Development and Exploitation of Digital Content for Culture: Initiatives and Actions in National and European Level

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The Process of Digitization

- **Digitization**: Creation, storage and management of digital surrogates of physical objects or other information
- Why digital?
    - Preservation of information
    - Information Management: Efficient search and retrieval of digital content
    - Accessed by everyone – Distance elimination (Internet)
    - Multimedia and VR allow for enhanced/interactive user experience
    - Exploitation (economic etc)

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Digitization Difficulties

- A process of recognized complexity
- Highly demanding in effort and cost
- Involves a variety of evolving technologies
  - Long Term Preservation: Need to maintain and preserve digital information for the long-term
    - Continues during the whole life-cycle of the digital content
  - Digital Asset Management: Organization and Management of high-valued content (*digital assets)* for efficient exploitation
  - Integrity and Authenticity: Protect digital assets against modifications and ensure Intellectual Property Rights
  - Interoperability & International standards: Harmonization of related activities
- Related problems not yet (fully) resolved

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Developing Digital Content for Culture

Cultural Content

Information about Hellenic Cultural Heritage.

• Any type of work, e.g. text, images, video, sound,...

• Objects.

• Existing objects, books, paintings,...

• Non existing objects, e.g. damaged monuments, speech, dances, myths.
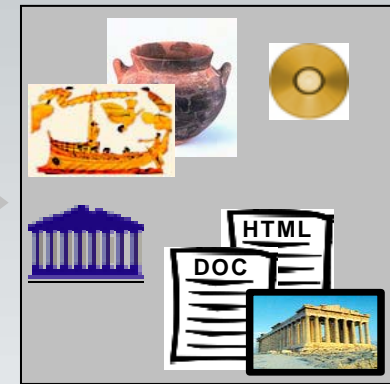
D I G I T I Z A T I O N

Digital Cultural Content

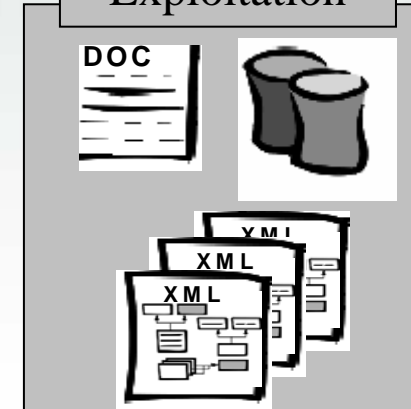Digital Surrogates.

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- Services such as management, search, transfer, acquisition, protection and exploitation…

- Interoperability.

- Open System.

- Copyright protection and Intellectual Property Rights.

- Other services.

Exploitation

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Digitization and Europe

- European Union has long recognized the importance of digitization and preservation

- Various resolutions of ministerial conferences and other committees

- E.g.: the "Lund Principles" (2001, Swedish Presidency)

  - Digitization for strengthening and preserving culture in the Information Society

- Council of Europe resolution on "Preservation of digital memory" (2002, Spanish Presidency)

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The Need for Coordination

- Numerous digitization initiatives across Member States. However:
  - Highly fragmented approach
  - Duplication of efforts and (very large) investments
  - Lack of wide access
  - IPR problems
- *e*Europe 2002 Action Plan (Feira, 2000)
  - Obligation of the Commission and Member States to "establish coordination mechanisms for digitization policies & programmes"

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Coordination at a European Level

- ▶ **National Representative Group (NRG)**
  - Experts from each Member State
  - Originated from the *e*Europe 2002 Action Plan→ "Lund Principles"
  - Meets every 6 months under the chair of each Presidency in order to:
    - Share national experiences
    - Create a common platform for cooperation and coordination
    - Identify and promote good practices
    - Suggestions / interventions to the Commission and Member States

