Access to e-Helvetica

IIPC General Assembly
22 April 2013

Hansueli Locher

Swiss National Library

hansueli.locher@nb.admin.ch

Content

- Requirements
- Use Case
- Architecture
- Solutions
- Conclusion

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation

Federal Department of Home Affairs FDHA

Swiss Federal Office of Culture FOC
Swiss National Library NL

Requirements

- Integration of all type of digital material
- Web based user interface
  - Layout predefined through the government
  - Adaptation for the needs of disabled people
- Detailed and scalable access management
- Multilingualism (German, French, Italian, English)
- Simple full text search
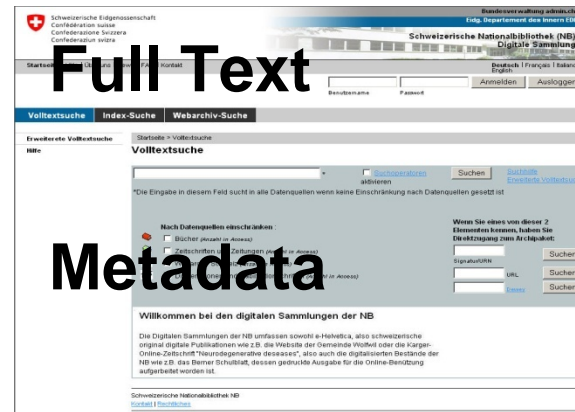- Advanced full text search in combination with metadata filtering

Requirements
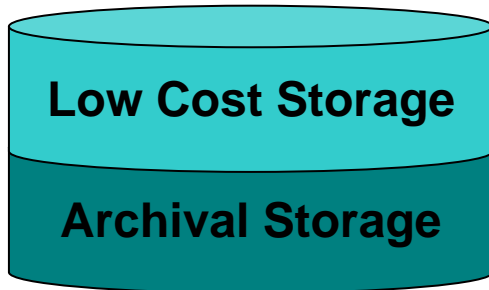
- Wayback Machine as viewer for websites
- Existing environment (metadata structure, database, storage, AIP structure)

Federal Department of Home Affairs FDHA

Swiss Federal Office of Culture FOC
Swiss National Library NL

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation

Use Case

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation

Federal Department of Home Affairs FDHA

Swiss Federal Office of Culture FOC
Swiss National Library NL

Architecture

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation
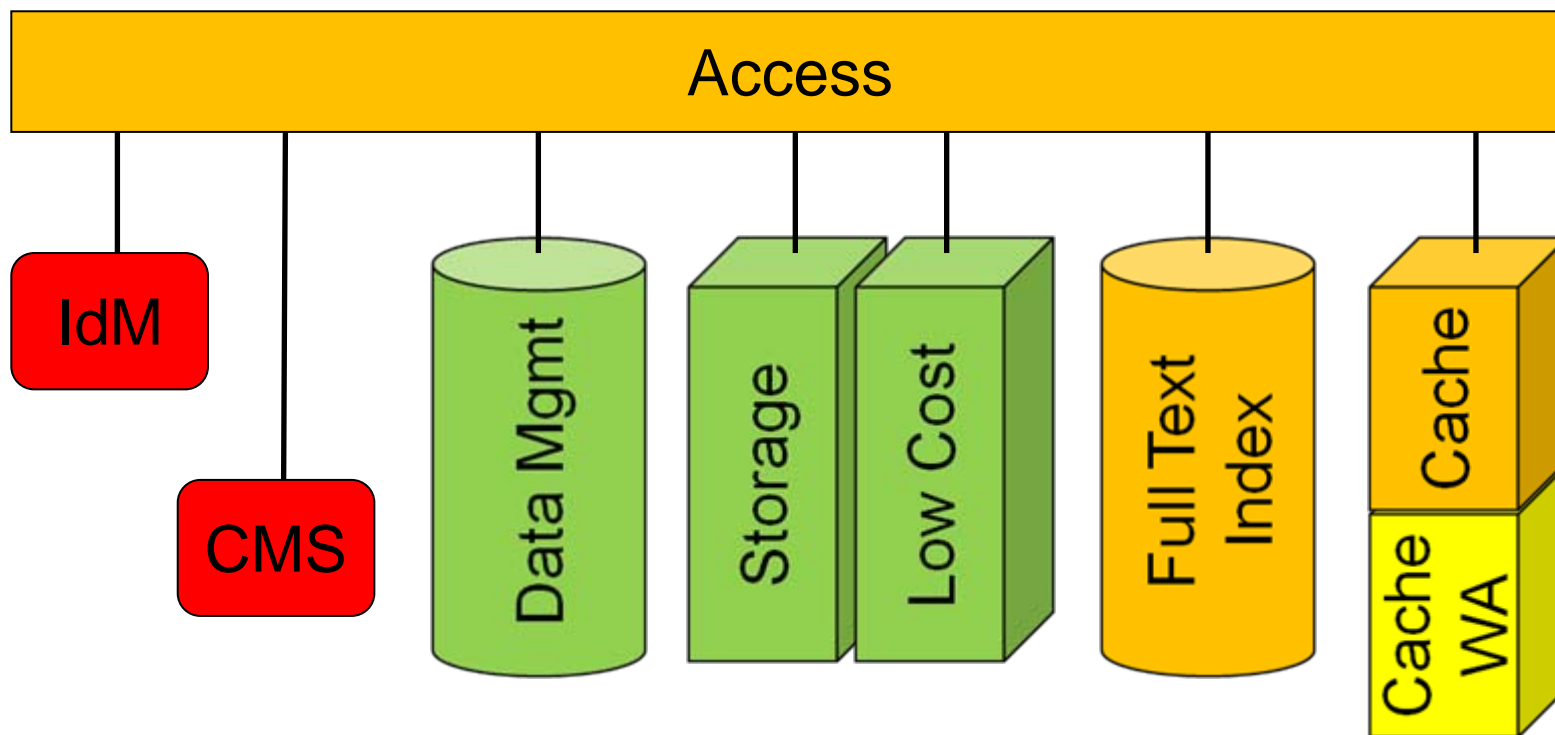
Solutions: Development

