Just Because You Don’t See Them, Doesn’t Mean They Aren’t There: Tracing Scholars and Their Use of Resources

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Fiesole
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And, add data to the mix

Decreasing Spatial Coverage
Increasing Process Knowledge

Intensive science sites and experiments
Extensive science sites
Volunteer & education networks
Remote sensing

Adapted from CENR-OSTP
Relationship between virtual use and in-person use of library collections--
First some background
Electronic resources expenditures as a percent of total materials expenditures

- 1999-2000: 12.88%
- 2000-2001: 16.25%
- 2001-2002: 19.6%
- 2002-2003: 25.02%
- 2003-2004: 31.33%
- 2004-2005: 37.46%
- 2005-2006: 40.93%
- 2006-2007: 46.56%
- 2007-2008: 51.46%
- 2008-2009: 56.33%
University of Tennessee-Knoxville Downloads

UTK Article Downloads

<table>
<thead>
<tr>
<th>Year</th>
<th>Downloads</th>
</tr>
</thead>
<tbody>
<tr>
<td>FY04-05</td>
<td>1,338,638</td>
</tr>
<tr>
<td>FY05-06</td>
<td>1,461,040</td>
</tr>
<tr>
<td>FY06-07</td>
<td>1,990,350</td>
</tr>
<tr>
<td>FY07-08</td>
<td>1,946,883</td>
</tr>
<tr>
<td>FY08-09</td>
<td>2,556,722</td>
</tr>
<tr>
<td>FY09-10</td>
<td>4,496,516</td>
</tr>
</tbody>
</table>

Center for Information and Communication Studies
Total circulation across libraries

<table>
<thead>
<tr>
<th>Year</th>
<th>Circulation</th>
</tr>
</thead>
<tbody>
<tr>
<td>2001</td>
<td>467,277</td>
</tr>
<tr>
<td>2002</td>
<td>452,223</td>
</tr>
<tr>
<td>2003</td>
<td>470,733</td>
</tr>
<tr>
<td>2004</td>
<td>496,366</td>
</tr>
<tr>
<td>2005</td>
<td>475,216</td>
</tr>
<tr>
<td>2006</td>
<td>468,403</td>
</tr>
<tr>
<td>2007</td>
<td>456,597</td>
</tr>
<tr>
<td>2008</td>
<td>429,626</td>
</tr>
<tr>
<td>2009</td>
<td>414,492</td>
</tr>
</tbody>
</table>
Second, results of recent studies…
Highlights from studies of:

- Syracuse University (use of library)
  - Completed 2011
- 6 universities in the UK (scholarly reading)
  - Over 2000 academic staff responses
  - Report published February 2012
- University of Illinois (scholarly reading)
  - Preliminary data (As of 4/2012, ~400 responses)
  - New surveys at US and Australian universities
- ACRL libraries (data management services)
  - November 2011-January 2012
  - 221 libraries, 63% response rate to stratified sample of ACRL libraries

United Kingdom—University of Manchester, University of East Anglia, University of Dundee, Durham University, Imperial College, and Cranfield University.
Syracuse University faculty use of library

<table>
<thead>
<tr>
<th>Activity</th>
<th>Average last 30 days</th>
<th>% of respondents</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical Visits</td>
<td>2.9 visits</td>
<td>73%</td>
</tr>
<tr>
<td>Remote Visits</td>
<td>14.2 visits</td>
<td>88%</td>
</tr>
</tbody>
</table>
Syracuse University faculty use of library

<table>
<thead>
<tr>
<th>Activity</th>
<th>Average last 30 days</th>
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</tr>
</thead>
<tbody>
<tr>
<td>Average Total Resources Used:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>in-person visit to the library</td>
<td>7.3 uses</td>
<td>80%</td>
</tr>
<tr>
<td>remotely online</td>
<td>14.9 uses</td>
<td>89%</td>
</tr>
</tbody>
</table>
Reading and Scholarship Surveys (Tenopir & King, 1977-present)

- Measure purpose, outcome, and value from scholarly reading by focusing on critical incident of last reading
- Include all reading (from library and not)
- Details on how and where readings are discovered and obtained
- Details on format and location of reading
Tenopir & King scholarly reading studies, 4 types of questions:

1. Demographic
2. Recollection
3. Critical Incident
4. Comments

Therefore, insights into both READERS and READINGS
Academics read a lot of material

Articles: 22/month; Book: 7/month (6 in UIUC); Other: 10/month

Annual totals:
Articles: 264
Books: 84
Other Publications: 120
(Total scholarly reading per year is 468)
Varies by discipline (UK, UIUC)
Sciences
27
33
Engineering/Technology
28
21
Medical Science/Health
31
44
Humanities
28
22
Social Sciences
21
20
Comments from UIUC

I need fast and unfettered access to electronic copies of peer-reviewed journal articles.

