

R4R@Q: Managing your data throughout the research lifecycle

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Guest Speakers:

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Agenda



Introduction to Research Data Management (RDM)

New Tri-Agency RDM Policy

Support for Meeting the Policy Requirements

Meet the Experts



What are research data?

Is experimental data, observational data, operational data, third party data, public sector data, monitoring data, processed data, or repurposed data

All other digital and non-digital content have the potential to become research data

Primary sources supporting research, scholarship or artistic endeavours

Can be used as evidence to validate findings and results

What is research data management (RDM)?

Processes applied throughout the **lifecycle of a research project** to guide the collection, documentation, storage, sharing, and preservation of research data.



Plan



Create



Process



Analyze



Disseminate



Preserve



Reuse



Tri-Agency Research Data Management Policy



“Research data collected through the use of public funds should be responsibly and securely managed and be, where ethical, legal and commercial obligations allow, available for reuse by others”

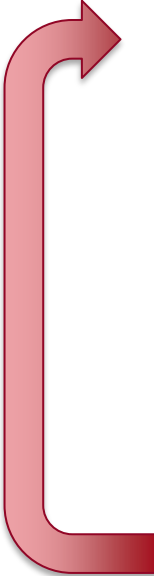
SSHRC  CRSH





How Does the New Policy Impact You?

Requirements:

- 
- 1 Institutional Strategy: By March 1, 2023 each institution must develop and post an institutional strategy and notify the agency;
 - 2 Data Management Plan (DMP): By spring 2022 the agencies will identify the initial set of funding opportunities subject to a DMP requirement;
 - 3 Data Deposit: A data deposit requirement will be phased in.



How is Indigenous Data Addressed in the Policy?

“Data related to research by and with the First Nations, Métis, or Inuit whose traditional and ancestral territories are in Canada must be managed in accordance with data management principles developed and approved by these communities, and on the basis of free, prior and informed consent.”

- [OCAP](#) Principles (The First Nations Information Governance Centre)
- [Chapter 9](#) of the Tri-Council Policy Statement: Ethical Conduct for Research Involving Humans - Research Involving the First Nations, Inuit and Métis Peoples of Canada

