Training Material
Demystifying Scholarly Publishing: Selecting scholarly publishing venues to maximize your impact while avoiding "predatory publishers"

Do you often wonder how to select a journal in which to publish or wonder about the quality of a journal? This workshop will demonstrate tools to identify potential journals in your field, how to determine impact factors for journals (Journal Citation Reports, Scimago), how to find where a journal is indexed for dissemination, and tools to evaluate the quality of journals. Reputable, peer-reviewed Open Access journals are on the rise, but so are "predatory publisher" that charge publication fees but do little in terms of peer review. Tips and tools to identify legitimate open access journals and avoid predatory publishers will also be covered, to help you determine if publishing in a specific open access journal will be worth the author fee.

<table>
<thead>
<tr>
<th>Date</th>
<th>Time</th>
<th>Instructor</th>
<th>Attend</th>
</tr>
</thead>
<tbody>
<tr>
<td>Thursday, January 29</td>
<td>Noon – 1:00 p.m.</td>
<td>Sandy</td>
<td>Attend Session</td>
</tr>
<tr>
<td>Wednesday, February 11</td>
<td>3:00 p.m. – 4:00 p.m.</td>
<td>Sandy</td>
<td>Attend Session</td>
</tr>
</tbody>
</table>

Enroll in the Demystifying Scholarly Publishing: Selecting scholarly publishing venues to maximize your impact while avoiding "predatory publishers" Online Workshop
UNIVERSITY OF IOWA
Determining Your Scholarly Impact

Deciding Where to Publish Articles
- Ulrich’s advanced search screen
- Jane - http://www.biosemantics.org/jane/
- Database searching

Roadmap for Today
- Pre-publishing
  - Determining Where to Publish
  - Determining the Impact of Journals
- Post Publishing
  - Determining the Impact of Specific Articles and Researchers
    (and maybe determining the impact of journals at this point, too)

Determining the Impact of Journals
- Impact Factor
- Eigenfactor
- Open Access
- Indexing

Impact Factor
A quantitative measure of the frequency with which the “average article” published in a given scholarly journal has been cited in a particular year or period; this is used in citation analysis (http://www.library.tudelft.nl/tulib/glossary/index.htm#I)

Eigenfactor
Utilizes data from ISI’s Journal Citation Reports. Contains two numbers:
- Eigenfactor – Determines journal’s total importance to the scientific community. Based partially on the size of the number of articles published by a journal.
- Article Influence – Average influence of each of article over its first five years after publication. Similar to impact factor.
Where to find Impact Factors and EigenFactors
- Ulrich's
  - Journal Citation Reports (JCR)
  - Eigenfactor.com

Determining the Impact of Specific Articles and Researchers
- Cited Reference Searching
  - H Index
  - Altmetrics

Cited Reference Searching
More accurate if done at the article level, but can also be done at the researcher level.
- Web of Science – Allows you to include incorrectly cited resources.
- Scopus – Easy interface
- Google Scholar – Larger number of hits. Sometimes inflated due to duplicates.

What is H-Index OR Hirsch Index?
- Based on a formula that calculates the average number of citing articles for all items in a predefined set.
- Used to measure the productivity and impact of the published works of a particular researcher or even a group of researchers.

Where do you find your H-Index?
- Web of Science – Run an author search, then create a “Citation Report.”
- Scopus – Run and author search, then click “Citation Overview.”
- Researcher ID
- Google Citations http://Scholar.google.com/citations

Altmetrics
This is the measurement of the impact an article has on social media such as Twitter, Facebook, etc. For more information, see http://blog.lib.uiowa.edu/needtoknow/2013/08/08/interesting-articles-on-altmetrics/
Overall Preparation Tools

- Publish or Perish
  [http://www.harzing.com/pop.htm](http://www.harzing.com/pop.htm)
- Calculates
  - H-index
  - Egghe’s g-index
  - Zhang’s e-index
  - Age-weighted citation rate and AW-index
  - Multi-authored h-index
  - Average annual increase in the individual H-index
  - And more

Librarians and Tenure

- Open discussion

Closing Words

- Bibliometrics are flawed.
- Tenure requirements can vary greatly between departments and disciplines.
- Faculty generally appreciate the knowledge and expertise we can share with them during this time in their careers.
How to Determine Your Scholarly Impact

**Agenda**

1. Determining Where to Publish
   a. Ulrich’s

2. Determining the Impact of Journals
   a. Ulrich’s
   b. Journal Citation Reports (JCR)
   c. Eigenfactor
   d. Open Access Journals

3. Determining the Impact of Specific Articles and Researchers
   a. Cited Reference Searching
      i. Web of Science, Scopus, and Google Scholar
   b. H Index
      i. Web of Science – Run an author search, then create a “Citation Report.”
      ii. Scopus – Run and author search, then click “Citation Overview.”
      iii. Researcher ID
      iv. Google Citations
   c. Overall
      i. Publish or Perish [http://www.harzing.com/pop.htm](http://www.harzing.com/pop.htm)
   d. Altmetrics

**Services at the Library**

- Assistance in determining the amount of times a publication has been cited.
- Assistance in locating the impact factor for a journal.
- Assistance with using bibliographic management tools to manage and cite references
- Assistance with other questions. Just ask!

**Deciding Where to Publish**

- **Ulrich’s (Listed under “u” on Electronic Resources page)**—Find out if a journal is peer-reviewed, who it’s published by, where it’s indexed, impact factors, and more.
- **ISI Journal Citation Reports (Under Electronic Resources)** – This is where you can find impact factors, Eigenfactors, and Article Influence Scores.
- **Open Access Journals**: The open access movement strives to make scholarly research available to everyone. These journals are free due to a different publishing model (an organization or the author pays for publishing costs. For more information, see [http://www.lib.uiowa.edu/openaccess/](http://www.lib.uiowa.edu/openaccess/)

**Determining Impact**

- **Web of Science**—Go here to see who has cited your work or the work of someone else.
- **Scopus** – Another option for seeing who has cited your work or the work of someone else.
- **Google Scholar** ([http://scholar.google.com](http://scholar.google.com)) – This is another way to see who has cited your work. Keep in mind that is not quite as reputable as Web of Science.
• **Impact Factor**: A quantitative measure of the frequency with which the "average article" published in a given scholarly journal has been cited in a particular year or period; this is used in citation analysis (definition retrieved from [http://www.library.tudelft.nl/tulib/glossary/index.htm#I](http://www.library.tudelft.nl/tulib/glossary/index.htm#I)).

\[
\text{Impact Factor for Journal X = \frac{\text{Citations in 2013 to articles published in X in 2011 and 2012}}{\text{Articles published in X in 2011 and 2012}}}.
\]

• **Eigenfactor**: The Eigenfactor is another way to rank journals based on their influence in the field. It tries to get around some of the issues that make impact factors controversial. To find out more, see “Why Eigenfactor?” at [http://www.eigenfactor.org/whyeigenfactor.htm](http://www.eigenfactor.org/whyeigenfactor.htm).

