A Data Management Plan Template for Archaeology

Emmanuelle Bryas, INRAP
Nathalie Le Tellier-Becquart, CNRS (MSH Mondes)
Emmanuelle Morlock, CNRS (HISOMA)
General outline
Data Management Plan?

Data Management Plans (DMPs) are a key element of good data management. A DMP describes the data management life cycle for the data to be collected, processed and/or generated by a Horizon 2020 project. As part of making research data findable, accessible, interoperable and re-usable (FAIR), a DMP should include information on:

- the handling of research data during and after the end of the project
- what data will be collected, processed and/or generated
- which methodology and standards will be applied
- whether data will be shared/made open access and
- how data will be curated and preserved (including after the end of the project).

Introduction to data management planning and plans

A data management plan is a document that describes the way you are going to manage the data and datasets related to a project.

- It is an adjustable roadmap.
- DMPs are often required by research funding agencies.
- DMPs also tackle the FAIR data issues to make sure research data are findable and can be reused.

https://www.goshen.edu/academics/data-management/
DMPs with disciplinary standards?

Funding agencies recommend the use of disciplinary standards, formats and repositories.

“Justify the use of certain formats. For example, decisions may be based on staff expertise within the host organisation, a preference for open formats, standards accepted by data repositories, widespread usage within the research community, or on the software or equipment that will be used.”

ANR 2019 template recommendation: https://dmp.opidor.fr/template_export/1858712127.docx

“Specify standards for metadata creation (if any). If there are no standards in your discipline describe what metadata will be created and how”

EC H2020 Fair template recommendation: https://dmp.opidor.fr/template_export/1858712127.docx
The MASA WG methodology

Watch on standards and good practices
How to create a DMP with the MASA template
The DMP OPIDoR platform

1. Connect to https://dmp.opidor.fr/
2. Sign in
Finding the MASA template

DMP Templates

DMP templates provided by a funder or research organisations, available on DMP OPiDoR. You can download these templates and related guidances, create a plan from these templates.

<table>
<thead>
<tr>
<th>Template Name</th>
<th>Organisation Name</th>
<th>Organisation Type</th>
<th>Description</th>
<th>Last Updated</th>
<th>Download</th>
<th>Actions</th>
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</thead>
<tbody>
<tr>
<td>ANR - Modèle de PGD (français)</td>
<td>Agence nationale de la recherche (ANR)</td>
<td>Funder</td>
<td>Dans le cadre de sa politique science ouverte, et en lien avec le Plan national pour la science ouverte, l'Agence nationale de la recherche (ANR) demande l'élaboration d'un Plan de Gestion des Données (PGD) pour les projets financés à partir de 2019. Elle...</td>
<td>07-05-2020</td>
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Creating your own DMP from the MASA template

<table>
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<tr>
<td>MASA - Module de PCD (Français)</td>
<td>MASA Consortium</td>
<td>Institution</td>
<td>Plan de gestion de données pour l’archéologie</td>
<td>15-06-2020</td>
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<td>Ce modèle a été élaboré dans le cadre d’un groupe de travail du consortium Mémoires des archéologues et des sites archéologiques (MASA). Il est basé sur une version initiale réalisée à l’INRAP en 2018.</td>
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<td>décrire les données de manière globale (onglet Généralités sur les données) puis, plus finement, par jeu de données ou lot de fichiers. Ces ensembles de données peuvent être constitués en référence à une typologie documentaire (photographies, transcriptions, fiches descriptives d’objets, etc.) ou selon des ensembles intellectuellement cohérents (étude céramique, d’anthropologie, etc.).</td>
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<td>Si votre projet comporte plusieurs jeux de données, vous devez préalablement les identifier dans la section Produit de recherche (en sélectionnant le type &quot;dataset&quot;). L’onglet Jeux de données est ensuite automatiquement subdivisé en autant de sous-onglets qu’il n’y a de &quot;produits de recherche&quot; afin de permettre une description détaillée de chaque jeu de données.</td>
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<td></td>
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<td>Pour contacter le groupe de travail : <a href="mailto:pgdmasa@groupes-renater.fr">pgdmasa@groupes-renater.fr</a></td>
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<td>MASA - Template for a DMP (English)</td>
<td>MASA Consortium</td>
<td>Institution</td>
<td>Data Management Plan for Archaeology</td>
<td>16-06-2020</td>
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<td>This model was developed by a working group of the Memories of Archaeologists and Archaeological Sites Consortium (MASA). It is based on an initial version produced at INRAP in 2018.</td>
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</tbody>
</table>
Project details: Mock project for training