Requirement #2 - Data Management Plans



Create



Process



Analyze



Disseminate

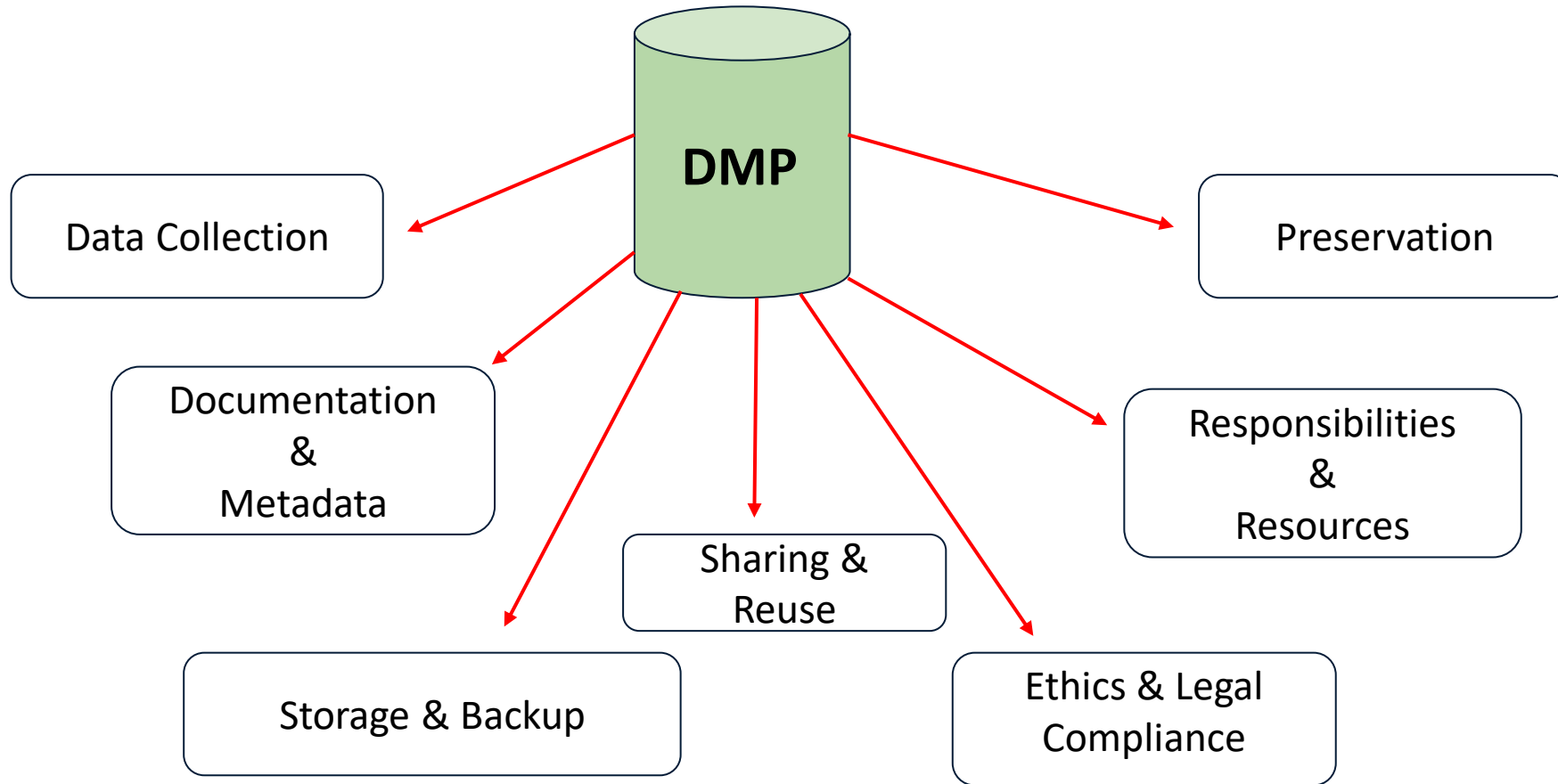


Preserve



Reuse

What's a DMP?





Write a data management plan



Use the Portage [DMP Assistant](#) tool to develop your own data management plan. It is freely available to all researchers in Canada and provides step-by-step guidance through a series of questions based on a general template for research data stewardship.





Data Collection (3 questions, 3 answered)

Documentation and Metadata (3 questions, 3 answered)

Storage and Backup (3 questions, 3 answered)

Planning how research data will be stored and backed up throughout and beyond a research project is critical in ensuring data security and integrity. Appropriate storage and backup not only helps protect research data from catastrophic losses (due to hardware and software failures, viruses, hackers, natural disasters, human error, etc.), but also facilitates appropriate access by current and future researchers.

What are the anticipated storage requirements for your project, in terms of storage space (in megabytes, gigabytes, terabytes, etc.) and the length of time you will be storing it?

B *I* A

2 gigabytes

Save

Answered 2 years ago by Courtney Matthews

How and where will your data be stored and backed up during your research project?

B *I* A

On my computer
OneDrive
Regionally in the Ontario Library Research Cloud.

Save

Guidance Share note

Portage

Storage-space estimates should take into account requirements for file versioning, backups, and growth over time.

If you are collecting data over a long period (e.g. several months or years), your data storage and backup strategy should accommodate data growth. Similarly, a long-term storage plan is necessary if you intend to retain your data after the research project.

Guidance Share note

Portage

The risk of losing data due to human error, natural disasters, or other mishaps can be mitigated by following the [3-2-1 backup rule](#):

- Have at least three copies of your data.
- Store the copies on two different media.
- Keep one backup copy offsite

Data may be stored using optical or magnetic media, which can be removable (e.g. DVD and USB drives), fixed (e.g.