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The MINERVA Project

- **MInisterial NEtwoRk for Valorizing Activities in digitization (IST NoE)**
  - Collaborates with the NRG
  - Provides technical and other support
- **Coordinates 5 expert workgroups on:**
  - Benchmarking of digitization policies
  - Metadata and resource discovery
  - Interoperability
  - Identification of good practices and competence centers
  - Quality and accessibility of cultural web sites

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Actions of the Greek Presidency

- 4th official NRG Meeting under the Greek Presidency (25-26 June 2003, Corfu)
  - Progress review → future goals
  - Opening to the new Member States
  - MINERVA WG update
- Workshop on "Digitization of Cultural Content" (27-28 June, Corfu)
  - Presenting European activity
  - Present best practices and methods for digitization, preservation and management
  - Bring together already existing NoEs (MINERVA, ERPANET, DELOS)

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Actions of the Greek Presidency (contd.)

- The "Patras-Rome Initiative"
  - Enhancing the societal and economic value of digitization and digital preservation in Europe
- Extend benefits of digitization/preservation to a critical mass of organizations that:
  - Possess valuable cultural and scientific content
  - Lack necessary know-how
  - Lack financial resources
  - Requirements collection and analysis (1st phase to be presented in NRG meeting - Corfu)
  - Increased complexity (trusted third parties, technical challenges)

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The Role of HPCLab
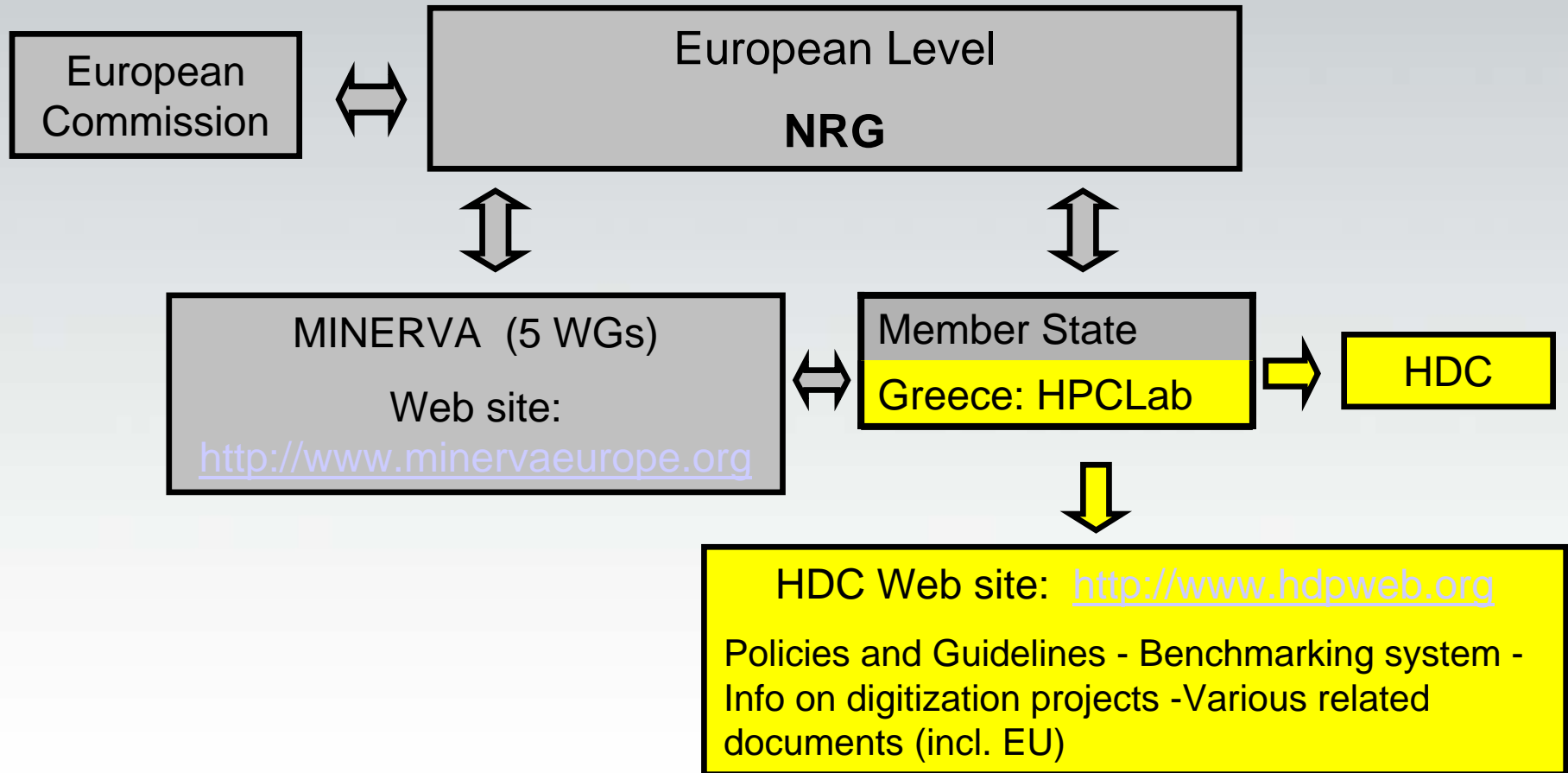
- HPCLab is officially appointed to represent Greece in the NRG
- Also represents the Hellenic Ministry of Culture in Minerva
- Acts as a mechanism for dissemination and follow-up of NRG results in Greece
- Has developed:
  - The 1st benchmarking initiative in Greece
  - A national digitization policy scheme
    - Standards, good practices and guidelines for every phase in the digitization process
  - The official web site of the HDC

