Overview

Data deposition and preservation at the ADS

Louisa Matthews
Collections Development Manager

http://archaeologydataservice.ac.uk
The ADS: Who we are and what we do

• Founded 1996
• Department of Archaeology, University of York
• Collections
  o 1,100,000 metadata records
  o 34,535+ unpublished fieldwork reports
  o 700+ rich archives
• Guides to Good Practice
• DPC Decennial Award 2012

December 2011: Transnational Access Summer School

http://archaeologydataservice.ac.uk

http://archaeologydataservice.ac.uk
Our original philosophy

The ADS supports research, learning and teaching with freely available, high quality and dependable digital resources. It does this by preserving digital data in the long term, and by promoting and disseminating a broad range of data in archaeology. The ADS promotes good practice in the use of digital data in archaeology, it provides technical advice to the research community, and supports the deployment of digital technologies.
How do you know you can trust the way we preserve our data?

- We hold a Data Seal of Approval
- We follow the Open Archival Information System (OAIS) reference model
Our archive policies

Common to traditional archives:
- A collections policy
- Selection and retention, review and disposal
- Sensitive data DPA/FoI requests
- Human Tissue Act 2004
- Licensing and copyright
- Terms and conditions of use
- Charging policy

PLUS:
- ADS Preservation Policy
- ADS Repository Operations
- ADS Ingest Manual
- Copyright Infringement Policy
- Reference Model for an Open Archival Information System
Collections Policy

• Accept all archaeological data types (but in preferred formats)
• Do not impose chronological, geographical or thematic limitations
• Depositor usually should have a UK connection
• Collaborate with local and national agencies
• Collaborate with funding bodies
Deposit Evaluation

• Intellectual content & potential interest in their **re-use**
  - Who will be interested in the data in the future?

• **Viability** of data management, preservation, and distribution
  - Assessment of data structure and format
  - Nature and completeness of documentation
  - Technical and cost benefit issues

• Other suitable archives?
  • - Might the data be better deposited elsewhere, with better suited expertise or re-use potential?
  • - Prevent duplication of archiving efforts within archaeological community
Deposit Requirements

• **Authority** to deposit the data
  • Permissions obtained in terms of Rights over the data.
  • Able and willing to grant repository a licence to disseminate the data.

• Material is ‘**complete**’
  • ADS: finished project archives that will not be added to.
  • Individual digital entity is complete, i.e. not draft a version of paper.

• Digital form in preferred **file format** – consult repository websites
  • Most common file formats accepted
  • Open formats preferred

• Sufficient project documentation and file metadata
Deposit Checklist

### Dataset-level metadata for data collections deposited with the ADS

Please complete this form as fully as possible with details of your dataset. This data will form the basis of an entry about your dataset in the ADS Catalogue, and underpins the computerised searching process that allows users to discover and retrieve information.

1. **Title** - the title (and any alternatives) for the dataset.

2. **Introduction** - a brief summary (200-300 words) of the main aims and objectives of the project. This will appear on the first page of the interface for your dataset.

3. **Overview** - a summary description (200-300 words) of the content of the dataset. This will appear on the Overview page of the interface for your dataset.

4. **Interface Images** - the file names, related caption and copyright information if appropriate for two images to illustrate the Introduction and Overview pages. The image files must be supplied to ADS with this Project-level metadata form.

5. **Subject** - suggest keywords for the subject content of the dataset. If possible, please use existing documentation standards (e.g. The RCHME thesaurus of Monument Types, the MDA Archaeological Object Name thesaurus) and indicate which standard you are following. If you use a documentation standard unique to your organisation, it would be extremely helpful if you could send a copy of it with your dataset.