* Project title

☐ mock project for testing, practice, or educational purposes

Funder

Grant number

Plan Guidance Configuration

To help you write your plan, DMP OPIDoR can show you guidance from a variety of organisations.

Select up to 6 organisations to see their guidance.

Find guidance from additional organisations below

See the full list

Save
“The evolution of Rome’s maritime facade”’s project

Amanda Claridge¹ and Helen Rendell²

1. Department of Classics, Royal Holloway, University of London, UK. Email: A.Claridge@rhul.ac.uk
2. Department of Geography, University of Loughborough, UK. Email: H.M.Rendell@lboro.ac.uk

Cite this as: Claridge, A. and Rendell, H. 2013 The Evolution of Rome’s Maritime Façade: archaeology and geomorphology at Castelporziano (Data Paper), Internet Archaeology 35. https://doi.org/10.11141/ia.35.11

Dataset Location

This dataset has been deposited with the Archaeology Data Service. doi: 10.5284/1000127

Referee

Referee statement by Charles French

Dataset Content

The dataset (Claridge and Rendell 2010) comprises both original digital and digitised (scanned) archival records relating to archaeological, topographical and geophysical fieldwork carried out by British teams at Castelporziano from 1984 to 2009 and geomorphological and environmental fieldwork in the area during 2006-2009 (Rendell et al. 2007; Bicket et al. 2009). The data are organised in 8 sections and 53 subsections, defined primarily by type of survey and then subdivided by individual site or group of sites, and/or data type.
“The evolution of Rome’s maritime facade”’s project details

- **Project title**: ERMF - The evolution of Rome’s maritime facade

- **Plan Guidance Configuration**
  
  To help you write your plan, DMP OPIDoR can show you guidance from a variety of organisations.
  
  Select up to 6 organisations to see their guidance.
  
  Find guidance from additional organisations below
  
  See the full list
  
- **Project abstract**

  This project investigated the evolution of the Laurentine Shore, integrating archaeological and multivariate geographical analysis to achieve a holistic interpretation of the relationship between the built and natural environments. Working primarily within the confines of the modern Castelpecanzo Estate whose sea front extends 7-13 km south-east of the Tibermouth at Ostia, the project focused on the period between 100BC and AD500 and the development of the shore as a maritime façade of luxury vila
"The evolution of Rome’s maritime facade"’s project details

<table>
<thead>
<tr>
<th>ID</th>
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<tbody>
<tr>
<td>Principal Investigator</td>
<td></td>
</tr>
<tr>
<td>Name</td>
<td>Amanda Claridge</td>
</tr>
<tr>
<td>ORCID iD</td>
<td>0000-0003-1689-8356</td>
</tr>
<tr>
<td>Email</td>
<td><a href="mailto:a.claridge@rhul.ac.uk">a.claridge@rhul.ac.uk</a></td>
</tr>
<tr>
<td>Phone</td>
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</tbody>
</table>

Data Contact Person

- [ ] Same as Principal Investigator

<table>
<thead>
<tr>
<th>Name</th>
<th>Richard Lindon</th>
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<tbody>
<tr>
<td>Email</td>
<td><a href="mailto:richard.lindon@ucl.ac.uk">richard.lindon@ucl.ac.uk</a></td>
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<td>Phone</td>
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<td>Project Details</td>
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<td>At the end of the project</td>
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</table>
**Context**

The evolution of Rome's maritime facade

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<tr>
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<th>Datasets</th>
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Basic and administrative information related to the general context of production or collection of the data sets described in the plan.

