# Research Data Management Services in a UK Higher Education Institution: University of Edinburgh

Library Fair and Forum: Yokohama, Japan, 7 Nov. 2017

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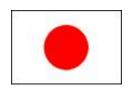


## Fun facts about Scotland (UK) & Japan





- Island country, 244,110 square kilometres
- Ben Nevis, 1,343 metres
- (UK) population 64,769,452
- Life expectancy at birth: 81
- Unemployment rate: 4.8%
- GDP per capita is \$42,500



- Island country, 377,837 square kilometres
- Mount Fuji, 3,776 metres
- Population 126,451,398
- Life expectancy at birth: 85
- Unemployment rate: 3.2%
- GDP per capita is \$41,300



From CIA World Factbook and Project Britain





# We have much in common... including whisky!



Masataka Taketsuru, founder of Nikka whiskey distillery married Scotswoman Jessie 'Rita' Roberta Cowan in 1920 after studying Chemistry at Glasgow University and learning the art of whisky making from Scottish distilleries.







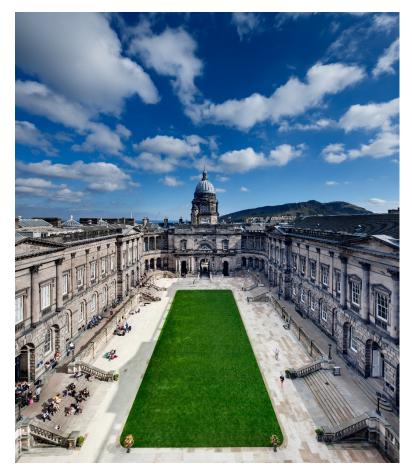
His life and the romance were portrayed in the television show, *Massan*.





## About University of Edinburgh

- Founded 1583
- 39,576 students
- 14,346 postgraduate students
- 6,816 academic staff
- Research income: £253.9 million (2015-16)
- Mission: the creation, dissemination and curation of knowledge
- 20 schools in 3 colleges:
  - Arts, Humanities & Social Sciences
  - Medicine & Veterinary
     Medicine
  - Science & Engineering



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## About EDINA and Data Library

- Data Library began 1983 to provide digital Census data
- National services (EDINA) began 1995 with a competitive tender
- 51 staff: service & project managers, software engineers, support staff
- 445 subscribing institutions
- One of eight divisions in the Information Services Group, merged Library & computing
- EDINA's tagline:
   Innovation into service



















# Research Data Management (RDM) at University of Edinburgh

#### Service milestones over ten years:

- 2007 research computing survey
- DataShare project, 2007-08
- 2008 Data Audit Framework recommendations
- Research Data MANTRA project, 2010-11
- University RDM Policy, 2011
- 1<sup>st</sup> RDM Roadmap 2012
- Steering group formed, 2012
- Half terabyte per researcher, free data storage rolled out 2014
- Research Data Service is consolidated, 2016
- Third Roadmap, 2017



# Research Data Service: Tools & support for working across the data lifecycle





### Before your research project begins



**BEFORE** 

create a data management plan

Tools and Support	Description	Service provider
DMPOnline	Online tool to create a data management plan, based on funders' templates	Digital Curation Centre
Support and DMP Review	Answer enquiries and review plans, provide advice	Library
Sample DMPs	Keep successful plans to show researchers in different disciplines	Library

## During your research project



**DURING** 

working with data

<b>Tools and Support</b>	Description	Service provider
Finding data	Finding data portal and data librarian consultancy	Data Library
Active data storage (DataStore)	Central, backed up storage for all researchers - individual and shared spaces	IT Infrastructure
Sensitive data (Data Safe Haven)	New, secure facility for working with sensitive data on remote server. We are pursuing ISO 27001 security certification	Library, Data Library, IT Infrastructure, Information Security
Code versioning (Subversion, Gitlab: coming soon)	Private or public software code storage and management. Documents all code and allows rollback to prior versions	IT Infrastructure
Collaboration and data sync'ing (DataSync)	Open source tool to allow external partners to access your research data	IT Infrastructure
Electronic Lab Notebook (RSpace Pilot)	Data management for laboratory based research	IT Infrastructure

