

Workshop

The World Wide Web and Access to Knowledge

Date: 9-10 February 2006

Location: Oxford Internet Institute, 1 St.Giles, Oxford OX1 3JS

The workshop will begin after lunch on 9th February and continue until lunch on 10th February. There will be five presentations (see below) and a roundtable on future directions. The workshop is being held as part of the ESRC 'Science in Society' project RES-160-25-0031 'The World Wide Web of Science: Emerging Global Sources of Expertise'.

Attendance: The workshop is free and open to the public, but numbers will be strictly limited and assigned on a first come basis. Please email events@oii.ox.ac.uk if you would like to attend.

Speakers and Abstracts:

1. Mike Thelwall

Professor of Information Science, School of Computing & Information Technology, University of Wolverhampton

Analysing Public Debates of Science through Blogs and News Sources

This talk will explore how Rich Site Syndication (RSS) feed technology can be used to track the dynamics of high profile events over time. The talk will include both high-tech and low-tech solutions and will be illustrated by a case study of one contemporary issue, addressing the issue of "winner takes all" in the context of media-driven science-related debates.

2. Elizabeth van Couvering

Ph.D. student, Department of Media and Communications, London School of Economics

Strategies for Gatekeeping the Internet: the Power of Search

Search engines are one of the primary, if not *the* primary method of navigation online. But search engine companies, which make the technology that people use to find their way around the web, are unregulated, concentrated, and unaccountable for the results they produce. It has been shown in a variety of studies carried out by computer science researchers that results are significantly biased towards large, corporate and American sites. We do not yet have a clear view of why this is so; an extensive review of over 1000 articles and 40 doctoral dissertations found no research that studied search engine production. This presentation will address that gap, both through a political economic review of the search engine industry and interviews with search engine producers, distributors and optimisers.

3. Andrea Scharnhorst

Senior Research Fellow, The Virtual Knowledge Studio for the Humanities and Social Sciences, Royal Netherlands Academy of Arts and Sciences

Indicators from the web - making the invisible visible?

In this paper we present different attempts to use web data for science, technology and innovation indicators. Based on research done in the WISER project we reflect about methodologies of web data gathering and techniques of analysis. The main questions are which characteristics of e-science become measurable on the web, how to deal with instability of information and how qualitative and quantitative approaches can be linked to each other to give meaning to web-based indicators.

4. Matthew Hindman,

Assistant Professor, Political Science Department, Arizona State University

From Production to Filtering: The World Wide Web and Shifting Patterns of Information Exclusivity

One puzzling feature of online life is that, though the number of information sources available online is vast, online audiences are just as concentrated as audiences in many traditional media. Much of the paradox can be explained, I argue, by acknowledging that the Internet is not so much “democratizing” information flows, as it is shifting the bar of exclusivity. While the Internet has made electronic publishing highly accessible, the rapid expansion of online content has increased the importance of filtering mechanisms—some obvious, some not. This talk discusses several ways in which the infrastructure of the Internet promotes winners-take-all traffic patterns at both the macro and micro level. In particular, it looks at the link structure of online topical communities, and at data on how citizens use search engines.

5. The World Wide Web of Science and Global Expertise: Democratizing Access to Knowledge?

Ralph Schroeder, Jenny Fry and Shefali Virkar, Oxford Internet Institute

This paper will present the results of a study which has examined how the World Wide Web and other online resources are used by researchers to access expertise in their fields. Several ‘global’ topics were examined, including ‘climate change’, ‘HIV/AIDS’, ‘terrorism’ and ‘Internet and society.’ The study synthesized online and offline data. Webmetric analysis was used to determine the most highly linked sites, while a series of interviews with researchers in these fields was conducted to determine which online resources they accessed and how they accessed them. This paper will focus on the interview data, and especially how researchers use search engines and what types of online resources they use most frequently. The aim of the study is to identify whether the Web democratizes access to knowledge or creates even steeper hierarchies than those that exist for offline knowledge.