Library Support for Data Management Planning Includes:



- Guidance on preparing your DMP
- Training on how to use the Portage DMP Assistant
- Support for locating relevant resources
 - On-campus (e.g. Research Ethics, ITS)
 - Externally (e.g. Portage)
- Guidance on best practice approaches to managing research data

Active Data Management? Come Talk to Us

QUL RDM can help you:

- Review data files
 - coding, formatting, anonymizing
 - converting to non-proprietary file formats
- Organize your data
 - help create meaningful file structure
 - file naming
- Document/describe data
 - describing variables so others understand it
 - creating user guide, methodology, codebook, data dictionary



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Queen's active data storage resources



Secure file storage

- 5 TBs cloud storage through OneDrive
- Teams collaborative platform
- Centre for Advanced Computing: Frontenac & Katarokwi Platforms



Requirement #3 - Depositing data

“Grant recipients are required to deposit into a digital repository all digital research data, metadata and code that directly support the research conclusions in journal publications and pre-prints that arise from agency-supported research”

- [Tri-Agency Research Data Management Policy](#) (2021)



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A Data Repository Should:

- Provide continued stewardship of data after a project is finished.
- Assign persistent identifiers that support consistent and unambiguous data citation and linking.
- Ensure controlled access to data, where appropriate.
- Convert files to formats appropriate for both preservation and sharing.



Discovery of Research Data in Repositories



- Repositories Provide Context, Descriptive Metadata and Persistent Discoverability of data.

Data is most useful when it is:

- **F**indable
- **A**ccessible
- **I**nteroperable
- **R**e-usable

How do I share my research data?



Deposit your data in a disciplinary repository

Consult the Registry of Research Data Repositories

<https://www.re3data.org/>



The library supported repository:

Scholar's Portal Dataverse

<https://dataverse.scholarsportal.info>

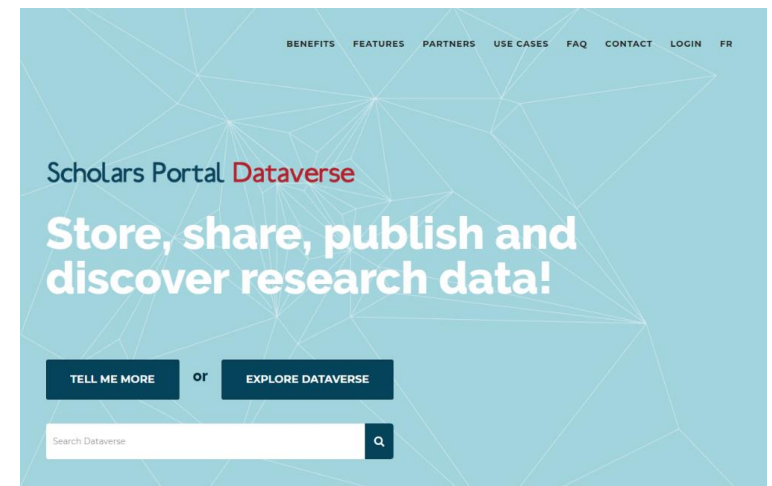


Use a nationally supported repository:

Federated Research Data Repository

<https://www.frdr-dfdr.ca/repo/>

re3data.org
REGISTRY OF RESEARCH DATA REPOSITORIES



Dataverse Example



Queen's University Dataverse (Queen's University)

Scholars Portal Dataverse > Queen's University Dataverse > Chronic Pain Surveillance at Queen's, 2013-2017



10 Downloads

Contact Share



Chronic Pain Surveillance at Queen's, 2013-2017 Version 1.1

Wilson, Rosemary A.; VanDenKerkhof, Elizabeth G.; Duggan, Scott; Gilron, Ian; Good, Mary Anne; Henry, Richard; Carley, Meg, 2018, "Chronic Pain Surveillance at Queen's, 2013-2017", <https://doi.org/10.5683/SP2/GAPNRM>, Scholars Portal Dataverse, V1, UNF:6.d+jC5YYQZO7ERTS1Y37v0Q== [fileUNF]

Cite Dataset ▾

Learn about Data Citation Standards

Description

The purpose of this surveillance system is to develop a better understanding of the characteristics of patients with chronic pain and their response to treatment in a general clinic setting. This ongoing surveillance system will contribute valuable information for both clinical and research purposes. The primary objective of this research is to collect information about pain, activity limitation, and psychological factors in patients seen for chronic pain conditions.