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Coordination at National Level

- ▶ Hellenic Digitization Committee
  - Chaired by HPCLab
  - Receives NRG results and updates through HPCLab
  - Responsible for coordinating digitization activities and projects
  - Produces a national digitization policy profile
  - Acts consultively towards the Minister of Culture regarding digitization of the Hellenic Cultural Heritage

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Coordination Structure

European Commission ⟺ European Level **NRG**

MINERVA (5 WGs) Web site: http://www.minervaeurope.org

Member State Greece: HPCLab ⟺ HDC

HDC Web site: http://www.hdpweb.org

Policies and Guidelines - Benchmarking system - Info on digitization projects -Various related documents (incl. EU)

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Exploitation of Cultural Digital Content

- ► **Promotion of Cultural Heritage**
  - ▪ Improved access for the citizen
- ► **Vast markets for economic exploitation**
  - ▪ Tourism – Education – Entertainment
- ► **Hellenic Culture Organization S.A.**
  - ▪ Private organization supervised by the Ministry of Culture
  - ▪ Purpose: To promote the cultural heritage and resources of the country
  - ▪ Digital Applications Directorate
    - • Studies and implementation and supervision of projects and action plans to promote Hellenic Culture in the Information Society

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Funding Digitization

- **European Level**
  - FP6 IST opportunities
- **National Level – 3^d CSF**
  - Sector Operational Programmes
- **Regional Level**
  - Regional Operational Programmes

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Opportunities at National Level

- ▶ "Information Society" Operational Program
  - Measure 1.3: "Documentation, management and promotion of the Greek cultural heritage"
  - A total budget of (roughly) 120M Euros
  - Some calls have already been published
    - HCO S.A.
    - Ministry of Culture

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Indicative Published & Upcoming Calls

- Funding for digitization, e-publishing and thematic portals for about 150 cultural organizations
- ULYSSES: The official web-site of the Ministry of Culture
  - International tender for upgrading and running
- Special devices / systems for visitors in museums and archeological sites ("wearable devices")
- CD-ROM / DVD-ROM for museums and archeological sites
- Thematic on-site VR, complementary to physical sites
  - Archeological site of Olympia (phase A completed)
  - Archeological site of Vergina
  - Unified archeological sites of Athens

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