Relational modelling of historical data: Concepts and challenges

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OpenAtlas

Open source application for archeological, historical and geospatial data.
Stefan Eichert

Main Projects using and supporting OpenAtlas:

**DPP** - Digitising Patterns of Power
Mihailo Popović

**MEDCON** - Mapping Medieval Conflicts
Johannes Preiser-Kapeller
The Model

- Based on CIDOC CRM (entities and properties)
- Entities can be thought of as nouns e.g. a person
- Properties can be thought of verbs linking the Entities e.g. participate
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- Properties can be thought of verbs linking the Entities e.g. participate

Person (Laura) -> participates -> Event (Snowman building)
Data consistency
Data consistency
Data consistency

- Sister of Vivian
- Mother of Ada

- Ruler of Alice
- Ruler of Atlantis
Data consistency

- Alice (Female)
- Ada
- Vivian
  - Sister of Alice
  - Mother of Ada

- Alice (Ruler)
  - Ruler of Atlantis
Data consistency

Alice (Female)

Vivian

Sister of

Mother of

Ada

Alice (Ruler)

Atlantis

DRY
Data consistency

Alice  Sister of  Vivian  Female  Mother of  Ada

Alice  Sibling of  Vivian  Female  Parent of  Ada

Alice  Ruler of  Atlantis
Data consistency

Alice
  Sister of
  Vivian
  Female

Ada
  Mother of
  Vivian

Alice
  Ruler of
  Atlantis

Ada
  Parent of
  Vivian
  Female

Alice
  Ruler of
  Atlantis
Data Quality

- Don't force data entry
  Keep required fields to a minimum

- Don't force to categorize
  Offer expandable categories

- Leave room for fuzzyness
  E.g. for uncertainty with dates or places
You Aren't Gonna Need It

- Avoid speculative data modelling

- Avoid or remove unneeded software functions
  - Test with code coverage

- Don't overthink categories
  - Manage them as you go
Thank you for listening!

This presentation is available at:
http://oeaw.academia.edu/AlexanderWatzinger

OpenAtlas    http://openatlas.eu
Demo           http://openatlas.craws.net
DPP              http://dpp.arz.oeaw.ac.at