Mobile Discovery for Libraries and Museums
Motivation
Motivation

Initial Situation

• Mobile devices are gaining ground
  - Any of our patrons brings at least one mobile device to our library.
  - In 2011 for the first time, more mobile devices sold than stationary.
  - In early 2015 for the first time, the majority of queries in one of our favourite search engines was sent from mobile devices.
  - Since 21st April 2015, the same search engine ranks non mobile-friendly webpages lower.

Consequence

• We have to support mobile devices in order to bring our content to the users
  In 2012, we started a multi-year project aiming at mobile discovery for cultural heritage institutions with the goals:
  - Support mobile usage actively (responsive design, low bandwidth, touch-sensitive devices).
  - Complement (not replace) the physical experience by a digital one.
  - Make use of the digital benefits (unbounded space, independency of time and space, semantic linking, ...)
  - Allow digital strolling, explorative search, serendipity, inspiration, ...
Wirklich von überall in der Bibliothek stöbern
Jetzt online: Die für mobile Endgeräte optimierte Version des Suchportals Tufind
Project Consortium

funded by:

LOEWE
Exzellente Forschung für Hessens Zukunft

h_da
HOCHSCHULE DARMSTADT
UNIVERSITY OF APPLIED SCIENCES

software AG

mediatransfer AG

ULB
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nterra

House of IT

STÄDEL MUSEUM
## Use Cases: Museum and Library

<table>
<thead>
<tr>
<th>Städel Museum Frankfurt</th>
<th>University and State Library Darmstadt</th>
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</thead>
<tbody>
<tr>
<td>• Roundabout 110,000 objets d’art (paintings, sculptures, photographs, drawings, and printed graphics)</td>
<td>• Roundabout 4 million printed works</td>
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<td>• Around 1,100 objects may be physically displayed on 7,500 m² at the same time</td>
<td>• almost 500,000 electronic media</td>
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<td>• These are around 1%</td>
<td>• comprehensive old stock (partially digitized)</td>
</tr>
<tr>
<td>➔ Presentation of digital assets and digital strolling</td>
<td>• more than 2/3 of all loans happen electronically</td>
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<td></td>
<td>➔ Find relevant results fast and easily, get inspired</td>
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</tbody>
</table>

**Search & Find (also things that have not been searched for)**
Requirements: Library and Museum

Städel Museum Frankfurt

Requirement: digital strolling
- Topical access (style, artist, atmosphere, ...)
- Presentation of „similar“ objects / semantic linkage
- Additional information (biographies, genesis, audio, video, ...)

University and State Library Darmstadt

Requirement: moving towards relevant results fast
- Topical disambiguation
- Fast drill-down of large result sets
- Topical access by subject areas
- Exploration

Search & Find & Discover (Find w/o Search)
Common Requirement: Device Independence – Responsive Design

- Must run on all standard web browsers
- Support of mobile devices
- Support of touch screens
Touch Sensitive Faceting with a Topic Pie

- account
- topic pie
- location facet
- topical facet
- result list
Alternative: Hierachical Faceting

- allows a fast topical drill-down of large result sets.
- makes use of topical index terms from German common authority file (GND), maps them on the GND taxonomy tree, and generates the pie.

Evaluation

- Qualitative and quantitative evaluations with librarians and university students.
- **Comparison:** mobile optimized version vs. standard application on mobile devices.
- **Main result:** the topic pie makes people curious → it is more intensively utilized than standard faceting by checkboxes, etc. → users find faster what they are searching for:

![Chart showing evaluation results for desktop and tablet versions of the application.](chart.png)
Semantic relations between objects
Enrichment

Johann Heinrich Wilhelm Tischbein
Goethe in der Römischen Campagna
1787

Texte zum Werk


Weitere Texte anzeigen

Sammlungsfilm „Kunst der Moderne“

Informationen zum Werk

Künstler: Johann Heinrich Wilhelm Tischbein
(Haina 1751 - Eutin 1829)
Objektbezeichnung: Gemälde
Comparison mode

VERGLEICHSMODUS

KARL OTTO GÖTZ
OHNE TITEL (BLAU-LILA-SCHWARZ)
1954

JEAN FAUTRIER
GRAND NU
1962

Demo time!

http://m.ulb.tu-darmstadt.de/
public beta launched 1st of July

http://digitalesammlung.staedelmuseum.de
/
public beta launched 15th of March

Try yourself!