## After your research project is finished



**AFTER** 

share and archive your data

Tools and Support	Description	Service provider
Open Access data repository (DataShare)	Allows you to share data publicly and preserve for long-term	Data Library
Long-term retention (DataVault)	Private storage for a specified retention period on tape (for example, 10 years)	Library IT Infrastructure
Data asset register (Pure for datasets)	Record a description of your dataset along with your publications and research projects	Library

### Training and support throughout your project



TRAINING & SUPPORT

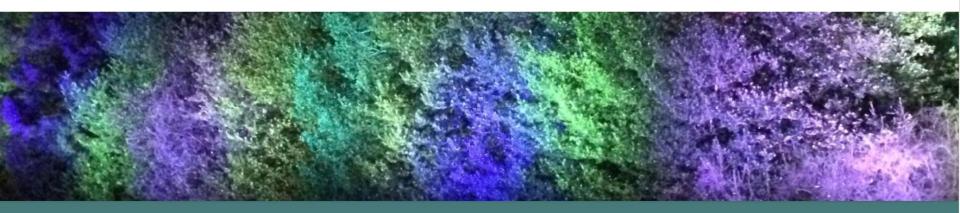
<b>Tools and Support</b>	Description	Service provider
General RDM support	Answer enquiries by email, phone or appointment	Library Data Library
Online training (MANTRA and RDMS MOOC)	Awareness raising and learning at your own pace online through our open educational resources	Data Library
Scheduled and bespoke training	Sign up for a scheduled workshop or request a special training session for your research group	Library Data Library IT Infrastructure
Research Data Service website	Find all the tools and support in one place	Library Data Library
Blog and promotional materials	Keep up with new developments on our blog. Handouts and videos	Library Data Library
RDM Forum & Sharepoint site	Attend quarterly meetings for school support staff or get access to shared resources	Library
Dealing with Data event	Attend an annual conference of researchers talking about their data problems and solutions	Library

# New video portraying a simplified user journey through the services



https://youtu.be/cuaAVum9mZk

> Schools & departments



## Information Services RESEARCH DATA SERVICE

Research Data Service home

Data management planning

Working with data

Sharing & preserving data

Research Data Service video

Data training

About the Research Data Service

Home > Information Services > Research Support > Research Data Service

Research data management planning

Preserve Data Management Planning Use Store

Tools and support for creating data management plans

Working with research data



Tools and support for sourcing, managing and using data during a project

Sharing & preserving research data

Contact us



Ensuring that research data are shared and preserved at the end of a project

### Research Data Service

See how the Research Data Service can help you access, manage, store, share and preserve your research data.

#### Training

A range of training programmes on using data and on research data management (RDM): scheduled workshops, online courses, how to request a tailored workshop for your group.

#### About the Research Data Service

The Service is a suite of tools and support that helps staff and students be effective with their research data before, during and after their project.





#### INFORMATION SERVICES

Contact us



**R** Edinburgh DataShare

#### What is Edinburgh DataShare?

Edinburgh DataShare is a digital repository of research data produced at the University of Edinburgh, hosted by Information Services. Edinburgh University researchers who have produced research data associated with an existing or forthcoming publication, or which has potential use for other researchers, are invited to upload their dataset for sharing and safekeeping. A persistent identifier and suggested citation will be provided.

#### Deposit Your Data



How to deposit Checklist for deposit Benefits of deposit

#### Recently Added

No Thumbnail

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Correspondence Analysis of Old English texts

Lubbers. Thiis

This dataset includes correspondence plots, based on 10 most frequent POS-tag + lexical complementizer unigrams, to accompany Los, B., & Lubbers, T. (submitted). Syntax, text-type, genre and authorial voice in Old English: ...

The Edinburgh Computed tomography and genetic diagnostic criteria for lobar intracerebral haemorrhage associated with cerebral amyloid angiopathy: model development, internal validation and diagnostic test accuracy study

Rodrigues, Mark; Al-Shahi Salman, Rustam

Background: Spontaneous intracerebral haemorrhage (ICH) is usually diagnosed by computed tomography (CT). Case series have described CT features of lobar ICH accompanied by cerebral amyloid angiopathy (CAA) on pathological ...

Persistent three- and four-atom orbital molecules in the spinel AIV2O4

Attfield, John Paul

Electronic instabilities in transition metal compounds may lead to ground states containing orbital molecules when direct metal-metal orbital interactions occur. The spinel AIV2O4 was reported to contain V717+ orbital ...