### Preparing Datasets for Deposit

#### ADS CHECK LIST

**PLANNING STAGE**

- Create a Data Management Plan (DMP)
- Establish the data types you will produce during your project
- Decide on the file formats you will use
- Contact the ADS about your deposit or consider using ADS easy
- Ascertain archive costs and include them and preparation time in tender/funding bid
- Determine all metadata requirements

**DATA COLLECTION STAGE**

- Put secure backup systems in place (remember to regularly backup data)
- Ensure all project members are aware of DMP and are following the same procedures
- Collect data (remember to regularly review data)
- Use file structure and naming rules determined in DMP
- Collect required file-level metadata using ADS templates
- Collect and record any licenses/copyright required

**POST ANALYSIS STAGE**

- Carry out selection and retention strategy
- Tidy data – check file-level metadata, file formats, file structure, file names
- Prepare any accompany documentation – i.e. database relationships, code lists
- Prepare project-level metadata
- Sign deposit license
- Transfer dataset to ADS
Depositing with ADS

1. **Traditional deposit**, one to one for large datasets
2. **ADS-easy** for small to medium data sets
3. **OASIS** for grey literature
‘Traditional’ Deposition

Guidelines for Depositors
Version 2.0 September 2014.

CONTENTS
Introduction to the Guidelines
Why Deposit Data?
Depositing with the ADS
What to deposit
How to deposit
Costs
Preparing Collections for Deposit
Data Management Plans
File Management (Formats, Structure, Naming)
Metadata
Selection and Retention
File-level Metadata Requirements
Documents
Databases, Spreadsheets and Statistics
Raster Images
Geophysics and Remote Sensing
CAD and Vector Images
Geographical Information Systems
Video and Audio
Virtual Reality
Collection-level Metadata
Deposit Check List
Downloads
Acknowledgements

Example of completed metadata sheet for Raster Images files deposited with the ADS
Tools for deposition: ADS-easy

Welcome to ads-easy
ads-easy is a system into which you can upload digital files and associated metadata from archaeological fieldwork and research. On submission these files will be delivered to the ADS for inclusion in our archive.

When should you use ads-easy?
At least for the time being, ads-easy is best used for small to medium sized archives, by which we mean archives of around 300 files of a common type. The system works best with projects that contain straightforward file types such as text, images, spreadsheets and CAD files. ads-easy complements the use of the OASIS system so is especially useful for depositing the digital outputs of small fieldwork projects where you are happy with a simple archive interface i.e. you don’t want an online GDD interface or something similar.

ads-easy can also accept audio, databases and geophysics files but we currently exclude the upload of 3D laser scanning and larger files due to the limitations of using the web to upload large files.

If you are uncertain about whether you should use ads-easy please get in touch and we can talk to you about the options.

Registering for ads-easy
Please click here to register for ads-easy. If you have already registered, please click on the login link on the menu bar above.

Latest news from the ADS
March 2013: Five new archives added to Southampton’s Designated Archaeology Collections Programme
March 2013: Archaeological and cultural heritage investigations on the site of the London 2012 Olympic and Paralympic Games
February 2013: ADS maritime records discoverable through the MEDIN portal
February 2013: Re-release of the HMJ Underhill Archive
January 2013: The ADS growing Grey Literature Library
January 2013: The Archaeological Journal of the Royal Archaeological Institute at ADS
December 2012: Scottish Archaeological Internet Reports at the ADS
Tools for deposition: OASIS

OASIS: Online Access to the Index of archaeological investigations

“The overall aim of the OASIS project is to provide an online index to the mass of archaeological grey literature that has been produced as a result of the advent of large-scale developer funded fieldwork and a similar increase in fieldwork undertaken by volunteers.”
OASIS Deposition

Fieldwork input → Print out → Post → Backlog → Local Archive (govt)

National agency ← Backlog ← Post ← Print out
Create once, use many times

Web service
OAI-PMH
Research projects
Grey literature library
Geophysical Survey database
Radiocarbon Dating Recording Form
DES Form
Web service
Web service

Digital Preservation Standards

Behind the Scenes at the ADS

• Ensure the multiple and regular backups and the renewal of storage media
  • 23 Virtual Machines
  • Tape backup at University of York
  • Deep Store – UK Data Archive
  • Five year hardware rotation strategy

• Use data migration strategies

• Follow the Open Archival Information System (OAIS) reference model
Digital Preservation Standards

• **Submission Information Package (SIP):**
  Original data supplied by the producer (creator or depositor) including documentation to facilitate archiving and reuse.