• **H-Index**: This number is based on a formula that calculates the average number of citing articles for all items in a predefined set. It can be used to measure the productivity and impact of the published works of a particular researcher or even a group of researchers. The h-index was developed by Jorge E. Hirsch and published in *Proceedings of the National Academy of Sciences of the United States of America* 102 (46): 16569-16572 November 15 2005. It is sometimes referred to as the Hirsch Index.

• **Altmetrics**: This is the measurement of the impact an article has on social media such as Twitter, Facebook, etc. For more information, see [http://blog.lib.uiowa.edu/needtoknow/2013/08/08/interesting-articles-on-altmetrics/](http://blog.lib.uiowa.edu/needtoknow/2013/08/08/interesting-articles-on-altmetrics/).

### Managing References

#### Citation Management Tools- EndNote and RefWorks

<table>
<thead>
<tr>
<th></th>
<th>EndNote desktop</th>
<th>RefWorks</th>
<th>EndNote Basic</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Best use</strong></td>
<td>Those with complex, ongoing research projects and planning on career of publication who are primarily using the same workstation for research and writing.</td>
<td>RefWorks will no longer be available after December 2014. Less complex projects. Ideal for those who are going to be using multiple computers for research.</td>
<td>Less complex projects. Ideal for those who are going to be using multiple computers for research.</td>
</tr>
<tr>
<td><strong>Location of files</strong></td>
<td>Locally on your computer</td>
<td>On RefWorks site (server)</td>
<td>On EndNote site (server)</td>
</tr>
<tr>
<td><strong>Getting citations in...</strong></td>
<td>Automatic export from many databases. 2 step process if not available.</td>
<td>Automatic export from many databases. 2 step process if not available.</td>
<td>Automatic export from many databases. 2 step process if not available.</td>
</tr>
<tr>
<td><strong># of styles</strong></td>
<td>Over 4500</td>
<td>Over 2700</td>
<td>Over 2000</td>
</tr>
<tr>
<td><strong>Sharing</strong></td>
<td>Because library lives on your computer, sharing is through sharing of computer or compressing files. Colleagues will need EndNote installed to view.</td>
<td>RefShare feature allows you to share folders or your entire library with anyone with an internet connection (though pdfs cannot be shared in this way).</td>
<td>Allows you to share folders or your entire library with anyone with an internet connection, and allows you to grant people editing rights to your citations.</td>
</tr>
<tr>
<td><strong>Overall strengths</strong></td>
<td>Great for very large amounts of citations. Also has a feature that can pull some PDF’s and automatically attach them to citations.</td>
<td>Very easy to learn, use anywhere with an internet connection. Easy to share citations with others.</td>
<td>Very easy to learn, use anywhere with an internet connection. Easy to share citations with others and to allow others full access to citations.</td>
</tr>
</tbody>
</table>

More information on citing sources: [http://guides.lib.uiowa.edu/citingsources](http://guides.lib.uiowa.edu/citingsources)

http://www.lib.uiowa.edu/hardin
319-335-9151
aeb 12-9-14
Accessing the Database
1. Go to the Hardin Library homepage at http://www.lib.uiowa.edu/hardin/
2. Click on the link that says “Health Sciences Resources A-Z.” It is located at the bottom of the section, “Popular Databases.”
3. Select “Ulrich’s” from the list.
4. If you are off-campus, you will be prompted for your Hawk ID and password.

Searching for a Specific Journal
1. Enter the name of the journal for which you are looking and click the “Submit” button. If you have trouble, you may want to find the journal’s ISSN (unique identifier) and search for the journal that way.

Searching for Journals by Subject
Advanced Search (Recommended)
1. From the Ulrich’s home page, click on the link for “Advanced Search.”
2. When looking for journals in your subject area consider doing a “Keyword” first. The subjects are very specific and sometimes hard to guess.
3. Keep in mind that you have further options for your search including limiting to “active titles” and “refereed titles.”

Subject Search (If you know of a journal in your field)
1. From the homepage, select “title (keyword)” from the drop box and put in the name of your journal.
2. Now, click on the title of the journal you searched.
3. You will see links for the subject the journal covers. Clicking those links will display all the journals in that area that are contained in Ulrich’s.

Finding Impact Factors/Eigenfactors
1. Follow the directions for “Searching for a Specific Journal.”
2. Once you have clicked on the journal name, look to the top left of the screen. You will see a box that says JCR.
3. This page will simply have the impact factors for the journal. To see the Eigenfactor and more information, click the “Return to Journal” button.

Journal Citation Reports
Accessing the Database

1. Go to the Hardin Library homepage at http://www.lib.uiowa.edu/hardin/
2. Click on the link that says “Health Sciences Resources A-Z.” It is located at the bottom of the section, “Popular Databases.”
3. Select “Journal Citation Reports” from the list.
4. If you are off-campus, you will be prompted for your Hawk ID and password.

Searching for Journals by Subject (Recommended)

1. Once you have accessed the database, you will have options to select the science or social science database. Keep in mind that the most recent scores will be from the previous year.
2. On the right, you select “Subject Category” from “View a Group of Journals By” and then click on “Submit.”
3. Next, select your subject category.
4. Select “View Journal Data,” and then choose how you would like your results sorted from the drop box.
5. Click “Submit.”
6. Now, you will see a list of journals in the category you chose. If you look to the top left of the screen, you will notice options for sorting the journals by title, impact factor, Eigenfactor, etc. You can also decide to view the category summary list (this may help with interpreting the impact factors since those can vary greatly between different subjects.)
7. Clicking on a journal title will allow you to see more information, such as how the impact factor was determined, the number of self cites for that journal, etc. To learn more about any of the data in Journal Citation Reports, use the “i” icon.

Searching for a Specific Journal

If you are searching for a specific journal title’s impact factor or Eigenfactor, you may want to use Ulrich’s. It is a slightly easier interface. You may also consider looking for a particular journal in a subject set as in the directions above.

1. Once you have accessed the database, you will have options to select the science or social science database. Keep in mind that the most recent scores will be from the previous year.
2. On the right, you can select “Search for a Specific Journal” and then click on “Submit.”
3. Now, click on the link for “View List for Full Journal Titles.”
4. Use your computer’s find function (on a PC it is ctrl + F) to locate the journal title you are looking for
   NOTE: Not all journals have impact factors.
5. Now, copy that journal title exactly as it appears in the list, and close the window with the journal titles.
6. Select “Full Journal Title” from the search page and then paste the copied journal title into the search box.
7. Finally, click search.

Web of Science: Cited Reference Searching
Accessing the Database

2. Click on the link that says “Health Sciences Resources A-Z.” It is located at the bottom of the section, “Popular Databases.”
3. If you are off-campus, you will be prompted for your Hawk ID and password.

