Digital Preservation in Development

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Outline

- Foundations of Digital Preservation
- OAIS components and examples
- Self-Assessment, Audit and Certification
Two Foundation Documents

Trusted Digital Repositories: Attributes and Responsibilities

Open Archival Information System (OAIS) Reference Model
Three-Legged Stool

digital preservation

technology

organization

resources
Attributes of a Trusted Digital Repository

- OAIS Compliance
- Administrative Responsibility
- Organizational Viability
- Financial Sustainability
- Technological and Procedural Suitability
- System Security
- Procedural Accountability
Ingest developments

- JHOVE (US)
- PRONOM – DROID (UK)
- XENA (Australia)
- National Library NZ metadata extractor
- Checksums (utility)
Administration developments

- PLANETS: Preservation and Long-term Access through NETworked Services (UK/EU)
- PLEDGE: PoLicy Enforcement in Data Grid Environments (US)
Preservation Planning developments

- PLANETS (EU/UK)
- LIFE Project (UK)
Certification and Audit

- RLG-NARA Audit Checklist
- CRL Certification of Digital Archives
- nestor and DINI (Germany)
- Digital Curation Centre (UK)
RLG/NARA Audit Checklist

- Began in 2003
- Public draft September 2005
- Version 1.0 Jan-Feb 2007
  - A. Organizational infrastructure
  - B. Digital object management
  - C. Technologies, technical infrastructure, and security
- Basis for self-assessment and audit
- Starting point for ISO standard, January 2007
A1.1 Repository has a mission statement that reflects a commitment to the long-term retention of, management of, and access to digital information.

The mission statement of the repository must be clearly identified and accessible to depositors and other stakeholders and contain an explicit long-term commitment.

Evidence: Mission statement for the repository; mission statement for the organizational context in which the repository sits; legal or legislative mandate; regulatory requirements.
CRL Audit Project

- Scope: 4 test audits
- Started with RLG/NARA
- Working with DCC and nestor
- Due: late February 2007
- Focus: audit process, common principles
Reporting Out: CRL Report Design

- Provost/CIO statement
- Executive Summary
- Full Report
  - Introduction
    - Institutional overview
    - Scoping the audit
  - Findings
    - Organizational Analysis
      - Governance, Staff, Policies & Procedures, Financial, Succession planning
- Technical Analysis
- Content Analysis
- Vulnerabilities
- Observations & Recommendations
Nestor (2003-2009) and DINI

- Suitable for smaller institutions
- Iterative process for change, evolution
- Principles: documentation, transparency, adequacy, measurability
- nestor developing criteria catalog
- DINI certifying body
- focus: criteria, coaching
Digital Curation Centre, UK

- Test audits – applying checklist
- Outputs: audit report, public report, recommendation for checklist
- Evidence types: documentation, observation, testimonial
- Focus: evidence
In Practice...

- Self-Assessment
  - internal
  - external
  - community-driven
- Audit
- Certification
“Any sufficiently advanced technology is indistinguishable from magic.”

Arthur C. Clarke
Profiles of the Future, 1961