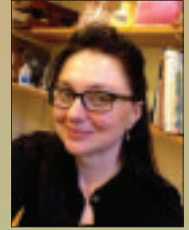


A Scholarly Conversation About the Future of eReference



“Content outside of the expected lens can lead to interdisciplinary connections, a new direction, and a finer focus.”

LURA SANBORN

Ten years ago, while working with a Latin class, I was busily demonstrating mythology reference books, happily claiming, “These are just as easy to use as Wikipedia,” although of course better, for they are written by experts, vetted by editors and fact checkers.

Plus there were handfuls of articles, ideal for comparing and assessing truth and bias. “But Ms. Sanborn, no they’re not,” said a bright student. “No?” I asked. “No,” continued the student with clairvoyance. “*Because we have to come to the library to use them.*”

When Gale (research services) later launched its digital reference product, I could hardly believe such academic magic. Here it was, that essential background information, scholarly and trusted, with the trip to the library cleanly annulled. Yes, please, I’ll take it all.

What I didn’t see until I was in it was the delivery of the all-embracing mass of lenses. Content outside of the expected lens can lead to interdisciplinary connections, a new direction, and a finer focus. Multiple lenses (feminist, Marxist, Indian history, economic) are all available with a single search. Further, eReference, when demand driven, offers economical grace. The platform’s complete collection is available and the library needs only purchase titles that are accessed. This neatly does away with the perils of print as expressed in Cornell’s collection development study measuring the use of their print collection purchased in the last 20 years. They found that half of those books never circulated (Collection Development, 2010).

The comprehensiveness of demand-driven acquisition (DDA) is also a prize

when curriculum changes. Our chemistry students recently had a new assignment about fireworks. The eReference collection contained essential information that had *not* been selected by librarians; it was available because of DDA. Perfect.

WHY BOTHER? CAN’T I JUST USE THE FREE WEB?

We talk a lot about lenses, bias, and perspective in academia. The lens of a reference article is often clearly identified in the volume’s title. Articles are signed. Reference articles are typically written by folks who have devoted a lot of life to a particular subject, encompassing degrees (often a PhD) as well as teaching and researching in that field. The voices of experts who have come before are credited in the bibliography. Experts upon experts then scaffold up the field’s knowledge—we all know there are imperfections in academic publishing (as shown by the work of Retraction Watch: <http://retractionwatch.com>) but for decades this has been the academic structure. On the free web, we have Wikipedia.

The defining element of Wikipedia is the one that simultaneously causes the most consternation and, as we know, centers on authority. Who wrote this? If we don't know, how does that change its value to the scholarly conversation? Can it even be a part of the scholarly conversation? Without attribution, how do we measure its "truthiness" (Colbert, 2005) or "Wikiality-ness" (Colbert, 2006)?

The Wikimedia Foundation (2011) editors' survey asked editors what change they would find most helpful in their Wikipedia work. Out of the 10 choices, the one selected most often by the 6,000+ responding editors was "Improved or free access to research materials like scholarly articles and books" (p. 26). More than 45% of respondents identified access (or lack thereof) to library paywall content as the most influential to their Wikipedia contribution. Upping Wikipedia's academic-ness is the impetus behind the Wikipedia Visiting Scholar program (Orlowitz, 2014). The program aims to boost the academic street cred of Wikipedia articles by including research and citations from academic literature. If Wikipedia wants to become more academic, if they view academic content as more reliable, more desirable, how do academics and scholars feel about this content that has historically represented the foundation of the scholarly conversation?

The Wikimedia Foundation survey reported that 10% of Wikipedia editors hold a doctoral degree, more than 50% hold a high school or bachelor's as their highest degree, 70% are under the age of 40, and 90% are male (Wikimedia Foundation, 2011). The fact that this 90% maleness might result in gender bias in editing and con-

tent priority is much discussed. The *New York Times* (as cited in Newman, 2014) captured this sentiment in 2013, when Laura Lemay remarked on her then delisted Wikipedia entry, "I don't think I was deleted because I'm female, but I do think that women have to do a lot more in order to merit 'notability' in the eyes of the young nerdy male cohort of Wikipedia editors." So what do all these percentages and authorship and bias concerns amount to? It was summed up nicely in a study from the *Canadian Journal of Information and Library Sciences* (as cited in Temple & Fraser, 2014), "These findings together with those from other studies indicate that the information provided by Wikipedia is mostly of high quality but that significant errors and omissions are fairly common" (37).

DOES IT MATTER?

