Domain Analysis: Assumptions and New Techniques

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Available at: https://works.bepress.com/jenna_hartel/44/
Type of event:  Discussion Panel

Title of even/session:  Domain Analysis: Assumptions and New Techniques for Articulating Domains

Short abstract:

Domain analysis is a stalwart approach to research in Library and Information Science. Its basic premise is that studying relationships between people and information ought to be approached from a social perspective – that is to go beyond individual behavior and action to that of a collective knowledge domain. It is also known as socio-cognitivism (Jacob & Shaw 1998) or collectivist metatheory in that it emphasizes information phenomena within social, organizational and professional contexts (Talja et al 2005). Such social or cultural concerns first appear in Pierce Butler’s course, Scholarship and Civilization, (1973:1944) taught in the LIS PhD program at the University of Chicago, and can be traced through the vision for social epistemology (Egan & Shera 1952) of his student, Jesse Shera.

The powerful and enduring appeal of domain analysis has recently been celebrated in a special issue of the Journal of Knowledge Organization. The foremost contemporary formulation of domain analysis appeared in a report of a software development study (Hjørland & Albrechtsen 1995) and it has evolved into a methodologically diverse framework that offers an alternative to universalistic approaches. Hjørland’s discussion on the application of domain analysis outlined 11 approaches (Hjørland 2002) and stands as the nearest thing to a methodological statement among several theoretical contributions (Hjørland 2004) Across the broader information science literature, many domain-analytical studies take a bibliometric or informetric approach, as a way to understand scholarly communication, evolving literatures, and related effects on information retrieval (Vakkari & Talja 2006, Fry & Talja 2007, Talja et. al 2007, Smiraglia 2015, Late 2014, Puuska 2014), a key example of which is White & McCain (1998). Yet the versatility of perspectives and approaches is becoming evident across the literature that pairs domain analysis with additional theoretical approaches (see Talja & Maula 2003, Sundin & Johannisson 2005, Andersen 2005, Robinson 2009, Hartel 2010). Given the growing pluralism of approaches, it appears there is no quintessential research design for domain analysis.

In a timely contribution to the broader LIS community, this panel presents emerging methodological approaches and analytical techniques for carrying out domain analysis. The panel will contribute to the ongoing debate about the substance and form of epistemic and ontological character of domain analysis. It offers a disruption
of the normative assumptions of domain analysis by representing the expanding spectrum of approaches with specific techniques of interdisciplinary, arts informed, ethnographic, and cultural approaches.

The event is designed to cut across the specialty areas of LIS and have appeal to a broad audience. The perspective from classification and information behavior, among others, will be represented. Participants were also drawn to have geographic diversity and come from different stages in their scholarly careers, capturing a range of generational viewpoints.

**Organizer:** Eva Hourihan Jansen, Doctoral Candidate  
Faculty of Information, University of Toronto

**Length** 90 minutes

**Participants:** Expected number of participants 25-35 attendees are anticipated due to the broad appeal of research methodologies among cogent disciplines.

**Proposed Format:**

<table>
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<tr>
<th>Item</th>
<th>Panelist</th>
<th>Timeframe (minutes)</th>
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<tbody>
<tr>
<td><strong>Introduction</strong> of panelists Goals and Overview of the panel – role of participants</td>
<td>Eva Hourihan Jansen</td>
<td>2</td>
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<tr>
<td><strong>Part 1:</strong> Introduction to Domain Analysis – a commentary on the background and philosophical assumptions of domain analytical approaches.</td>
<td>Birger Hjørland</td>
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</table>
| **Part 2:** Presentation of methodological techniques from recent empirical studies for consideration in Domain Analysis. | Sanna Talja  
Isto Huvila  
Eva Hourihan Jansen  
Jenna Hartel | 7  
7  
7  
7 |
| **Part 3:** Open up to discussion among panelists and session participants. | All | 45 min |
| **Conclusion** Thank panelists and participants. | Eva Hourihan Jansen | 2 min |
**Purpose, goals and expected outcomes:** The purpose of the panel is threefold.