Searching

1. The first thing you will want to do is to click the tab for Web of Science. It is located near the top of the screen.
2. Now, click on the link for “Cited Reference Search.”
3. Start with the author’s name. You want to enter it as [lastname firstinitial*]. The asterisk tells the database to search for the author if they are cited by just their initial or by their whole name or by two initials.
4. Now, for the journal title, you want to click the link that says “Journal Abbreviation List.”
5. Once you open the list, you will want to find your journal. Click on the letter of the first “Non-stop word” of the journal title. (Stop words include: A, the, or, and, etc.)
6. Now, you can scroll down the list till you find your journal (Or use Ctrl+F to search for the title). Copy the abbreviation.
7. Close the journal title window.
8. Paste the abbreviated journal title into the “Cited Work” search box. You will want to follow the name of the journal with an “*” as you did with the author name.
9. For the date, leave the box blank. This is very important as many articles are cited with incorrect dates.
10. Click the “Search” button at the bottom of the screen.
11. You will now see a list of possible articles by your author. Select all that could possibly be the article you want. For example, if you were looking to see how many times this article, M.A. Marra, S.J.M. Jones, C.R. Astell, et al. “The genome sequence of the SARS-associated coronavirus.” *Science*, 300 (5624): 1399-1404, May 30, 2003, was cited, you would receive the following list to select from. (See image on next page).
12. Check the box to the left of all the citations that could be the same as the one you are for which you are looking. Then, click the link near the bottom left of the page that says “Finish Search.”

13. At the left of the page, you will see options for refining your results. For instance, you may want to only see the times an article was cited in another article (see image to the right).

14. You’ll find the number of times the article was cited listed near the top left of the page.

<table>
<thead>
<tr>
<th>Select</th>
<th>Cited Author</th>
<th>Cited Work</th>
<th>Year</th>
<th>Volume</th>
<th>Page</th>
<th>Article ID</th>
<th>Citing Article</th>
<th>View Record</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2006</td>
<td>313</td>
<td>1599</td>
<td>10.1126/science.1125691</td>
<td>730</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2005</td>
<td>369</td>
<td>434</td>
<td>10.1126/science.1126080</td>
<td>411</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2004</td>
<td>305</td>
<td>636</td>
<td>10.1126/science.1105136</td>
<td>602</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>33</td>
<td>1389</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>1999</td>
<td>286</td>
<td>2468</td>
<td>10.1126/science.1015983</td>
<td>254</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2009</td>
<td>324</td>
<td>522</td>
<td>10.1126/science.1195588</td>
<td>114</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2007</td>
<td>316</td>
<td>222</td>
<td>10.1126/science.1139247</td>
<td>399</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2008</td>
<td>314</td>
<td>941</td>
<td>10.1126/science.1133609</td>
<td>205</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2005</td>
<td>387</td>
<td>1321</td>
<td>10.1126/science.1107773</td>
<td>234</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2004</td>
<td>300</td>
<td>1399</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>1</td>
<td>2</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>1399</td>
<td>1</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>524</td>
<td>1389</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>300</td>
<td>1391</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>310</td>
<td>624</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2002</td>
<td>300</td>
<td>1399</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>300</td>
<td>1377</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>300</td>
<td>1388</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>300</td>
<td>1399</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
<tr>
<td></td>
<td>Marra M</td>
<td>SCIENCE</td>
<td>2003</td>
<td>300</td>
<td>1401</td>
<td>10.1126/science.1085983</td>
<td>2</td>
<td>View Record</td>
</tr>
</tbody>
</table>

Results: 1,124
Scopus: Cited Reference Searching

Accessing the Database
1. Go to the Hardin Library homepage at http://www.lib.uiowa.edu/hardin/
2. Click on the link that says “Health Sciences Resources A-Z.” It is located at the bottom of the section, “Popular Databases.”
3. If you are off-campus, you will be prompted for your Hawk ID and password.

Searching
1. Enter the author’s name, “lastName firstInitial,” into the first search box. Change the drop box to “Authors,” then “Add Search Field” using the link below the search box.
2. Enter the name of the journal using the “Source Title” drop box option.
3. Enter the article title using the “Article Title” drop box option.
4. Click Search.
5. The number of times the work was cited shows up on the far right of the screen. You can click on the link to see which articles have cited that work.

Google Scholar: Cited Reference Searching

1. Go to www.scholar.google.com
2. Type the title of the article you are searching for into the search box, and click “Search.”
3. If Google has information on other people citing the article, you will see a link that says “Cited by #.”
H-Index: Creating a ResearcherID Account

1. Go to [http://www.researcherid.com/Home.action](http://www.researcherid.com/Home.action) and create a free account on the left-hand side. You will enter your email address, receive an email with a link, and then enter the rest of your information.

2. Once you have created your profile, you can edit it to add more information and determine what information will be visible to members of the public.

3. To add publications to your account, click on Add Publications.

4. The two easiest options under Add Publications are Search *Web of Science*, and Search *Web of Science* Distinct Author Sets.
   a. If the author has a unique name, Search *Web of Science* should work fine. The name should be pre-entered. Add a middle initial if there is one. If you are unsure if the middle initial is used, enter the first initial followed by a * (e.g., J*).
b. If there are several authors publishing under the same name, try Search Web of Science Distinct Author Sets. As above, the name should be pre-entered and add the middle initial or * as needed. Once you perform the search, Web of Science will attempt to identify sets of articles that it thinks are by the same author. Use the author names, years, and journals to help determine which set is the right set. Very often there will be multiple correct sets due to the way the software works. In this case, click on the number to the right and work with the first set and then go back and work with subsequent sets.

5. Once you have a set of articles, take a look at them and compare them to the list of publications on the CV. If the first few articles appear correct, I would recommend adding all of them to My Publications and then weeding out the incorrect ones. To add to My Publications, click “Select Page” and then “Add.” Repeat with subsequent pages until all citations are added.

6. If using the Distinct Author set and you need to add more citations, do so now. When you are done, click on “Return to Researcher Profile” at the top of the screen.
7. You should now see the publications on the right-hand side of your screen. Compare the citations here to those in the CV. Sort by “Publication Year” to make the comparison easier.

8. If there are incorrect citations (i.e., not by the correct researcher), you can select them by clicking “Manage List” at the top right of the “My Publications: View.” You can then select the incorrect citations and click “Delete Selected Publications” to remove them.

9. If there are citations on the CV that were not found by your first search, you can try searching again using the Search Web of Science option and entering the article title instead of the author name. Note that meeting abstracts may not be in the database.