- **Identification of the project (6 questions)**
- **Description of the project and keywords (4 questions)**
- **Identification of associated archaeological operations (optional) (6 questions)**
- **Document history (4 questions)**

---

International Conference Fair Heritage: Digital Methods, Scholarly Editing and Tools for Cultural and Natural heritage, 06/18/2020 (Online)
Description of the project and keywords

Subject or theme:
Event type (England) GEOLOGICAL SURVEY, EXCAVATION, GEOMORPHOLOGICAL SURVEY, ENVIRONMENTAL SAMPLING, FISH Archaeological Objects (England) COIN, CERAMIC, POT, ROOT, TILE, Animal Bone, Monument Type (England) FISHPOND, FORUM, MOSAIC, VICUS, BUILDING, BATH HOUSE, VILLA, STATUE, DOMESTIC

Save

since emmanuelle.brya@inrap.fr saved the answer below while you were editing. Please, combine your changes and then save the answer again.

Subject or theme:

B /  

epe (England) GEOLOGICAL SURVEY Event Type (England) EXCAVATION Event Type (England) GEOMORPHOLOGICAL SURVEY Event Type (England) ENVIRONMENTAL SAMPLING FISH Archaeological Objects (England) COIN FISH Archaeological Objects (England) CERAMIC FISH Archaeological Objects (England) POT FISH Archaeological Objects (England) ROOT FISH Archaeological Objects (England) TILE

Save

The following answer cannot be saved

Chronology

Roman

Save

since emmanuelle.brya@inrap.fr saved the answer below while you were editing. Please, combine your changes and then save the answer again.

Chronology

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Roman

Save

MAGA example answer

MAGA

If possible, use a controlled vocabulary. It is preferable to use reference vocabularies for the research theme or the community the project is part of. If the repository is online and has perennial identifiers (Uniform Resource Identifier or URI) or "permanent", link the keyword to this identifier.

Using the Patois thesaurus is recommended

Sites

From the Getty Thesaurus of Geographic Names:
World, Europe, Italy, Lazio, Roma province, Roma, Castelporziano [1004239]

Save

since emmanuelle.brya@inrap.fr saved the answer below while you were editing. Please, combine your changes and then save the answer again.

Sites

B /  

From the Getty Thesaurus of Geographic Names Full Record Display
World, Europe, Italy, Lazio, Roma province, Roma, Castelporziano [1004239]

Guidance

MAGA

(Indicate here the keyword(s) that describe the chronological period associated with the project. If the repository is online and has perennial identifiers (Uniform Resource Identifier or URI) or "permanent", link the keyword to this identifier.)

If possible, use a controlled vocabulary. This "Chronology" domain of the Patois thesaurus is recommended.
Identification of associated archaeological operations (optional)
The evolution of Rome's maritime facade: archaeology and geomorphology at Castelporziano
Helen Rendell, Amanda Claridge, 2010

Introduction
Overview
Downloads
Metadata
Usage Statistics

Data copyright © Prof Amanda Claridge, Prof Helen Rendell unless otherwise stated

This work is licensed under the ADS Terms of Use and Access.

Downloads
The Castelporziano archive is split into eight sections, for a detailed guide to the contents of each section please see the overview page. Choose the section of the archive you wish to view from the list below:

- Section 1: Project context & Guide to Site Records
- Section 2: Archaeological Survey and Excavation Datasets
- Section 3: Topographical Survey
- Section 4: Geophysical Surveys
- Section 5: Geomorphological Surveys
- Section 6: Environmental Survey data
- Section 7: Archaeo-Zoological data
- Section 8: Artefact Assemblages

Arts & Humanities Research Council

International Conference Fair Heritage: Digital Methods, Scholarly Editing and Tools for Cultural and Natural heritage, 06/18/2020 (Online)
“Research outputs”
“Research outputs”
Data management: Responsibilities

The data manager must be involved in steering the project (data stewardship) from its creation to its completion.