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DISCOVER

**BROWSE** 

Date Accessioned

2017 (510)



## MANTRA

Research Data Management Training

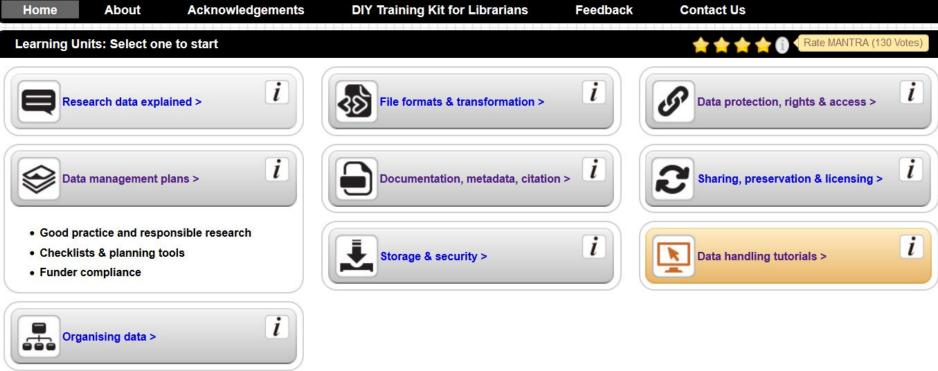
MANTRA is a free online course for those who manage digital data as part of their research project.



















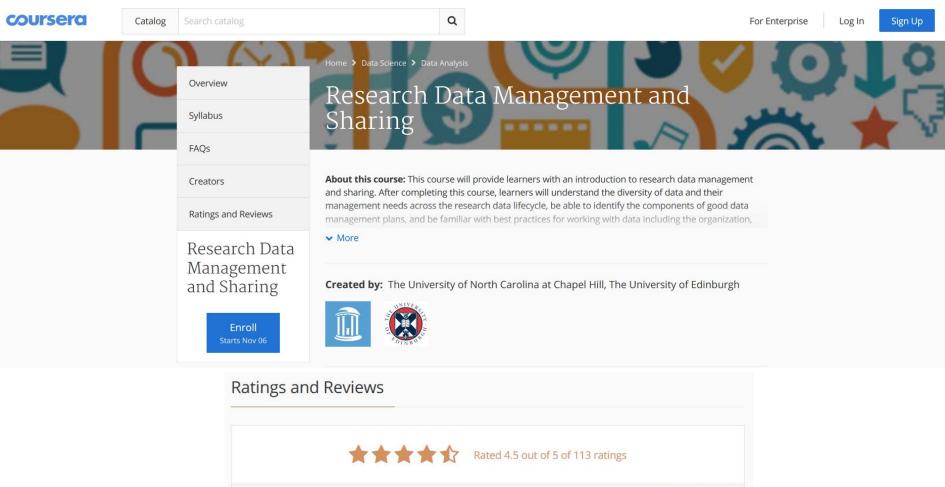


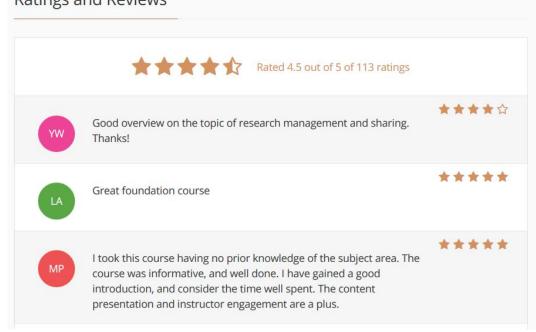












## Reflections as a service provider

- An institutional RDM policy helps to establish the basis of a service and its scope.
- A data lifecycle can help show where service gaps exist.
- By working with IT services, librarians can provide a more holistic service (advice and infrastructure).
- By partnering with academics (such as a steering group), service providers can get more buy-in.
- Data management planning is the only way to ensure RDM is done properly. Errors in data management can lead to data loss or inability to share / re-use data.
- Funder mandates help to persuade researchers to share data, as do journal policies.
- Researchers will welcome RDM services that help them be more productive and impactful. (They will avoid difficult, time-consuming or confusing services.) Usability is key.



# Thank you

www.ed.ac.uk/is/research-data-service

http://datablog.is.ed.ac.uk

http://edina.ac.uk

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