

Research Data Management (RDM) Brown Bag Information Series

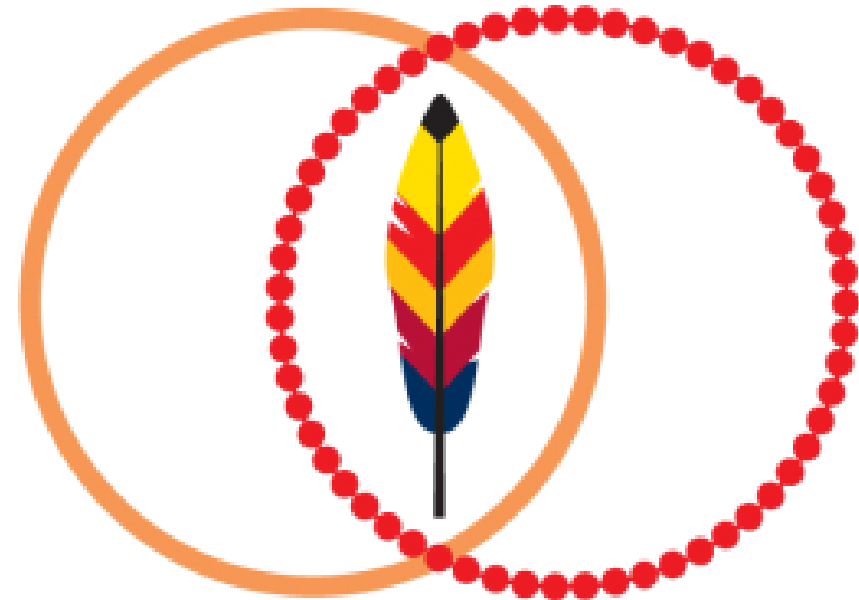
Developing a Data Management Plan

November 23, 2022



Land acknowledgement

“To begin, I would like to acknowledge that Queen’s University is situated on traditional Anishinaabe and Haudenosaunee Territory. I am grateful to live, learn and play on these lands. I acknowledge and respect, the Anishinaabe and Haudenosaunee peoples and I am committed to taking responsibility for redressing the injustices that enabled me to be here today.”



Hello! Meet the Queen's Data Champions



Alicia Cappello

Research Data Librarian,
Queen's University
Library



Elise Degen

Communications &
Relations, Centre for
Advanced Computing



Matt Clapp

Manager, Data Platform
Services, Information
Technology Services



Meghan Goodchild

Research Data Management Systems
Librarian, Queen's University Library /
Scholars Portal



Rebecca Pero

Information and Project
Coordinator, Vice-Principal
Research Portfolio

Agenda

1. Recap:

- a. Research Data Management (RDM)
- b. Tri-Agency RDM Policy
- c. Queen's Institutional Strategy

2. Data Management Plans (DMP):

- a. What is a DMP?
- b. DMP Components
- c. DMP Assistant

3. Resources

4. Q&A

Recap of Research Data Management

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.



Why is RDM important?

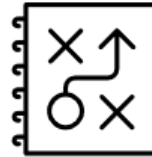
RDM practices are **integral to conducting responsible research** and can help you save resources by **ensuring your data are complete, understandable, and secure.**

Tri-Agency RDM Policy Pillars



Institutional Strategy

Completed by March 2023



Data Management Plans

Implementation begins Spring 2022



Data deposit

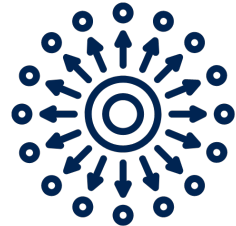
Phased implementation beginning March 2023



Queen's and KHSC Institutional RDM Strategy



**Research
excellence**



**Open dissemination
of research results**



**Respect for
Indigenous
communities**



**Institutional support
for researchers**



**Strong
collaborations**

The first draft of Queen's Institutional Strategy is now available, and we invite feedback from the research community.

www.queensu.ca/vpr/resources/RDM/strategy

Data Management Plans

Grants Requiring a Data Management Plan (DMP)

Data management plans (DMPs) will be required for applications to the following Tri-Agency grants, starting in late 2022:

CIHR

- Network Grants in Skin Health and Muscular Dystrophy (late 2022, early 2023)
- Virtual Care/Digital Health Team Grants (late 2022, early 2023)
- Data Science for Equity (late 2022, early 2023)

NSERC

- Subatomic Physics Discovery Grants (individual and project) (summer 2023)

SSHRC

- Partnership Grants Stage 2 (summer 2023)

Data Management Plans - Lifecycle



What is a **Data Management Plan** or DMP?