10. If you cannot find a citation using the Web of Science tools we discussed, you can enter the citation into EndNote Web or into a tool such as EndNote or RefWorks. While EndNote Web will import directly into ResearcherID, EndNote and RefWorks require you to export the citation in RIS format and import it into your publications list using the “Upload RIS File” option under “Add Publications.” For assistance doing this, please contact the Hardin Library at 335-9150 or lib-hardin@uiowa.edu.

   a. EndNote Web (www.myendnoteweb.com) provides the fastest and easiest way to add citations to ResearcherID. Sign in using the same username and password as ResearcherID. Select New Reference from the Collect menu, then enter the citation information in the correct fields (for books, include publisher and city in the Title field as these fields will not display in...
Representative Documents: Training Material

How to Determine Your Scholarly Impact

Click on Unfiled on the left-hand side, select the citations you entered, and then select “My Publications” from the “Add to group…” dropdown. The citations should now be in your ResearcherID account.

b. In EndNote, select Export from the File menu, then select “Refman (RIS) Format” as your Output Style. If you do not see Refman as an option, click on “Select Another Style” from the top of the drop-down and then locate it. You can then import the records into ResearcherID.

c. In RefWorks, select Export from the References menu, indicate whether to export all citations or those from a folder, select “Bibliographic Software” export format, and export to a text file. You
can then import the records into ResearcherID.

11. Once you have entered all the necessary publications, you can calculate the h-index and other metrics by clicking on “Citation Metrics” under “My Publications.”

Google Scholar Citations

http://Scholar.google.com/citations

Another option for determining impact at an author level. There are instructions for setting up your page once you sign up for an account.

Further Assistance

We are more than happy to assist you with any questions you may have.

Feel free to contact us at 319-335-9151 or lib-hardin@uiowa.edu

http://www.lib.uiowa.edu/hardin
319-335-9151

aeb 12-9-14
---Title of session
Scholarly Impact: Traditional and Alternative Metrics

Name and Position of Presenter
Ericka Raber, Research and Instruction Librarian
Amy Blevins, Clinical Education Librarian

Date, Time, Venue
Tuesday, April 29th, 2014, from 10 to 11 am in LIB 2032.

Session description:
Ericka and Amy will provide an overview of some traditional and alternative metrics for measuring scholarly impact. Some tools to be discussed include Journal Citation Report, Web of Science, Scopus, Eigenfactor, H-index, Google Citations, and ImpactStory.

Who should attend?
Library staff who interact with faculty and want to learn more about impact factors, citation counts, or alternative tools for measuring scholarly impact.

Special Instructions
This session is really geared toward those who attend, so please bring questions, examples, or supply the presenters with questions or subtopics ahead of time to get the most out of this session.
TAKING CONTROL OF YOUR RESEARCH VISIBILITY

A hands-on guide to improving research “impact” for scholars

Marc L. Greenberg & Ada Emmett
University of Kansas
Sept. 2014

Copyright in this work is held by Marc L. Greenberg and Ada Emmett, however, we license it under the Creative Commons Attribution-Noncommercial-Share Alike 3.0 United States License. To view a copy of this license, visit http://creativecommons.org/licenses/by-nc-sa/3.0/us/ or send a letter to Creative Commons, 171 Second St., Suite 300, San Francisco, California, 94105, USA.
Today

1. Big picture of impact
2. Types of Article Level Metrics (ALM) and what they can do for you.
3. Recipe for Visibility
4. Time for questions/assistance
Types of article-level metrics (ALM)

1. **Usage** - How many downloads? Where downloaded?
   a. Examples: KU ScholarWorks, Academia.edu

2. **Captures** - How many bookmarks, shares (CiteULike, Mendeley)
   a. Example: how many “reads” an item in Mendeley has been

3. **Mentions** - Mentions in non-academic media (news stories, Wikipedia, etc.)
   a. Example: Altmetric

4. **Social media** - Facebook, LinkedIn, Twitter shares
   a. Example: Altmetric

5. **Citations** - Classic metric for “impact”
   a. Example: GoogleScholar, GoogleScholar Metrics

Read more in SPARC’s Article-Level Metrics Primer.
Our recipe for visibility

1. Know your rights w.r.t. copyright and keep as many as you can. Timothy K. Armstrong: An Introduction to Publication Agreements for Authors.

2. Work with KUSW*: a digital repository curates your work, makes it openly available, and it tracks usage.

3. Register with ORCiD and claim your electronically visible research, differentiate it from others’ publications with the same or similar names.

4. Claim an Academia.edu page and link there to your papers in KUSW. Academia also connects you to the global community of scholars in your areas of interest.

5. Claim and make public your GoogleScholar page. Edit it to weed out duplicates and works mistakenly attributed to you. Keep track of your h-index (the number h of your works cited h or more times).

Read more in this short blog post.

*
Next Steps:

If you have not already done so, please do the following.

- Establish a Gmail (Google) account: [https://mail.google.com](https://mail.google.com)

Once you have opened the account and logged in, acquaint yourself with the various services that are available through Google, especially “Scholar” ([scholar.google.com](http://scholar.google.com)).

- Establish an Academia.edu account: [http://www.academia.edu](http://www.academia.edu)

Fill out some information about your academic profile, e.g., title, research interests, upload a headshot (optional).

- Find your department’s or program’s collection in KU ScholarWorks: [http://kuscholarworks.ku.edu](http://kuscholarworks.ku.edu)

- Register for an ORCiD ID: [https://orcid.org/register](https://orcid.org/register)
Taking control of your research visibility
A hands-on guide to improving research “impact” for scholars
Marc L. Greenberg (Dept of Slavic Languages & Literatures), Ada Emmett (KU Libraries, Office of Scholarly Communication)

Getting Set Up

Put aside a bit of time to set up several accounts, instructions for which we will provide below.

In the following, we suggest you sign up for a number of services that involve giving your name and some professional data to various entities that are “players” in the emerging field of research statistics. (Guess what? They already have some of your data!)

We are confident that these entities are focused on research data only and, so long as you do not provide personal data (birthdates, social security number, etc.) to them, they should not affect your personal privacy. In general, however, you should realize that as soon as you publish your work, your professional data is “out there” regardless of your volition, and the tools we are discussing should help you to be more in control of how and where your data is used, check its accuracy and correct it as necessary as well as, especially, to use it to your professional advantage.

The good news: once you have done this, you will have already taken a giant step towards controlling your research visibility.

Once registered for the below sites, please come to the workshop with your login/password information. We include two examples and then instructions to set-up your own accounts in the following.

Get Started:

You will be instructed below on the basic steps to register for an:

1. ORCiD id first;
2. GoogleScholar Citation account next;
3. and then at least two others below. Academia.edu best option for humanists—but see what the others do for you. Please be ready to write down new passwords, ID numbers, etc.

ORCID

What it does
ORCID is an open, non-profit, community-based effort to provide a registry of unique researcher identifiers and a transparent method of linking research activities and outputs to these identifiers. ORCID is unique in its ability to reach across disciplines, research sectors, and national boundaries and its cooperation with other identifier systems.

To register:
From ORCID home page, go to Registration page, add name, create password, be sure to make “default settings” (middle of the page) set to public.
Accept the terms of ORCID
Hit “register” button at bottom.
New page will appear, note your ORCID number on left side, confirm papers listed as yours if needed. Import or add your own papers – you can come back to do this.
Once you register for other sites you may have them mapped with your ORCID—ours has ResearcherID and Scopus also listed on left. ORCID allows you to do this from its site.

