



Canadian Research  
Knowledge Network

Réseau canadien  
de documentation  
pour la recherche

<b>Title:</b>	Developer, Data Services and Interoperability
<b>Job Classification:</b>	Professional 1
<b>Reports to:</b>	Manager, Canadian Persistent Identifier Community
<b>Term:</b>	Full-time, two-year term (renewable pending funding)
<b>Salary:</b>	\$67,658.39 - \$105,716.24
<b>Location:</b>	Location: Ottawa, ON / Remote in Canada
<b>Last Updated:</b>	March 11, 2026

### Summary:

Reporting to the Manager, Canadian Persistent Identifier (PID) Community and collaborating with the PID team and colleagues at the Digital Research Alliance of Canada (the Alliance), the Developer, Data Services and Interoperability, will contribute to the design, development, and integration of national-scale research data services. The role includes implementing, customizing, and deploying a new Research Activity Identifier (RAiD) service. Working within a multidisciplinary team, the developer will build interoperable, scalable software components that support the research data lifecycle, with an initial emphasis on adapting an existing code base for RAiD and customizing it to meet the needs of Canadian users and allowing it to be deployed in a Canadian cloud environment.

This position designs, implements, tests, deploys and maintains tools related to Canada's RAiD service and provides development support for integrations with existing and emerging national data services, including RAiD. The Developer engages in a range of full-stack web development and DevOps activities to make RAiD registration, management, and discovery available to members of the Canadian research community.

The Developer supports the technical needs of a dedicated team focused on delivering a RAiD service in Canada.

### Duties and Responsibilities

#### Software development (40%)

- Customize existing software applications and code bases to be deployed in new computing environments
- Write, test, debug, and document software to meet functional requirements and specifications
- Deploy containerized applications to test and production servers in a cloud environment
- Design, implement, and maintain software components and APIs that enable interoperability between data services, platforms, and repositories
- Contribute to the development of emerging and existing national data services

#### Software maintenance and support (40%)

- Evaluate bug reports and determine solutions
- Implement, test, deploy and verify bug fixes and solutions to problems
- Update web application templates, databases, and content
- Maintain software stack and engage with international technical partners
- Support pilot partners in implementing RAiD tools using the RAiD API

### **Analysis and design (15%)**

- Analyze functional requirements and develop technical specifications
- Design software and data structures based on requirements and specifications
- Research software development tools and practices for integration with the overall development direction of the organization
- Collaborate with architects, technical leads, and domain experts to translate requirements into robust technical solutions

### **Other (5%)**

- Remain current in standards, practices, and technologies in the persistent identifier (PID) ecosystem, especially as it relates to the Global RAiD Alliance and implementations of RAiD around the world.

In a small team environment, each 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. This position may require the incumbent to attend and represent CRKN at stakeholder, industry, or member conferences and events. Other duties may be assigned as required.

### **Qualifications:**

The ideal candidate has a degree in computer science, software engineering, or a related field, and two to five years of software development experience. An equivalent combination of education and experience is also acceptable. Skills and experience particularly relevant to this position include:

- Ability to learn and adapt to new programming languages, frameworks, tools, and environments
- Experience in managing and deploying Docker containers, including using Kubernetes
- Experience in server-side programming, especially using Java and Typescript
- Experience in developing for Linux/Unix environments
- Excellent verbal and written communication, especially relating to documenting code and specifications
- Ability to work as the sole developer in a team environment, collaborating well with colleagues
- Ability to translate feature requests into code, and communicate technical ideas to non-technical staff
- Code management experience using revision control systems, eg.. GitHub
- Ability to travel on occasion when required
- Ability to obtain Government of Canada reliability status
- User Interface and User Experience (UI/UX) design experience is an asset
- Knowledge of both English and French is an asset
- An understanding of the academic research environment is an asset
- An understanding of the Persistent Identifier ecosystem is an asset

### **Equity, Diversity, Inclusion and Accessibility**

CRKN values and embeds equity, diversity, inclusion, and accessibility in its organizational strategy and culture. We encourage applications from individuals of all backgrounds and lived experiences to contribute to advancing equitable access to scholarly resources. Prospective applicants requiring accommodation in the recruitment process are encouraged to contact us.

### **Organizational Culture & Values**

The Canadian Research Knowledge Network (CRKN) is a national, not-for-profit network powered by the collective strength of 88 member institutions. Acting as a united voice, we negotiate with publishers on behalf of our members to secure equitable, cost-effective access to global research while advancing open access and building shared digital research infrastructure. Together, our members own and maintain the Canadiana collections, ensuring that Canada's documentary heritage is preserved and openly accessible for future generations. Rooted in collaboration and responsibility, CRKN connects Canada's libraries and research institutions to create a more open, sustainable, and inclusive knowledge ecosystem.