- Development trough Office of Information Technology, Systems and Telecommunication (part of the Swiss administration)
- Technology
    - Java
    - ICEfaces
    - Oracle Weblogic Server
    - Oracle database
    - Solr/Lucene
    - Linux (Suse Linux Enterprise)

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra
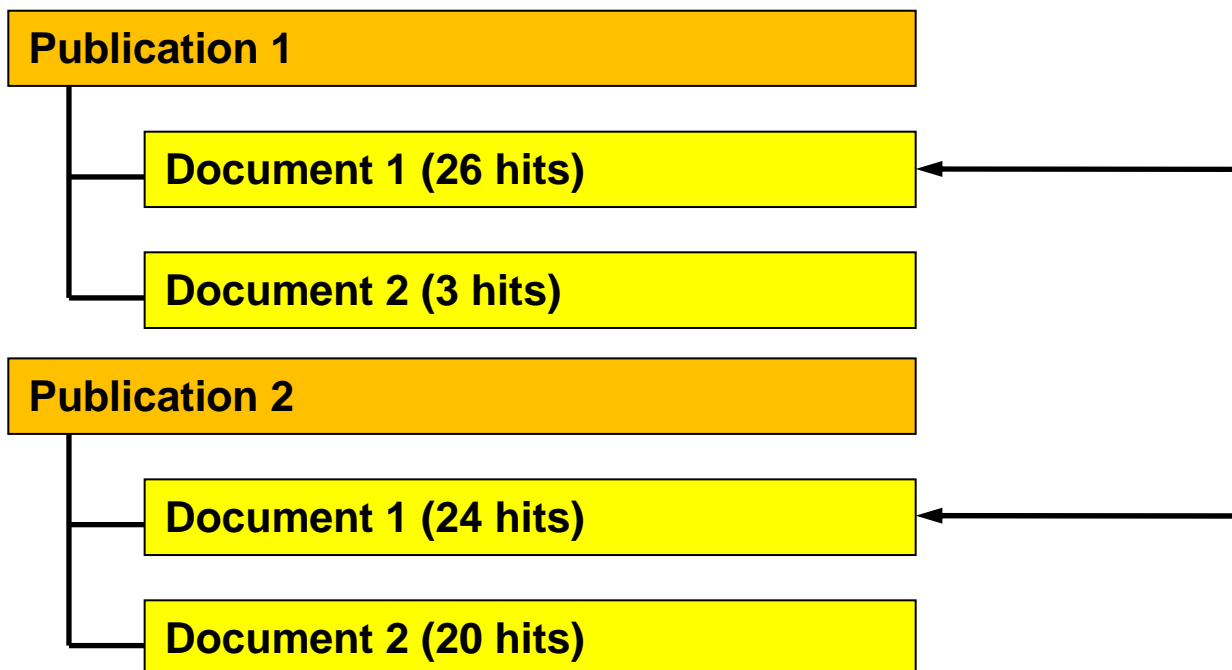
Swiss Confederation

Solutions: Full Text Indexation

- Multilingualism = Challenge
  - Language of a document should be known before full text indexation starts
  - Default language for multilingual documents
- Hit list with two levels
  - First level: Publication
  - Second level: Documents with hits

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation

Solutions: Full Text Indexation

Publication 1

```
        ┌─── Document 1 (26 hits)  ◄─────────────────
        │
        └─── Document 2 (3 hits)
```

Publication 2

```
        ┌─── Document 1 (24 hits)  ◄─────────────────
        │
        └─── Document 2 (20 hits)
```

Federal Department of Home Affairs FDHA

Swiss Federal Office of Culture FOC

Swiss National Library NL

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation

Solutions: Full Text Indexation

- Parameterisation

  - Example: compound expressions

    Hausbau -> haus | aus | bau

    Other occurrences: Ausbau, Bauhaus

Federal Department of Home Affairs FDHA

Swiss Federal Office of Culture FOC

Swiss National Library NL

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation

Solutions: Metadata

- Bibliographic metadata

- Access information

- Size of the documents (download)

- Facets (publication place, publication type, language, publication year)

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation

Federal Department of Home Affairs FDHA

Swiss Federal Office of Culture FOC
Swiss National Library NL

Solutions: Access Rights

- Central identity management system (first step to single sign on)
- Users -> Roles –> Access Rigths
- Info stations with a cookie for more rights
  - Reading room SNL
  - Reading rooms in partner libraries
  - Abuse of the cookie is registered
- Web Archive as a whole is accessible or not

Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Confederation

Federal Department of Home Affairs FDHA

Swiss Federal Office of Culture FOC
Swiss National Library NL

Conclusion

- Access as a mix of existing tools (Wayback Machine, Solr/Lucene, IdM) and new development (user interface, administration of the access rights)

- Access is part of the quality assurance

- Strengts:
  - Web archive integrated in the general digital collection
  - Full text indexing in of the whole collection in combination with filtering based on metadata
  - Access management

- Link to e-Helvetica: http://www.e-helvetica.nb.admin.ch