• **Archival Information Package (AIP):**
  Data generated from the SIP and the long-term Preservation package managed within the OAIS including administrative, technical and reuse documentation.

• **Dissemination Information Package (DIP):**
  Data generated from the SIP/AIP and made available to consumers (users) including documentation to facilitate use.
Submission Information Package (SIP)

- Virus check
- Media and file readability check
- Data resource integrity check
- Documentation completeness check
- Data validation and consistency checks
- Web interface text check
- Copy to data server
- Authenticate original version
- Replace spaces with underscores
- Log details of SIP in Collections Management System
- Create checksums
- Run Droid to generate file level metadata
- Store licence in AIP directory
- Acknowledge receipt of data
- Store original media
Archival Information Package (AIP)

- Select **preservation** and **dissemination** file formats
- Develop a **conversion** plan
- **Convert** the files
- **Validate** file conversion
- **Metadata** update
- Create and store **checksums** for the AIP
- Submit AIP for checking

© Digital Preservation Business Case Toolkit
Dissemination Information Package (DIP)

- Convert the files
- Validate file conversion
- Create web interface
- Allocate permanent urls / DOIs
- Pre-Release interface
- Make any depositor changes
- Release Archive
- Publicise Archive
How to we manage all this?

- The Collections Management System
- Knowledge Base

---

### Data Procedures

<table>
<thead>
<tr>
<th>Data Procedures</th>
<th>Data Procedures</th>
<th>Data Procedures</th>
<th>Data Procedures</th>
<th>Data Procedures</th>
</tr>
</thead>
<tbody>
<tr>
<td>Main page</td>
<td>About</td>
<td>Recent Changes</td>
<td>Staff</td>
<td>Cats</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

- Additional material on dealing with IntraOvs Databases produced by Daniel Lowenberg during an ACE placement.

- Data Procedures: Geophysics (including GPR)
- Data Procedures: GIS
- Data Procedures: Moving Images
- Data Procedures: Photogrammetry (NEEDS REVISING)
- Data Procedures: PFM & RTI (DRAFT)
- Data Procedures: Raster Images
- Data Procedures: Spreadsheets
- Data Procedures: Statistics
- Data Procedures: Harris Matrices (DRAFT)
- Data Procedures: Binary and Plain Text
- Data Procedures: Virtual Reality (NEEDS REVISING)
- Data Procedures: LIDAR (NEEDS REVISING)
- Data Procedures: Websites

---

<table>
<thead>
<tr>
<th>Task View Filter:</th>
<th>View</th>
<th>Attach (15)</th>
<th>Info</th>
</tr>
</thead>
<tbody>
<tr>
<td>Howdy, Louise Matthews</td>
<td>Log out</td>
<td>My Prefs</td>
<td></td>
</tr>
</tbody>
</table>

---

<table>
<thead>
<tr>
<th>Cat Tasks</th>
<th>Task List on/off</th>
<th>Web Interface</th>
</tr>
</thead>
<tbody>
<tr>
<td>ADS-easy projects waiting to be allocated</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Accession exists but is not complete</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Archives waiting to be allocated</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Archives allocated and current</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Archives waiting to be allocated/AIP'd</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Archives waiting to be released</td>
<td></td>
<td></td>
</tr>
<tr>
<td>These archives are embargoed</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Archives waits web interface update</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

---

<table>
<thead>
<tr>
<th>Find pages</th>
<th>Unused pages</th>
<th>Unused pages</th>
</tr>
</thead>
</table>

---

<table>
<thead>
<tr>
<th>medium priority</th>
<th>Low Priority</th>
<th>1 month</th>
</tr>
</thead>
</table>

---

15/05/2019 http://archaeologydataservice.ac.uk 21
That’s the ‘how’ – what about the ‘who’?

- Deposit negotiation
  - Building relationships
  - Building structures
  - Raising awareness
Overview

Data deposition and preservation at the ADS

Louisa Matthews
Collections Development Manager