He/she is responsible for the collection, organization and storage of data. He/she may be a different person from the scientific manager.
Data management: Responsibilities

Other people involved in data management

Data quality manager: Lindon, Richard. Department of Classics, Royal Holloway, University of London

Guidance

MASA

Describe the roles and responsibilities of all those involved in data management: data entry, metadata modelling and production, data quality management and product file management, data storage and backup, archiving and data sharing. Give the name(s) of those in charge as far as is possible.

For collaborative projects, explain how data management responsibilities shared between partners is coordinated.

Answered just now by emmanuelle.bryas@inrap.fr
<table>
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Data overview

The data will be described by batch or dataset. Each dataset will consist of a set of files gathered with reference to a documentary typology (photographs, images, etc.) or according to intellectually coherent sets (ceramic, anthropology study, etc.). The file classification tree can be used as a basis for building batches.

The re-used data will constitute separate lots.

expand all | collapse all

Constructing a corpus (1 question)

Organisation (2 questions)

Volume (3 questions)

Legal framework (1 question)
Data overview: Organisation

The evolution of Rome’s maritime facade: archaeology and geomorphology at Castel Porziano
Helen Rendell, Amanda Claridge, 2010

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- Section 5: Geomorphological Surveys
- Section 6: Environmental Survey data
- Section 7: Archaeo-Zoological data
- Section 8: Artefact Assemblages

For advice on developing a classification plan, you can refer to the guide "Traceabilité des activités de recherche et gestion des connaissances: guide pratique de mise en place" (Traceability of research activities and knowledge management: a practical implementation guide) developed by the CNRS Mission for Transversal and Interdisciplinary Initiatives (2018) which is available on Dorenum.
Datasets

The evolution of Rome's maritime facade

Each dataset will consist of a set of files gathered with reference to a documentary typology (photographs, images, etc.) or according to intellectually coherent sets (ceramic, anthropology study, etc.). The file classification tree can be used as a basis for building batches. The data reused in the state will constitute separate batches.

If your project includes several datasets, you must first identify them in the "research product" section (by selecting the "dataset" type). You will be able to describe each dataset in a dedicated tab.

Be careful!
The questions followed by an asterisk (*) relate to the reused datasets.

expand all | collapse all

Datasets (3 questions)
Description of data (8 questions)
Associated metadata (7 questions)
Data storage (3 questions)
Data safety (3 questions)
Access to data (3 questions)
Protection of sensitive data during the project (2 questions)
Datasets: Associated metadata

Description of data (8 questions)

Associated metadata (7 questions)

The purpose of metadata is to describe the digital document to ensure its traceability and to know:

- the technical characteristics of the file;
- its identifier, and the intellectual content to which it corresponds;
- the context in which it was produced or received;
- under which ownership regime the file is located.

Most of the time they are gathered in a "metadata file" associated with the file they describe.

For more information on metadata:

- Metadata, standards and formats (DORANum)
- Sustainability metadata (CINES)

If it is a reused dataset, complete questions 6 and 7 only.

---

Datasets: Associated metadata

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If it is a reused dataset, complete questions 6 and 7 only.
Datasets: Associated metadata

Which indexing systems were used to describe the data?

The vocabularies developed and maintained by the Forum on Information Standards in the Field of Heritage (FISH): the archaeological object thesaurus, the monument types and Even type thesauri (England)

MASA

- Indicate the indexing system(s) here (controlled vocabularies, ontology, etc.)
- Use the domain system and provide for these to be enriched during the project if necessary.

Example answer:
- People: ISNI and ORCID
- Places: Geonames
- Subjects of the thesaurus: PACTOLS
- Ontology: CIDOC-CRM

Answered 1 minute ago by emmanuelle.bry@inrap.fr
Datasets: Data safety

Guarantee of data integrity and traceability

Describe here the processes put in place to ensure data integrity and traceability. Certain aspects like quality control and access management are covered by the data management plan and do not need to be repeated here. Insist on backup, duplication and version management procedures.