Username:
Password:
ORCID ID number:
**Google Scholar**

What it does
Tracks web-searchable references to your published works and citations to them as well as calculates citation statistics, e.g., H-index (the number of articles H cited H times).

You must have a Gmail account:
To set up a Gmail account go to gmail.com and create an account.

Once logged into your Gmail account, proceed to [http://scholar.google.com](http://scholar.google.com) and notice the option for "My citations" or an activation option. Click on that and follow directions.

Confirm papers that are yours (or are not yours)

Username:
Password:
My ID and/or unique URL:

---

**Academia.edu**

What it does
"Academia.edu is a platform for academics to share research papers. The company's mission is to accelerate the world's research. Academics use Academia.edu to share their research, monitor deep analytics around the impact of their research, and track the research of academics they follow. 3,853,925 academics have signed up to Academia.edu, adding 1,633,496 papers and 818,149 research interests. Academia.edu attracts over 5 million unique visitors a month."

Also gives nice alerts when your work is accessed from its site.

Username:
Password:
My ID and/or unique URL:

---

**ImpactStory**

What it does
"Share the full story of your research impact. ImpactStory is your impact profile on the web: we reveal the diverse impacts of your articles, datasets, software, and more". Provides additional ways of gathering information – for example how many "readers" in Mendeley.

Choose the large "make my impact matter" button.

Notice you can supply your ORCID and that you can import via your Google Scholar citation page more of your references.

(Go back to Google Scholar and use drop-down menu to save your records in the bibtex file format, which then you can upload to ImpactStory.)

Finish the registration process—note the new kinds of data being supplied.

Username:
Password:
My ID and/or unique URL:
**RESEARCHERID**

<table>
<thead>
<tr>
<th>What it does (plays nicely with ORCID and some of the other sites listed here.)</th>
</tr>
</thead>
<tbody>
<tr>
<td>[Owned by Thomson Reuters,] &quot;ResearcherID provides a solution to the author ambiguity problem within the scholarly research community. Each member is assigned a unique identifier to enable researchers to manage their publication lists, track their times cited counts and h-index, identify potential collaborators and avoid author misidentification. In addition, your ResearcherID information integrates with the Web of Knowledge and is ORCID compliant, allowing you to claim and showcase your publications from a single one [sic] account.&quot; <strong>NB: you can also register within ORCID once you have established your ORCID account.</strong></td>
</tr>
</tbody>
</table>

Go to ResearcherID main page and look for option to register then "Join Now"

Fill out basic information.

Note options to add alternative names under which you've published or are known by.

On results page note your ResearcherID number and notice papers retrieved, or select option for it to retrieve your papers.

Notice the "exchange data with ORCID" (on left) and the "add publications" on right middle in orange.

Manage your profile as well with additional information.

Poke around the options to see what is interesting.

**Some further reading**


Tools for Tracking Your Research Impact: Author and Article Metrics

**Author IDs**
Author IDs provide a solution to name ambiguity and can be used to link alternative spellings and name changes to one author.

**ORCID**
- Over 80 partners including Nature, IEEE, PLOS, Elsevier
- Integrated with ISNI and ResearcherID
- Customizable profile
- Retroactively add publications and automate new publications

**ReseacherID**
- Platform specific to Web of Knowledge
- Create a customizable profile with a publication list
- Researcher Labs which include some author metrics

**Scopus Author**
- Platform specific to Scopus
- Profile is automatically created but can request changes and integrate with ORCID
- Provides traditional metrics

**Author Profiles**
Types of Profiles:
- Researcher Communities: Academia / ResearchGate
- Reference management tools with social functions: Mendeley
- Search engines with author profiles: Google Scholar, Scopus

<table>
<thead>
<tr>
<th></th>
<th>Scopus</th>
<th>Google Scholar Citations</th>
<th>ResearchGate</th>
<th>Academia.edu</th>
<th>Mendeley</th>
</tr>
</thead>
<tbody>
<tr>
<td>Biography</td>
<td>No</td>
<td>Affiliations and research interests only</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Publication List</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Linked Publications</td>
<td>Yes</td>
<td>Yes</td>
<td>Possible</td>
<td>Possible</td>
<td>Yes</td>
</tr>
<tr>
<td>Automated publication list</td>
<td>via Scopus</td>
<td>Yes (not always accurate)</td>
<td>PubMed, IEEE, Cite Seer, BMC</td>
<td>CrossRef, Microsoft AS, PubMed, ArXiv</td>
<td>Available via many search engines and importing RIS or BibTeX files</td>
</tr>
<tr>
<td>Metrics</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>No</td>
<td>Yes, but metrics only visible to profile owner</td>
</tr>
<tr>
<td>Social Media</td>
<td>No</td>
<td>No</td>
<td>Yes</td>
<td>Yes</td>
<td>No</td>
</tr>
<tr>
<td>No. Users</td>
<td>Unknown</td>
<td>Unknown</td>
<td>5m</td>
<td>15.5m</td>
<td>over 2.5m</td>
</tr>
</tbody>
</table>
**Article Level Metrics (ALMs) vs. Altmetrics**

ALMs are about the incorporation of altmetrics and traditional data points to define impact at the article level. Altmetrics are about the data sources, not the level of aggregation. The attempt to incorporate new data sources to measure the impact of something, whether that something is an article or a journal or an individual scholar, is what defines altmetrics.

**Article Level Metrics**

Article-Level Metrics (ALMs) are a new approach to quantifying the reach and impact of published research. Historically, impact has been measured at the journal level. A journal’s average number of citations to recent articles (i.e., its impact factor) has for years served as a proxy for that publication’s importance. Articles published in highly-cited journals were viewed as impactful by association. As electronic dissemination of scholarly content has surpassed print, it has become easier to disaggregate an individual article’s impact from the publication in which it appeared. It’s also possible to track different markers of an article’s reach, beyond just citations. ALMs seek to incorporate new data sources (sometimes referred to as “altmetrics”) along with traditional measures to present a richer picture of how an individual article is being discussed, shared, and used.

The Public Library of Science (PLOS) was the originator of Article-Level Metrics, and provides a robust set of resources and tools to facilitate the understanding and application of ALMs:

http://article-level-metrics.plos.org

*Adapted from the SPARC ALM site and Primer*

http://www.sparc.arl.org/initiatives/article-level-metrics

**Altmetrics**

Providers:

- Impactstory - https://impactstory.org/
- Plum Analytics (enterprise-level tool) - http://www.plumanalytics.com/

Social behavior that is being tracked includes:

- Viewed
- Discussed
- Saved
- Cited
- Recommended

**For more information see:**

Information Standards Quarterly (ISQ), Summer 2013 Volume 25, no. 2
http://dx.doi.org/10.3789/isqv25no2.2013
Maximizing your scholarly identity

Ellysa Stern Cahoy
March 21, 2013

Overview

Citation Analysis--Web of Science and more

Journal Citation Reports

Enriching your research presence
- Google Scholar 'My Citations'
- Academia.edu
- SSRN

Citation Analysis -- Who cited me?