I use the pdf book resources available through the library. This has helped not only my work but has increased my ability to pursue other scientific interest or enrich class content.

More and more journal articles are available online, an enormous source of time efficiency.
Excludes outliers and humanities. 298 in the UK, 283 in the UIUC to date
We defined repository as “institutional repository” in the US surveys and “subject or institutional repository” in the UK.

UK: Other — 4.5% Dept/school subscription; 2.2% repository; 2.4% other (email, conference, publisher, office)

UIUC: 8.6% dept/school subscription (included with library); 2.7% repository; 5.9% other (email, conference, publisher, office)
This pie is for all sources, but 72% of library articles are electronic and 28% are print library articles.
Did you obtain the article from a print or electronic source?

**U.S (2012)**
- Electronic: 78%
- Print: 22%
- n=219

**U.K (2011)**
- Electronic: 85%
- Print: 12%
- n=1183

UIUC: April 4, 2012, 
UK: June 2011
Question: Did you obtain your article through a print or electronic source?

UK: 94% electronic; 6% print (n=775)

UIUC, March 15, 2012: 91% electronic, 9% print (9 of 106)
Just because they read *from* library collections (library collections only)...

Library-provided material only.
US, 2005: 40.5% from print journal/photocopy
UIUC, April 4, 2012: 14% print journal/photocopy, 51% computer screen; 30% downloaded and printed. .8% on e-reader. (n=251)

UK: 13% print journal/photocopy
The library is the source of scholarly articles, not books

- Article Reading: 67
- Book Reading: 27
- Other Publication Reading: 15

n=2117, 6 UK universities, June 2011
Of the purchased books, 3% were e-books, 5% of library books were e-books, etc.

9% of all book readings are from e-books.

% of book readings from sources: 40% of books are purchased; 27% are library provided; 8% are from colleague; 15% are from publisher, and 9% are other: these include were free on the web, and the print ‘other’ books include community library and from training, part of a project, or a seminar)
Comments from the UK:

As someone who travels around the country with my job, it's the wide range of e-journals that are amazing. Putting those together with search facilities such as Embase and Science Direct opens up a library wherever I am.

Never visit the library these days. I do all my searching on-line. Time to divert library resources.
Research Data Services (RDS) currently offered by the library or planned to be offered in the future

- **Directly participating with researchers on a project (as a team member):** 21% have, 8% within 12 months (1 year), 5% within 1-2 years, 7% over 2 years, and 59% no plans.

- **Providing technical support for RDS:** 15% have, 8% within 1 year, 9% within 1-2 years, 10% over 2 years, 58% no plans

- **Creating or transforming metadata for data or data sets:** 12% have, 4% next year, 10% next 1-2 years, 8% over 2 years, and 66% no plans

- **Identifying data/data sets that could be candidates for repositories on or off campus:** 11% have, 12% next year, 11% next 1-2 years, 11% over 2 years, and 56% no plans

- **Preparing data for deposit into repository:** 10% have, 9% within 1 year, 9% within 1-2 years, 9% over 2 years, and 64% no plans.

- **Deaccessioning/deselection of data for removal from repository:** 6% have, 4% within 1 year, 6% within 1-2 years, 7% over 2 years, and 77% no plans.
Providing reference support for finding and citing data: 44% have, 7% within 12 months (1 year), 9% within 1-2 years, 6% over 2 years, and 34% no plans.

Creating web guides and finding aids for data: 22% have, 16% within 1 year, 10% within 1-2 years, 8% over 2 years, and 44% no plans.

Consulting with faculty, staff, students on data management plans: 21% currently have, 7% in next year (12 months); 6% in next 13-24 months; 9% over 2 years; and 57% no plans.

Consulting with faculty, staff, students on data/metadata standards: 18% have, 8% in next year; 8% in next 1-2 years; 8% over 2 years; and 58% no plans.

Discussing research data services with other librarians or other people on campus or RDS professionals on a semi-regular frequency: 19% have, 13% within 1 year, 6% within 1-2 years, 9% over 2 years, and 53% no plans.

Training co-workers in your library, or across campus on RDS: 11% have, 13% within 1 year, 6% within 1-2 years, 8% over 2 years, and 61% no plans.

Outreach and collaboration with other RDS providers on or off campus: 11% have, 8% next year, 6% next 1-2 years, 9% over 2 years; 66% no plans.
Moving forward…

• Scholarly e-books, will reading patterns change?
• Research data services, how will the library and publishers be involved?
• More scholarly materials designed for more mobile devices