, priority will be given to Canadian citizens and permanent residents.

CRKN is committed to an inclusive, accessible and welcoming hiring process that provides reasonable accommodation to all applicants. Please advise should you require any accommodation to participate in this posting, recruitment, selection and/or assessment processes.

We thank all applicants for their interest in CRKN, however only those candidates selected for an interview will be contacted.