Citation Analysis Triangle

Web of Science / Google Scholar

In the third corner...the disciplinary database

What's your journal's impact factor?

Journal Citation Reports*
- Indexes journals by more than 3300 publishers in 80 countries
- Highlights the most frequently cited and highest impact journals in a field
Google Scholar / My Citations

Web of Science / ResearcherID

Other ways to share your work

Questions / Comments?

Thank you!
Ellysa Stern Cahoy
ellysa@psu.edu
On 22 May 2014, the University Library System, University of Pittsburgh, held a Bibliometrics Seminar, a program detailing...
several research library service models for support of research evaluation and assessment. Three of the featured speakers--from academic libraries in the USA (Mayo), the UK (Rowlands), and Australia (Thomas)--discuss the development and operation of such services in their organizations, noting the drivers for development, the process of setting up the service, and the impact of the service on both the library and the institution. A faculty colleague (Larsen) talks about his needs for research assessment as both a senior researcher and university manager. Presentation 1: “Providing a Library Metrics Service: a perspective from an academic library within an Australian University” by Dr. Amberyn Thomas, Manager, Scholarly Publications, University of Queensland, Australia. Presentation 2: “Library Research Services at the University of Leicester, UK” by Ian Rowlands, Research Services Manager and University Bibliometrician, University of Leicester. Presentation 3: “Research Connection: Expertise to Advance Your Success” by Alexa Mayo, MLS AHIP, Health Sciences and Human Services Library, University of Maryland, Baltimore. Presentation 4: “Bibliometric Research Services - an iSchool Dean’s Perspective” by Ronald L. Larsen, Dean and Professor, School of Information Sciences, University of Pittsburgh. The program for the event and a recording of the presentations are also included.

Citation/Export: Select format...
Social Networking:

Abstract:
On 22 May 2014, the University Library System, University of Pittsburgh, held a Bibliometrics Seminar, a program detailing several research library service models for support of research evaluation and assessment. Three of the featured speakers--from academic libraries in the USA (Mayo), the UK (Rowlands), and Australia (Thomas)--discuss the development and operation of such services in their organizations, noting the drivers for development, the process of setting up the service, and the impact of the service on both the library and the institution. A faculty colleague (Larsen) talks about his needs for research assessment as both a senior researcher and university manager. Presentation 1: “Providing a Library Metrics Service: a perspective from an academic library within an Australian University” by Dr. Amberyn Thomas, Manager, Scholarly Publications, University of Queensland, Australia. Presentation 2: “Library Research Services at the University of Leicester, UK” by Ian Rowlands, Research Services Manager and University Bibliometrician, University of Leicester. Presentation 3: “Research Connection: Expertise to Advance Your Success” by Alexa Mayo, MLS AHIP, Health Sciences and Human Services Library, University of Maryland, Baltimore. Presentation 4: “Bibliometric Research Services - an iSchool Dean’s Perspective” by Ronald L. Larsen, Dean and Professor, School of Information Sciences, University of Pittsburgh. The program for the event and a recording of the presentations are also included.

Date: 22 May 2014

Restriction:
No restriction; The work is available for access worldwide immediately.

Access:
No restriction; The work is available for access worldwide immediately.
Abstract

The February 2014 Scholarly Communication and Publishing Lunch and Learn Talk focuses on bibliometrics, giving an overview the evolution of metrics, current sources for metrics, and guidance on how library staff can assist faculty with understanding individual, journal, and institutional impact through bibliometrics.

This is the latest version of this item.
institutional impact through bibliometrics.

Date: 20 February 2014

Access: No restriction; The work is available for access worldwide immediately.

Restriction: Patent pending: No

Series Name: Scholarly Communication and Publishing Lunch and Learn Talks
Number: 8

Event Title: Scholarly Communication and Publishing Lunch and Learn Talks
Event Location: Pittsburgh, PA, USA
Event Dates: 20 February 2014
Event Type: Other
Institution: University of Pittsburgh
Refereed: No

Related URLs: Publisher

The eighth in a series of Lunch and Learn Talks for colleagues of the University Library System, University of Pittsburgh. Most talks include a "toolbox tip" on best practices for library colleagues to use when working with the Pitt community. Links to recordings of talks are provided when available.

Schools and Programs:
Date Deposited: 26 Feb 2014 11:59
Last Modified: 31 Mar 2014 12:06

Available Versions of this Item
- Scholarly Communication and Publishing Lunch and Learn Talks. (deposited 07 Aug 2013 11:04)
- Scholarly Communication and Publishing Lunch and Learn Talk #20: ORCID@Pitt--Implementing the ORCID ID System at the University of Pittsburgh. (deposited 09 Mar 2015 13:19)
- Scholarly Communication and Publishing Lunch and Learn Talk #18: Authors' & Other Creators' Rights. (deposited 29 Jan 2015 17:09)
- Scholarly Communication and Publishing Lunch and Learn Talk #17: Lessons from OpenCon and OpenEd. (deposited 05 Dec 2014 14:13)
- Scholarly Communication and Publishing Lunch and Learn Talk #14: Traditional Scholarly Peer Review. (deposited 04 Dec 2014 19:14)
- Scholarly Communication and Publishing Lunch and Learn Talk #16: Open Access Week 2014--What You Need to Know. (deposited 14 Oct 2014 12:22)
- Scholarly Communication and Publishing Lunch and Learn Talk #13: Open Educational Resources and Open Textbooks. (deposited 22 Jul 2014 17:13)
- Scholarly Communication and Publishing Lunch and Learn Talk #11: The ULS Open Access Author Fee Fund. (deposited 15 May 2014 15:13)
- Scholarly Communication and Publishing Lunch and Learn Talk #9: Using Altmetrics to Demonstrate Scholarly Impact. (deposited 31 Mar 2014 12:05)
- Scholarly Communication and Publishing Lunch and Learn Talk #8: Using Bibliometric (Publication and Citation) Indicators to Demonstrate Impact. (deposited 26 Feb 2014 11:59)
- Scholarly Communication and Publishing Lunch and Learn Talk #7: Copyright and Other Intellectual Property Resources. (deposited 22 Jan 2014 15:09)
- Scholarly Communication and Publishing Lunch and Learn Talk #6: Creative Commons Licenses. (deposited 22 Jan 2014 15:08)
- Scholarly Communication and Publishing Lunch and Learn Talk #3: The Public Knowledge Project and the ULS. (deposited 11 Dec 2013 10:57)
- Scholarly Communication and Publishing Lunch and Learn Talk #5: OASPA (Open Access Scholarly Publishers Association) and the ULS. (deposited 11 Dec 2013 10:54)

Actions (login required)
- View Item

Document Downloads
USING BIBLIOMETRIC (PUBLICATION AND CITATION) INDICATORS TO DEMONSTRATE IMPACT

OUTLINE
- Evolution of Metrics; Caveats
- Current Sources of Metrics
- Library can assist faculty with understanding:
  - Individual impact
  - Journal impact
  - Institutional impact
- Discussion