You can refer to the guide "Traceabilité des activités de recherche et gestion des connaissances: guide pratique de mise en place" (Traceability of research activities and knowledge management: a practical implementation guide) developed by the CNRS Mission for Transversal and Interdisciplinary Initiatives (2018) which is available on Doranum.
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Post-project action items

Data preservation and reuse need anticipation and planning, eg:

- User needs
- Data centres requirements
### The evolution of Rome's maritime facade

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This phase aims to describe the following aspects:
- data archiving
- dissemination of data

Expand all | Collapse all
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Archiving policy (created data only) (4 questions)
Dissemination of data (5 questions)
Archiving policy: 4 questions

- Duration of the data retention or conservation
- Final Volume
- Arrangements for data conservation at the end of the project
- Terms and conditions for post-project data access

Terms and conditions for access to data at the end of the project

ADS Terms of Use and Access Summary
https://archaeologydataservice.ac.uk/advice/termsOfUseAndAccess.xhtml
Dissemination: 5 questions

- Dissemination policy
- Embargos?
- Publications
- Reuse potential

Potential for reuse of the data (target user groups, the resources required, etc.).

The dataset is intended to be re-usable in its entirety by the local Italian State archaeological service (Soprintendenza per i Beni archeologici del Lazio) for their own purposes; Sections 3-6 by the Castelporziano estate management (Segretariato Generale della Presidenza della Repubblica Italiana); the archaeological data in Sections 1-2 and 8, especially images, constitute primary research resources for the archaeology, topography and ancient history of coastal Latium (especially the international teams currently working at Portus, Ostia and the Tiber Delta e.g. Salomon et al. 2012), Roman architecture, building materials and techniques, brickstamp studies. The geomorphological and palaeo-environmental datasets (5 and 6) complement those developed independently for the proximal areas of the Tiber delta around Ostia Antica by Bellotti and co-workers (e.g. Bellotti et al. 2007).

Source: Claridge, A. and Rendell, H. 2013 The Evolution of Rome’s Maritime Façade: archaeology and geomorphology at Castelporziano (Data Paper), Internet Archaeology 35. https://doi.org/10.11141/ia.35.11
First input completed!

- Other iterations required to complement and refine the answers
- In a project funded by the ERC or the ANR in France, there are at least 2 versions to deliver.
- DMP OPIDoR facilitates the continuous updating of the DMP.

Source: https://www.openaire.eu/when-do-i-have-to-create-a-data-management-plan
How to link a data deposit to the DMP document?

Data repository assigns PIDs

![Diagram showing how to link a data deposit to the DMP document](image.png)
How to download and share a DMP created with OPIDoR
“Download” tab

Users can configure the document to download:

- section
- format (html, pdf, docx)
- PDF formatting (font, size, etc.)
Wrap up time!
Topics covered in this presentation

- A brief introduction to DMPs and what they are useful for
- The MASA template = a specialized DMP template for Archeology datasets
- How it was tested, and can be improved with your feedback
- A brief overview of the template inside the collaborative platform OPIDoR
  - How to create a DMP with the MASA Template
  - How to fill the forms and answer the questions
  - How to comment, download and share
Feedback welcome!

Online MASA DMP template: https://dmp.opidor.fr/

MASA DMP template mailing list: pgdmasa@groupes-renater.fr

Contacts:

emmanuelle.bryas@inrap.fr  nathalie.le-tellier-becquart@cnrs.fr  emmanuelle.morlock@cnrs.fr

See also MASA’s blog: https://masa.hypotheses.org/
Questions?
Big Thanks to:

- **DMP OPIDoR Team**: OPIDoR assistance
- **INIST-CNRS**: English translation (Ongoing)
- **TGIR HUMA-NUM**: Research infrastructure supporting MASA
- **MASA Consortium**
- **ADS**: Digital repository for Digital Heritage in the UK Data of the example dataset (DOI: 10.5284/1000127)
- **Our Research Centres**:
  - **INRAP** (French National Institute for Preventive Archaeological Research)
  - **MSH Mondes** (House for Houses for the Social Sciences and Humanities) at the University Paris Nanterre
  - **HiSoMA Research Centre** (History and Sources of the Ancient Worlds)