- It's a formal, but living*, document that outlines the strategies and tools being used to manage data during the active phases of research, AND
- The mechanisms to be used to preserve and share research data once the project is completed.

The DMP is considered a **living** document because it can, and should, be modified throughout the life a project when changes occur. It is **not** set in stone.

Data Management Plans – Benefits/Considerations



BENEFITS

- Compliance with policy
- Proactive / Forward-thinking
- Identify opportunities & challenges
- Easily adapt to unanticipated obstacles
- Engage partners
- Improved efficiency / increased productivity
- Everyone is on the same page



CONSIDERATIONS

- Time consuming up front (but saves time later)
- Review of DMP throughout project
- “Administrative” exercise
- No guarantee of good data management
- Often not required after funding

Data Management Plans – Indigenous Data Sovereignty

*“The agencies recognize that a **distinctions-based approach** is needed to ensure that the **unique rights, interests, and circumstances** of the First Nations, Métis, and Inuit are acknowledged, affirmed, and implemented.”*

*“For research conducted by and with First Nations, Métis, and Inuit communities..., **DMPs must be co-developed with these communities**..., in accordance with RDM principles and DMP formats that they accept. **DMPs...should recognize Indigenous data sovereignty** and include options for renegotiation of the DMP.”*

Data Management Plans – Components

What are the components of a Data Management Plan (DMP)?

1. Data Collection

2. Documentation and Metadata

3. Storage and Backup

4. Preservation

5. Sharing and Reuse

6. Responsibilities and Resources

7. Ethical and Legal Compliance

DMP Assistant



A screenshot of the DMP Assistant website. The header includes the DMP Assistant logo, navigation links for Home, Public DMPs, DMP Templates, Help, and About, and a Language dropdown. The main content area has a 'Welcome to DMP Assistant.' heading, followed by a paragraph describing the tool as a national, online, bilingual data management planning tool developed by the Digital Research Alliance of Canada (the Alliance) in collaboration with the University of Alberta. Below this is a 'Getting started:' section with a list of links to guides, primers, and tutorial videos. A 'Sign in / Create account' form is visible on the right side of the page, with fields for Email and Password, a 'Remember email' checkbox, and a 'Forgot password?' link. The footer contains logos for the Digital Research Alliance of Canada, Alliance de recherche numérique du Canada, DMPonline, CARL ABRC, University of Alberta Library, UC3, and D|C|C, along with copyright information and links for Contact us, Terms of use, Privacy statement, and GitHub.

- Free and easy to use
- Uses Canadian terminology
- Maintained by University of Alberta
- Can share with others
- Export options
- Can access anywhere
- Public DMPs & templates

DMP Assistant – Exemplars & Templates

Exemplars and Templates for the DMP Assistant are available on the Digital Research Alliance of Canada's website and Zenodo.



Digital Research
Alliance of Canada

Alliance de recherche
numérique du Canada


SERVICES PARTAGÉS POUR LES DONNÉES DE RECHERCHE
SHARED STEWARDSHIP OF RESEARCH DATA

Data Management Plan Exemplar #3: Mixed Methods
Fictional Exemplar

Administrative Details

Project Name: Portage DMP Exemplar - "Mixed Methods"

Project Identifier: 8675309

Grant Title: 12345


Principal Investigator / Researcher: James Doiron

Project Data Contact: James Doiron (jdoiron@ualberta.ca)

Description:

This is a fictional exemplar data management plan focusing on mixed methods research (survey & interviews/focus groups). This exemplar DMP was developed in February 2020 by James Doiron (Co-chair, Portage DMP Expert Group) for educational and guidance purposes. For these purposes, the premise of the project being described is that the study topic of interest is not sensitive in nature, and that participants are consenting for their de-identified information (data) to be deposited for long-term preservation, discoverability, and open access.

Institution: University of Alberta


SERVICES PARTAGÉS POUR LES DONNÉES DE RECHERCHE
SHARED STEWARDSHIP OF RESEARCH DATA

Data Management Plan Template:
Mixed Methods (Surveys & Qualitative Research)

Abstract

This mixed methods data management plan template was developed for use within the Portage DMP Assistant and is meant to assist researchers conducting mixed methods research (e.g., surveys and qualitative interviews/focus groups) in developing high quality data management plans to support their research. The template consists of a number of categories, questions, and customized guidance that relate directly to mixed methods research.

Administrative Details


Template Author(s): James Doiron, University of Alberta

Published: March 2, 2021

DOI: [10.5281/zenodo.4573319](https://doi.org/10.5281/zenodo.4573319)

Contact: Portage Network - portage@carl-abrc.ca, portagenetwork.ca

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DMP Assistant – Exemplars & Templates

Templates are also available on the DMP Assistant website and can be used within the tool.



