Expanding the Academic Research Community: Building Bridges into Society with the Internet

Honors Lecture
UAH, 29 August 2013

Aldo de Moor
CommunitySense

WWW.COMMUNITYSENSE.NL
Outline

- Research communities
- Research 2.0
- Collaboration systems
- Applications
Research communities nothing new
What are communities?

- Communities
  - Strong, lasting interactions
  - Ties between members
  - “Sense of community”
  - Common space

- Common space
  - Physical/digital
  - Spectrum of communicative & collaborative functionalities
    - (“from face-to-face to Facebook”)

- “Ecosystems” of people and technologies
- Great diversity
Communities connect

- Communities increasingly important as form of collaboration and organization
- They break down barriers and connect
  - Cultures, ways of thinking and working
  - Goals
  - Organizations and departments
  - Work and communication processes
  - Information systems and tools
Collaborative communities

- Communities of interest, practice
- Collaborative communities
  - Common **goals**
  - Effective/efficient communication
    - Executing/coordinating work
    - Community governance: roles and processes
Community management not trivial

- Formulating **goals and characteristics** of a new community
- **Aligning** community with organizational goals and related communities
- Creating, configuring, and maintaining "**community spaces**“ (physical and online)
- Creating (initial) **content**
- Defining and populating required **roles**
- **Activating** members
- Facilitating **discussions**
- Resolving **conflicts**
- **Evaluating** community activities
- ** Cancelling** a (sub)community
Research communities on the Internet

Electronic Journal of Comparative Law
Collaboratories

ARCTIC PORTAL

NEWS FEATURES ARCTIC NEWS More News More Features INTERACTIVE DATA MAP

Coastal tourism: questions and answers
19 06 2013
Conference that focused on the fishing environment in northern territories took place in the University of Akureyri, 18 – 19 June 2013. The conference was organized by the Stefansson Arctic Institute in collaboration with the University of Akureyri Research Center, NORA, the Icelandic Tourism Research Center, Norwegian Seafood Center and the Icelandic Lighthouse Society. Marine and coastal culture tourism is growing in popularity in vari... Read more

Cod quota rise for Iceland
18 06 2013
The Marine Research Institute has released its annual report which suggests Icel... Read more

Mackerel debate continues
14 06 2013
Last week Icelandic Ministry of Fisheries and Agriculture was pleased to welcome... Read more

AES call for posters
13 06 2013
Arctic Energy Summit that will take place in Akureyri, northern Iceland 8 – 10 o... Read more

* Sea ice extent View full map
Outline

- Research communities
- Research 2.0
- Collaboration systems
- Applications
Massive Fraud Uncovered in Work by Social Psychologist
Investigation claims dozens of social-psychology papers contain faked data.

Report: Dutch 'Lord of the Data' Forged Dozens of Studies (UPDATE)

I have failed as a scientist.

Posted at 05:38 PM ET, 11/01/2011
Diederik Stapel: The Lying Dutchman
By Joel Achenbach
### (Academic) research: whither?

<table>
<thead>
<tr>
<th>Research stage</th>
<th>Actors</th>
<th>Problems</th>
<th>Solutions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Research question framing</td>
<td>Academics, funders</td>
<td>Limited scope</td>
<td>Collaborative research partnerships</td>
</tr>
<tr>
<td>Data collection and analysis</td>
<td>Academics, few stakeholders (as patients)</td>
<td>Fraud; sloppy science; lab ≠ world</td>
<td>Citizen researchers</td>
</tr>
<tr>
<td>Authoring</td>
<td>Academics</td>
<td>Content, form, and participation</td>
<td>Digital storytelling; group report authoring</td>
</tr>
<tr>
<td>Review</td>
<td>Academics (peers)</td>
<td>Peer review system outdated, overloaded, biased, promotes conformity</td>
<td>More collaborative process; post-publication review; external stakeholder participation</td>
</tr>
<tr>
<td>Dissemination</td>
<td>Publishers, libraries; university departments; academics</td>
<td>Restricted access; no associated data and stakeholder voices</td>
<td>Open access; open data; community/social media</td>
</tr>
<tr>
<td>Impact assessment</td>
<td>---</td>
<td>Non-existent</td>
<td>Social media; long-term collaborative partnerships</td>
</tr>
</tbody>
</table>

(Source: de Moor, A., forthcoming. Expanding the Academic Research Community: Building Bridges into Society with the Internet. In Denison, T., Sarrica, M. & Stillman, L. (Eds.), Theories, Practices and Examples for Community and Social Informatics, Melbourne, Australia: Monash University Publishing.)
Data analysis++: Galaxy Zoo

Online Community

SHAPE
Is the galaxy simply smooth and rounded, with no sign of a disk?

Smooth
Features or disk
Star or artifact
Data collection & analysis++:
PatientsLikeMe
Building research bridges

The Academic Community
- Academics
  - Universities
    - Faculties/depts/institutes
    - Libraries
    - Science shops
    - Academic for a Comm depts
- Publishers
- Science funders

Research stage
- Research question framing
- Data collection and analysis
- Authoring
- Review
- Dissemination
- Impact assessment

Society
- Citizens
- Corporations
- NGOs
- Governments
- Mass media
## Community-based research

<table>
<thead>
<tr>
<th>Participation level</th>
<th>Researcher role</th>
<th>Community role</th>
</tr>
</thead>
<tbody>
<tr>
<td>Research on communities</td>
<td>Total control</td>
<td>No</td>
</tr>
<tr>
<td>Research for communities</td>
<td>Outsider</td>
<td>In name of community</td>
</tr>
<tr>
<td>Research with communities</td>
<td>Partners</td>
<td>Partners</td>
</tr>
<tr>
<td>Research by communities</td>
<td>Facilitating</td>
<td>Leading</td>
</tr>
</tbody>
</table>

Research communities 2.0

Authoring: Video stories

Publish Video stories

Impact assessment Discussions

Vegetarians community

Researchers community

Publish Papers

Vegetarians community

Researchers community
Outline

- Research communities
- Research 2.0
- Collaboration systems
- Applications
From the “central information systems” of way back...
To the “digital habitats” of today
Social media = fragmented conversations

Building collaborative communities

- Research processes
- Information systems
- Social media + physical meetings

CONVERSATIONS
Collaboration systems development

Social system

Collaborative requirements

Tools

Technical system

Information Systems

Conversations

Request → Promise → Produce → Report → Evaluate → Request

Roles

Goals

Participation

Look
Do
Interact
Collaborate

facebook
LinkedIn
Twitter
MediaWiki
WordPress
delicious
Charting research “webs of conversation”
Outline

- Research communities
- Research 2.0
- Collaboration systems
- Applications
Academic research 2.0

Stakeholders

Interview

Interview-videos

Indexing

Indexed video fragments

Librarian

Literature Review

Relevant publications + taxonomy

Students

Debate Preparation

Discussion leader
Social innovation

“With all stakeholders jointly find sustainable solutions to societally relevant problems”
The social innovation process

Conclusions

• Research process in transition. Redefinition of concepts: academic, fundamental, applied research
• Community-based research is a cornerstone
• Research communities 2.0: new forms of
  – collaboration
  – stakeholder roles
  – (use of) digital and physical technologies
• Developing socio-technical collaboration systems does not happen “just like that”…