EARLY METRICS

Counting outputs
- 3rd century BC: number of items held in the Great Library of Alexandria was 450,000
- 1837: Royal Library in Paris held 620,000 and public libraries in the US – 1,294,000
- In 1841, numbers of volumes in libraries were normalized by population (Munich: 750 volumes per 100 people; Florence: 313; Paris: 143; London: 20)

Counting usage, incl. collections development
- 1874: An article claimed that in American public libraries, 3/4 of the circulation was "sensational food" and 1/4 was "literary food"
- 1927: Gross and Gross from Pomona College analyzed references in one volume of the Journal of American Chemical Society and recommended a list of 22 journals (12 non-English) to become a core of the college chemistry collection

EVOLUTION OF METRICS

Eugene Garfield’s “association of ideas index”
- Information retrieval
- Classification and ordering

OUTLOOK

- Measuring scientific workforce and its impact on scientific development (Cattell, 1960)
- Measuring civilization’s development through volume of published outputs (Humle, 1923)
- Mapping scholarly disciplines by analyzing citation patterns (Fussler, 1948)
- “Measuring science” using scientific tools (DeSolla Price, 1963)

For whosoever hath, to him shall be given, and he shall have more abundance; but whosoever hath not, from him shall be taken away even that he hath
(Matthew 25:29)
EVOLUTION OF METRICS

- Research evaluation
  - Individual researchers
  - Research institutions
  - Funding institutions
  - Policy makers

CAVEATS

- Proxy for academic impact only
  - What about social, economic, environmental?
- Not suitable for all disciplines
- Lagging indicator
- May underrepresent performance of ECRs

CURRENT SOURCES OF BIBLIOMETRIC DATA

- Scopus
- Google Scholar
- Crossref

CURRENT SOURCES OF BIBLIOMETRIC INDICATORS

- Academic Analytics (at PITT)
- Digital Measures
- Elements from Symplectic
- AVIDAS (acquired TR)
- Pure (acquired by Elsevier)

OUR LIBRARY CAN ASSIST FACULTY WITH...

Individual Impact

- Advising on tools available to track publications and citations (source of data, setting profiles, etc.)
- Identifying relevant metrics (IF or h-index?)
- Providing context to these metrics (baselines and normalizations)
- Advising on how to apply metrics in various contexts (grant proposals, tenure applications)

CREATING PROFILES
SIMPLE INDICATORS – ALWAYS NEED CONTEXT

- Number of publications
- Number of citations
- Citations per publication (mean and median)
- % not cited
- h-index and variants

WHAT A RESEARCHER MAY SAY ABOUT THEIR IMPACT… (WITHOUT CONTEXT)

I have 35 refereed journal articles, of which 33 are indexed by Web of Science. These articles have received 230 citations, giving an average citation per (indexed) paper of 7 (source: WoS, 01/14).

Of my 33 indexed journal articles, only 2 articles have not been cited by others (9% not cited), and these were all published in 2013.

My h-index based on these indexed papers is 10 (source: WoS, 02/14).

WHAT A RESEARCHER MAY SAY ABOUT THEIR IMPACT… (WITH MORE CONTEXT)

I have 35 refereed journal articles, of which 33 are indexed by Web of Science. These articles have received 230 citations, giving an average citation per (indexed) paper of 7 (source: WoS, 01/14).

15 of these articles exceed the expected citation rates for their respective publication years, and 5 articles are in the top 1% by citations for my field. Moreover, my 2006 Cell Pigmentation paper placed in top 0.1% of all 209 citations (WoS, 02/14). My h-index based on these indexed papers is 10 (source: WoS, 02/14) (since I have an additional 2 papers not indexed by WoS, with 20 citations each (Scopus data 03/14)).

CONTEXT CAN BE PROVIDED BY USING

- Baselines
  - Impact relative to discipline (average)
  - Impact relative to journal (average)

- Ranking
  - Publications in top 0.1%, 1%, 5%, or 10% of distribution
  - Normalization by discipline, publication year and document type

BASELINES AND RANKINGS – EXAMPLES OF TOOLS

OUR LIBRARY CAN ASSIST FACULTY WITH…

Journal Impact

- Which journal to publish in
- Identifying journals with the best impact
- Providing relevant and cost-effective collections for researchers
- Providing more context to individual impact
### JCR – Impact Factor, Quartiles

![JCR - Impact Factor, Quartiles](image1.png)

### Eigenfactor Score – Article Influence

![Eigenfactor Score – Article Influence](image2.png)

### Eigenfactor – JSTOR

![Eigenfactor – JSTOR](image3.png)

### Eigenfactor – Cost-Effectiveness

![Eigenfactor – Cost-Effectiveness](image4.png)

### Scopus – Journal Analyzer

![Scopus – Journal Analyzer](image5.png)

### SJR – SCImago Journal Rank

![SJR – SCImago Journal Rank](image6.png)
I have 35 refereed journal articles, of which 33 are indexed by Web of Science. These articles have received 230 citations, giving an average citation per (indexed) paper of 7 (source: WoS, 01/14). Ten of these citations are from journals in the top Quartile for the field. These top journals have a high impact factor for the field. Touto these journals are cited more than the expected citation rate for the field and out perform the rest of the indexed articles. I also have an article in the top 0.1% of all publications in its field (source: Essential Science Indicators, 01/14).

My h-index based on these indexed papers is 10 (source: WoS, 02/14). I have 209 citations (source: Google Scholar, 02/14). I also have 3 papers not indexed by WoS, with 29 citations based on Scopus data (02/14).

What are the areas of strength in my institution?

What is the relative size of disciplines?

What is the relative impact of disciplines?
WHO DO WE COLLABORATE WITH? WHAT IS THE IMPACT OF THESE COLLABORATIONS?

Evidence:
- Analyze your WoS articles by WoS subject category to see if this is evidenced in your research output.

Research Statement: "My work is multi-disciplinary, spanning biochemistry, biophysics and oncology..."*

Evidence:
- Are you listed as a highly cited scientist in ESI?
- Do you have any papers "highly cited" in ESI?
- Do you have any "highly cited" papers identified as being "core papers" in an area of relevance to the application?
- How many of your papers rank highly in your "h-index" for any of the years of interest to the application (say last 5)?
- Where do your journals rank?

Thank you!

http://pitt.libguides.com/bibliometrics

*Researcher Statement: "I am a world-leader in the field..."
Introduction to Altmetrics

Linda M. Galloway, MLIS
Librarian for Biology, Chemistry and Forensic Science
Syracuse University Library, Syracuse, NY

Janet Pease, MLS
Associate Librarian
Syracuse University Library, Syracuse, NY

Anne E. Rauh, MA
Engineering and Computer Science Librarian
Syracuse University Library, Syracuse, NY

Introduction to Altmetrics for STEM Librarians, Science & Technology Libraries, in review

What are Altmetrics??
“the study of scholarly impact measures based on activity in online tools and environments” (Priem, Groth, and Taraborelli 2012)

citable and accessible products not limited to publications, data sets, software, patents, and copyrights (“Grant Proposal Guide, Chapter 6” 2013)

Scholarly Metrics as a proxy for Scholarly Influence...