DMP Templates

Templates are provided by a funder, an organization, or a trusted party.

Search

Template Name	Download	Organization Name	Last Updated	Funder Links	Create a new plan	Sample Plans (if available)
Portage CRDCN Template for Accessing Data from Research Data Centres		Portage Network	17-05-2021			
Portage CRDCN Template for Research Data Centres and External Analysis		Portage Network	17-05-2021			
Portage Template		Portage Network	07-06-2021			
Portage Template for Advanced Research Computing		Portage Network	08-04-2021			
Portage Template for Arts-Based Research		Portage Network	08-04-2021			
Portage Template for Interdisciplinary Health Software/Technology Development		Portage Network	08-04-2021			
Portage Template for Mixed Methods (Surveys & Qualitative Research)		Portage Network	08-04-2021			

DMP Assistant Demo – Fictional Scenario – Oils Sands & Birds

WHAT: Dr. Jasmine Riley is starting a new project to observe the birds in and around the oil sands in Fort McMurray, Alberta. Dr. Riley will be submitted a funding application to NSERC in 2023 for this project and is required to include a DMP.

HOW: Birds will be observed using two methods: (1) visual observations recorded via online form on a tablet, and (2) panoramic photographs taken with a digital SLR camera using specialized equipment. The online form (which has yet to be developed) will be created and maintained by grad students. Both types of observations will be conducted by undergrad and grad students.

WHERE/WHEN: There will be 10 locations within the oil sands where observations will take place over the 5-year project period. Each of the 10 locations will be observed by 2 students for a period of 15 minutes, twice per weekday (AM and PM) over the course of 4 months (May through August) for a total of 10 locations x 2 students x 2 obs/day x 10 weekdays x 8 bi-weekly periods = 3,200 observation *periods* per year, or 16,000 observation *periods* for the life of the project. *It is likely that dozens of bird sightings will be observed during each 15-minute period.*

WHO: The Principal Investigator is Dr. Riley. Her lab will have 2 grad students per year, 10 undergrad students per year, and 2 lab assistants for the life of the project. Some of the students may return for multiple years.

Dr. Riley, as the PI, is the overall decision-maker for the project. Grad students will develop the observation protocols, the online form, find the observation locations and create the schedule, review the data collected, and troubleshoot data-related problems. Undergrad students will conduct the majority of the visual and photographic observations and may need to make corrections to data they've entered. The lab assistants will be responsible for creating and maintaining access to the data.

DMP Assistant Demo

[CLICK TO PLAY DEMO >](#)

Questions, Feedback & Resources

Questions?



Please feel free to contact us if you have additional questions

Alicia Cappello, Research Data Librarian – alicia.cappello@queensu.ca

Matt Clapp, Manager, Data Platform Service – mjpc@queensu.ca

Elise Degen, Communications & Relations – elise.degen@queensu.ca

Meghan Goodchild, RDM Systems Librarian – meghan.goodchild@queensu.ca

Rebecca Pero, Information & Project Coordinator – pero.rebecca@queensu.ca

Feedback form

<https://tinyurl.com/qDC-RDM>



Next in series...

Don't miss the opportunity to join the [Queen's Data Champions](#) (qDC) for session 3 of the RDM brown bag informational series.

Register in advance to secure your spot in-person or online:

Session 3: [Deposit Your Research Data in a Repository](#)

(Dec 14, 12:00-1:00PM)

Learn about the benefits and considerations around depositing your research data into a repository.

RDM Resources @ Queen's

Policies

- Tri-Agency [Research Data Management Policy](#) (2021)
- Tri-Agency [RDM Policy FAQs](#)
- Tri-Agency [Statement of Principles on Digital Data Management](#) (2016)

Tools

- [DMP Assistant](#)
- [re3data.org](#)
- [Queen's Dataverse Collection in Borealis](#)
- [Borealis Demo](#)– Try it out!
- [FRDR](#)

Resources

- Queen's Library [RDM Guide](#)
- [FAIR principles](#)
- The First Nations [Principles of OCAP®](#)
- The [CARE Principles](#) for Indigenous Data Governance
- [CARL YouTube Channel](#)

Summary resource document:
<https://guides.library.queensu.ca/rdm/>

Funding Acknowledgement

The Queen's Data Champions team proudly acknowledges the support of funds from The Digital Research Alliance of Canada's ("the Alliance") [Data Champions Pilot Project](#).



**Digital Research
Alliance** of Canada

**Alliance de recherche
numérique** du Canada