First, and most importantly, the panel will revisit an important and evolved approach to research in LIS to discuss recent developments and assumptions relevant to research practitioners across the LIS disciplines. It will further introduce areas for debate concerning underlying assumptions of methodological approaches and analytical techniques related to domains.

Second, the panel will explain new and lesser known analytical techniques and offer practical advice for researcher considering the advantages and limits of domain analytical approaches. Each panelist will bring forward outstanding questions concerning domain analytical approaches to seed discussion with participants.

Third, for experienced scholars and those who have not yet engaged in domain analysis, this panel will bring together current and evolving trends to inspire domain analysis as an approach to LIS research. Introducing what may be called *interpretive* approaches to domain analysis, the panel will discuss empirical instances that give rise to new questions and contribute to debates about research in LIS while expanding methodological techniques available for their pursuit. The contribution adds another dimension to the *descriptive* and *instrumental* techniques described by Tennis (2012) and further expands the original composition of approaches described by Hjørland (2002).

**Panel Composition:**

**Birger Hjørland,** Professor, Royal School of Library Information Science, University of Copenhagen.

As a leading authority on the epistemology of domain analytical approaches, Professor Hjørland will introduce the background and theoretical value of domain analysis for information science. He will present his position on the current state of domain analysis and the range of underlying philosophical assumptions represented in this work. His presentation will conclude with a call to future action in the ongoing development of this core approach to information science.

**Sanna Talja,** Associate Professor, Unit of Information Sciences, University of Tampere Finland.

There is long tradition on conducting comparative domain analytic studies of scholarly publishing and reading practices at the University of Tampere. These studies have extended the theories of academic cultures presented by Whitley and Becher to explain disciplinary differences in the production and use of different types of publications and texts. The aim is provide a deep picture of the nature of reading, writing and literatures in disciplines. For this purpose, qualitative and ethnographic studies as well as large-scale nation-wide quantitative studies and bibliometrics research has been undertaken. Professor Talja will talk about the main benefits, problems and lessons learned from using these different methodological approaches as the importance of domain analytic research for research policy
continues to grow.

**Eva Hourihan Jansen**, doctoral candidate, Faculty of Information, University of Toronto, Canada. Eva Jansen's presentation will focus on the advantages and disadvantages of ethnographic techniques for studying a classification system. She will describe participant observation and ethnographic writing techniques as ways to map new grounds for inquiry in knowledge organization practices. Citing exemplars from an ethnographic study of occupational classification in the field of immigrant employment support, Eva highlights interpretive techniques that helped to relocate some assumptions of domain analytic approaches to knowledge organization.

**Isto Huvila**, Professor in Library and Information Science, Department of ALM Uppsala University, Sweden
Professor Huvila’s presentation will consider his long-term research engagement with the domain of archaeology and to what extent the techniques and approaches combining insights from systems thinking, ecological approach and information behavior research in a domain analytical framework contribute to developing ecological knowledge of intersecting domains such as archives and archaeology. The presentation discusses how a domains ‘live’ their life, how they participate and get involved in other domains and what is the role of knowledge organization systems and information infrastructures in it.

**Jenna Hartel**, Associate Professor, Faculty of Information, University of Toronto, Canada.
Hartel will report emerging results of an arts-informed, visual paradigm (2014a, 2015). Using domain analysis as a point of departure, she collected drawings of information from 8 disciplines at the University of Toronto. Her work attempts to discern visual evidence that disciplinary and epistemological forces shape understandings of information across academe. Put differently, do biologists invoke natural motifs when the envision information? Do musicians seek inspiration from musical notation? This study is the first to integrate domain analysis with emerging arts-informed and visual methodologies.

**References**

Albrechtsen, Hanne. This is Not Domain Analysis. *Knowledge Organization*. 42(8), 557-561.


Butler, P. (1973) Scholarship and civilization. Chicago, [Ann Arbor] : [University Microfilms], 1944 ;