Susan Parks
Assistant Professor of Biology, Syracuse University

Scholarly Metrics as a proxy for Scholarly Influence...

Quantifying Scholarly Output via Citation Metrics

Number of Publications
Citations to Publications
Relative influence of Publications

Traditional Tools Evaluating Journals

• Impact Factor – Journal Citation Reports
  – Avg. time articles from a journal (past 2 yrs.) are cited in past year.
  – Web of Science indexed journals & data
• SCImago Journal & Country Rank
  – Based on Scopus Data, 1996-
  – Uses GooglePage Rank algorithm
  – Citable increments include past 3 years
  – Open Access

Note: There are other indices and measures available within these resources.
Traditional Tools
Article/Author Level Metrics
- Citations to an individual article or body of work
  - Web of Science
  - Scopus
  - Google Scholar
- h-index
  - measures both the productivity and impact of the published work
  - Number of an author’s papers that have been cited at least h times by other publications

Comparisons

<table>
<thead>
<tr>
<th>Tool</th>
<th>Times Cited</th>
<th>h-Index</th>
</tr>
</thead>
<tbody>
<tr>
<td>Scopus</td>
<td>135</td>
<td>7</td>
</tr>
<tr>
<td>Web of Science</td>
<td>85</td>
<td>11</td>
</tr>
<tr>
<td>Google Scholar</td>
<td>279</td>
<td>10</td>
</tr>
</tbody>
</table>

Limitations to Traditional Metrics
- Take a long time to accumulate
- STEM focused
- Often behind pay walls
- Measure influence narrowly
- Don’t capture a publication’s impact or influence in emerging forms of scholarly communication

altmetrics
Measure diverse impacts from articles, datasets, blog posts, slide shows, etc.

Beyond citation counts!
- Readership
- Views
- Saves
- Downloads
- Scholarly (or popular) Buzz

What can be measured?
“Evidence of Use” – http://impactstory.org
- # of Tweets
- # of “Saves” in online reference managers
- Scholarly (and popular) blog interest and activity
- Activity in social networking platforms, tools
- And...
Meaningful Interactions
Altmetrics measures diverse impacts from articles, datasets, blog posts, slide shows, etc.

<table>
<thead>
<tr>
<th>Tool</th>
<th>What is tracked?</th>
</tr>
</thead>
<tbody>
<tr>
<td>CiteULike</td>
<td>Discussions</td>
</tr>
<tr>
<td>Delicious</td>
<td>Saves</td>
</tr>
<tr>
<td>F1000</td>
<td>Citations</td>
</tr>
<tr>
<td>GitHub</td>
<td>Recommendations</td>
</tr>
<tr>
<td>Mendeley</td>
<td>Downloads</td>
</tr>
<tr>
<td>SlideShare</td>
<td>Copies</td>
</tr>
<tr>
<td>Twitter</td>
<td></td>
</tr>
<tr>
<td>Zotero</td>
<td></td>
</tr>
</tbody>
</table>

Altmetric Tools
track readership & influence

- **CiteULike** permits users to store, organize and share scholarly papers
- **F1000** is a subscription-based recommendation service for curated articles in biology and medicine.
- **Google Scholar Citations** is a service that allows authors to track their publications and influence using Google Scholar metrics.

Altmetric Tools
track readership & influence

- **Mendeley** is a free reference manager and social network that was recently acquired by Elsevier. Mendeley is described as “one of the world’s largest crowd-sourced research catalogs”
- **Zotero** is a robust and growing citation management and sharing resource. Collaborators can share libraries of references, etc.

Make Sense of the Diversity of Research Outputs

Use an aggregator!

- Harvest data
- Automatic updates
- Showcase scholarly influence

Put it all together...
with Altmetric Aggregators

- **ImpactStory**, aggregates data from research products including articles, datasets, blog posts, PowerPoint presentations and more; free, open source and open access
- **Altmetric.com**: Subscription business solution that collects data about an individual article and supplies this data to publishers who present the info. to readers & authors
- **Plum Analytics**: commercial product - measures influence using five categories; usage, captures, mentions, social media, and citations. Marketed to libraries.

ImpactStory
Engaging Constituents

- Don’t assume anyone knows anything about altmetrics
- Begin by engaging new scholars
- Explain limitations of both traditional citation metrics & altmetrics
- Demonstrate the power of a Google Scholar Profile, institutional profile, and an ImpactStory Profile

Scholars’ Engagement with Social Media

- Important to maintain and manage an online presence
- Outreach to the public – broader impacts criteria – required by some funding agencies
- Mentions in social media seem to lead to enhanced use of publications
- Dizzying array of social media tools

Valid data = Valid metrics

- Accurate attribution is essential!
- Scholarly authors are assigned Scopus Author Identifiers, Web of Science Researcher ID’s, etc.
- Scholars can claim and make public their Google Scholar profile
- Scholars can (and should) register for a unique ORCID number

ORCID

Open Researcher Identifier

Free service that assigns a unique number to each author and links other identification schemes.

Encourage researchers to use consistent naming conventions and register for an ORCID ID!

Problem: author disambiguation

Databases see all of these people as J Dannenhoffer

Databases see all of these people as J Dannenhoffer
Why care?
Metrics and their relationship to social media:

- Add value to traditionally published content
- Crowdsourced peer review
- Expose questions and comments
- Enhance worth
- Increase readership
- Appear to follow the pattern of traditional metrics

Thank you!!
Linda Galloway
Janet Pease
Anne Rauh
Syracuse University Library

References

159–159. doi:10.1038/493159a.


Scientists." PLoS Biol 11:
10:1087/20130103.

Article-level Discussion and Metrics." Learned Publishing 26:

http://www.altmetrics.org/manifesto/

http://altmetrics.org/manifesto/
Research Impact

Upcoming Workshops

Your Research Impact

Date: Thursday, May 14, 2015
Time: 5:00pm - 6:00pm
Location: 17 Hillhouse - 07
Campus: Science Hill

Research impact is a ubiquitous term in academia, and it informs everything from how to write a grant to how you approach marketing yourself as an academic to how a faculty member compiles their dossier.

In this workshop, we will take a closer look at the research impact and scholarly communication environment. This workshop will provide a broad overview, with plenty of time for questions and discussion. Topics include:

- Specific metrics that are used for evaluation, such as the h-index and its derivatives, the Impact Factor, and alternative metrics for nontraditional research products.
- How to use databases to discover information about people and organizations (they’re not just for papers!).
- Best practices for working on your own impact goals, including the use of ORCID, the Becker Model, and research profile services.

The 17 Hillhouse room 07 classroom is on the lower level of the 17 Hillhouse building. After 5 PM, the building requires a Yale ID for entry.