Subject

Medicine, Health and Life Sciences

Keyword

Activity limitation, Chronic pain, Evidence-based care, Pain, Quality of life

Related Publication

Hamilton, A.N.J. (2017). An Observational Study Examining the Association Between Chronic Pain Coping Strategies and Unplanned Health Care Use by Individuals Attending an Interdisciplinary Pain Clinic (Master's Thesis). Queen's University, Kingston, Ontario, Canada. Retrieved from <http://hdl.handle.net/1974/22959>

Files

Metadata

Terms

Versions

Search this dataset...

Find

1 to 6 of 6 Files

		Download ▾	Request Access
		Codebook-CPSurveillanceArchive.pdf	
		Adobe PDF - 23.5 MB - Aug 21, 2018 - 0 Downloads	
		MD5: 4ca2f7bf5ceabc1c117cbb51347d8a	
		Codebook	
		Documentation	

Request Access

QUEEN'S UNIVERSITY LIBRARY

When you use Dataverse:

- Your data receives a DOI and a standard citation
- Data stored on secure Canadian servers
- You control access to your data
- Your data files are version controlled
- Increase discovery of your work
- And much more: [Scholar's Portal Dataverse](#)



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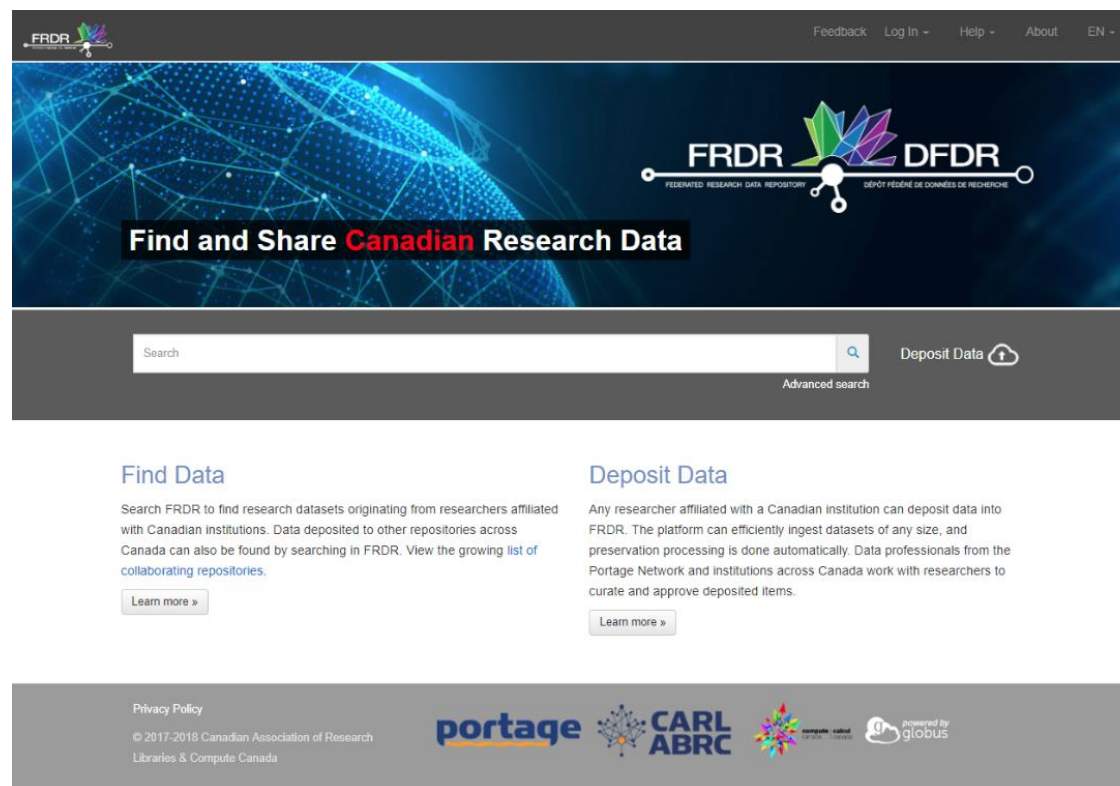


Reuse

How do I find Canadian research data?