We all know that Wikipedia has a presence in the world, but how influential is it really? *The Atlantic* (as cited in Pinksler, 2015) describes insurance companies denying claims based on Wikipedia articles and individuals requesting (or not) medical services. Corporations are aware. The Wiki-PR company famously edited and created Wikipedia entries for companies (Halleck, 2013; Newman, 2014), but these were later banned due to unethical editing (Wikipedia, 2015). Freelance sites such as eLance and WorkMarket are full of folks advertising themselves as Wikipedia writing experts. We also know that Wikipedia is a first stop when learning something new. The Pew Research Center (as cited in Purcell et. al, 2012) writes that 75% of teachers considered their students "very likely" to consult Wikipedia when conducting research

for school assignments.

Given its standing with everyman, could we consider Wikipedia one voice among many and simultaneously provide access to reference articles? A national reference collection would clearly benefit individual researchers. How might it impact the greater good?

Information economist John Houghton (as cited in Danish Agency for Science, 2011) analyzed the value of research to IT firms in Denmark. He found that "twenty-seven per cent of the products and 19% of the processes developed or introduced during the last three years would have been delayed or abandoned without access to academic research. These new products contribute an average 46% of annual sales." (p. 8). Without access to research, "it would have taken an average of 2.2 years longer to develop or introduce the new products or processes in the absence of contributing academic research. For new products, a 2.2 years' delay would cost around DKK 36 million (EUR 4.8 million) per firm in lost sales" (p. 9). At the Open Access Research Conference (2013), Houghton summarized three research reports measuring the return on investment (ROI) of data centers in the United Kingdom. He noted that there is a distinct return on investment, including greater efficiency of work, research, teaching, and learning. The aggregate of these studies found the value of the data center to be 2 to 20 times its cost.

Houghton (as cited in Open Access Research Conference, 2013) identifies research articles as correlating to productivity, efficiency, and financial upscaling. Research literature is often dense and can be difficult to understand. Imagine a citizenry that has at hand easy-to-read foundational academic

reference articles. What wondrous developments in gross domestic product, productivity, and creativity would we see? Overseas, the United Kingdom has its Access to Research program, Norway is digitizing all books, and Wales is moving to a *national* eBook service (SIRSIDynix, 2015). Why not the United States, which prizes democracy, freedom of information, and our defining essence, freedom of speech? Without a national eLibrary containing the scholarly conversation, whose speech are we valuing?

FUTURE

It is posited that the future is one in which we will have no choice. Predictive algorithms will identify and solve our needs and wants (Quito, 2015). *The Atlantic* article about Wikipedia cited here was not one I found. Instead, it was anticipatory design. On August 18th I picked up my iPad, and Google's clever information cards suggested the article, stating its popularity with readers of *Library Journal*. Apparently, decisions make us stupid, as jarringly discovered in a study of judges' parole decisions (Tierney, 2011). The more decisions we make, the more exhausted our brain becomes. Why not just remove the decisions (as an option)? To keep us smarter, what if predictive digital reference articles were suggested to us alongside free web content? Based on our online activity and location, perhaps we could be presented with articles about tidal patterns, the nutritional value of tomatoes, or what to ask when selecting a pediatrician. Talk about truly patron driven!

CONCLUSION: IS REFERENCE STILL ESSENTIAL?

Yes, in a digital, DDA, all-encompassing form. Why? Because it provides a thoroughness, a multitude of lenses, expert authorship, and the foundational levels of the scholarly conversation. This research cocktail cannot yet be found as consistently or comprehensively via free sources. As a result, eReference thoroughness, expeditiousness, and budgetary efficiency revitalize the value of the reference collection and reaffirm it as essential to the academic thought process. Reference has been the vaulted starting point for generations of scholars (*Britannica's* been at it for more than 200 years). Its offerings have not changed, just the format. And the new format brings with it better, more, faster.

Educational institutions and academic libraries have a long, historical friendship; libraries collect, curate, and teach the use of scholarly literature used by scholars to push thought-boundaries in their fields. What if we unbundle that? What innovation, creation, and solutions would occur if that content were to be put in the hands of everyman? In 2011 gamers cracked the genetic code of the HIV virus, something that had stumped scientists in the field for years. The gamers accomplished it in three weeks (Young, 2011). If the inherent capability is there among the species, imagine that capability in academia. The future? It only gets better from here, with the promise of anticipatory design combined with universal access to eReference collections. Such a recipe could lead to greater use of the scholarly conversation, collectively boosting innovation, creation, and economic gross domestic product.

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