Search for data in the National repository

Consult FRDR for an ever expanding, curated source of Canadian research data



The screenshot shows the FRDR website with a dark blue header and a large banner area. The banner features a network diagram and the text "Find and Share Canadian Research Data". Below the banner is a search bar with a "Search" button and a "Deposit Data" button. The main content area is divided into two columns: "Find Data" and "Deposit Data". The "Find Data" column contains text about searching for research datasets and a "Learn more" button. The "Deposit Data" column contains text about depositing data into FRDR and a "Learn more" button. The footer includes a "Privacy Policy" link, copyright information, and logos for Portage, CARL ABRC, and Globus.

FRDR DFDR
FEDERATED RESEARCH DATA REPOSITORY DÉPÔT FÉDÉRÉ DE DONNÉES DE RECHERCHE

Find and Share **Canadian** Research Data

Search Deposit Data

Advanced search

Find Data

Search FRDR to find research datasets originating from researchers affiliated with Canadian institutions. Data deposited to other repositories across Canada can also be found by searching in FRDR. View the growing [list of collaborating repositories](#).

[Learn more »](#)

Deposit Data

Any researcher affiliated with a Canadian institution can deposit data into FRDR. The platform can efficiently ingest datasets of any size, and preservation processing is done automatically. Data professionals from the Portage Network and institutions across Canada work with researchers to curate and approve deposited items.

[Learn more »](#)

Privacy Policy
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portage CARL ABRC

powered by globus

When you use FRDR as a Repository

- Supports file sizes larger than 2.5 Gb
- Data stored on secure Canadian servers
- Open to Principal Investigators and their designates at Canadian Universities
- Use if institution does not have its own repository or you have large data needs
- Your data receives a DOI and a standard citation
- Supports embargos, but otherwise data must be openly available under a Creative Commons license



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Library Support for Data Deposit Includes:



- Guidance for finding an appropriate repository to host your work
- Local support and training for using Scholar's Portal Dataverse
- Review of your data
- Data deposit
 - Mediated deposit of your data
 - Self-serve deposit of your data

Resources



Library Resources

- [QUL Research Data Management Guide](#)
- [Dataverse Data Deposit Guidelines](#)

Canadian Repositories

- [Federated Research Data Repository](#)
- [Scholars Portal Dataverse](#)

Portage Network Resources

- [DMP Assistant](#)
- [RDM Primer](#)
- [‘Good Enough’ Research Data Management](#)

Research Data Management at Queen's University

Search this G

Introduction
Writing a Data Management Plan
Funding Agency Guidelines
Metadata
Data Repositories & Archives
Citing Data
Best Practices in Data Management
QUL Research Data Archive
Library as Data Partner
Contact

Introduction

The whole notion of developing a data management plan and depositing data may seem daunting to some. Queen's University Library is here to support and partner with you to make sure this process is as painless as possible. See the [Writing a Data Management Plan](#) tab for more information.

For assistance please contact your [Subject Liaison Librarian](#). Or contact academic.services@queensu.ca.

Why Manage Your Research Data?

Managing your research data will help you:

- meet grant requirements and/or produce a more competitive grant application
- increase the impact and visibility of your research
- encouraging the discovery and use of existing data to explore new research questions
- better guarantee your data are accurate, complete, authentic, and reliable
- ensure long-term preservation of data for future researchers
- ensure compliance with ethics and privacy policies



Queen's University Library provides Research Data Management Services. For more information, see our brief [PowerPoint presentation](#) on Research Data Management, or contact us.

RDM Resources

- [Data Deposit Form](#)
- [QUL RDM Collection Development Policy](#)
- [QUL RDM Workflow](#)

National Support for RDM

portage

“Fostering a community of practice for research data”

- Training Resources
- Network of expertise
- Tools and Infrastructure for RDM





Contact information

[Contact us about RDM](#)

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Meghan Goodchild
Acting Head, Discovery and Technology
Services
Research Data Management Systems
Librarian, Scholars Portal / Queen's



Contact your [Subject Librarian](#) for help with:

Research – Develop research strategies,
manage data, publish research

Instruction – Support for teaching and
learning, information literacy, course related
sessions and programs

Resources – Access to information to support
research and teaching