

Search vs. Research

Or, the Fear of The *Wikipedia* Overcome by New Understanding for a Digital Era

By Marc Prensky

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[1953 words]

“We don’t let our kids access Wikipedia. We don’t know if it’s accurate.”
-A school librarian

“I shiver every time one of my students cites Wikipedia in a paper.”
– Danah Boyd

As soon as any new technology comes down the pike, be it TV, phones, cell phones, cameras, video cams, or the *Wikipedia*, the good old American school tradition is always ready...

... to fear and ban it!

Never mind that new technologies give our kids access to whole new worlds—they may not worlds the teachers can control. Never mind that with cameras in their phones kids can collect and share visual data of all sorts, from their own faces to natural phenomena—someone might take a picture in the toilet. Never mind that kids have access to the Internet in their pocket—they might cheat. Never mind that we can finally, at no cost via webcams, share with parents, administrators and the world what goes on in our classrooms—someone’s privacy (particularly the teacher’s!) might be invaded.

Others have written about how TV and land-line telephones were systematically excluded from American classrooms. For all the speed with

which we've introduced computers for every student into our schools, we've effectively, up to this point, banned them as well. I've written elsewhere of the folly of banning cell phones from our kid's education (see "What Can You Learn from A Cell Phone? – Almost Anything!" at <http://www.innovateonline.info/index.php?view=article&id=83> .

But now the latest absurdity I've been hearing about is banning kids from citing—or even looking at—the *Wikipedia*—one of the most innovative and far-reaching products to come down the pike in a while—because it might not be as correct or accurate as a traditional encyclopedia written by paid experts.

If that's our criterion for what kids can read and cite, we'd better re-think kids' access to the Bible!

Ban or Teach?

Why is the rush always to fear, and to ban, rather than to teach?

If our kids use phones to take pictures in the bathrooms, it's our job to teach them the importance of privacy (perhaps while secretly applauding their sense of humor?)

If kids use cell phones to get information during tests, it's our job to teach them the importance of fairness (perhaps while secretly applauding their ingenuity!)

And if our kids use and cite only the *Wikipedia*, it's our job not to shiver, but to help them learn to distinguish between "search" and "research" (perhaps while secretly recognizing our own intellectual lapses as well.)

Search vs. Research

The "tradition" of search is a relatively new one—certainly less than a decade old. Hard as it is to believe, it is only in the last couple of years that you can type whatever you are looking for into a little box and, wherever you happen to be, get all the information the world offers for free on that subject. The quantity of information is unbelievable. However the *quality* of that information is, in most cases, not particularly well-indicated.

Which is why we have "research"—a whole different animal from "search."

The tradition of “research,” in a school or academic setting, is a long and important one, and was established precisely for the purpose of determining the “quality” of information. The research tradition encompasses why and how we cite our sources, what sources are considered “primary” versus “secondary,” what types and sources of information are considered more reliable, trustworthy or accurate, and many other things.

If our students don’t know or understand these differences it’s our job as educators to make sure they do. Kids need to know that while search involves just looking, research involves a whole discipline of behaviors. (What those behaviors are, if you don’t already know, can be found easily via search ☺)

So far so good. However...

Assuming we ever did, we no longer live in clear-cut times. We live, rather, in blurry, super-fast-changing times. One of the most important things for all of us, young and old, to learn and do in these times and circumstances is to figure out how to continually adapt our ideas (and get used to the idea of adapting them)—even those that have long traditions behind them—to new conditions and technologies that emerge. The *Wikipedia* is only the first of a great many changes to come. But it’s a good place to begin to start thinking differently.

What is Wikipedia?

So what is *Wikipedia*, and what’s the “story” behind it? If you’re not aware, *Wikipedia* is a new beast in the world, born in 2001. To a searcher, it acts exactly like an online “encyclopedia.” You type www.wikipedia.org into your browser, enter a topic, and get back an “article” about that topic (if one exists), precisely as in a “traditional” encyclopedia like the Britannica online. What differentiates *Wikipedia* from the traditional encyclopedia is that its articles are not written by hired “experts” (the Britannica uses over 4,000 of them), but by anyone who chooses to write or contribute. Here’s the *Wikipedia*’s entry on “Wikipedia”

Wikipedia (pronounced as either "week-ee-peedia or wick-ee-peedia") is a multilingual, [Web-based](#), [free-content encyclopedia](#). It is written collaboratively by [volunteers](#) with [wiki software](#), meaning articles can be added or changed by nearly anyone. The project began on [January 15, 2001](#) as a complement to the expert-written [Nupedia](#), and is now operated by the [non-profit Wikimedia Foundation](#). It has steadily risen in popularity,^[1] and spawned several sister projects, such as [Wiktionary](#), [Wikibooks](#), and [Wikinews](#).

Articles in Wikipedia are regularly cited by the [mass media](#) and [academia](#), who praise it for its free distribution, editing, and diverse range of coverage. Editors are encouraged to uphold a policy of "[neutral point of view](#)" under which notable perspectives are summarized without an attempt to determine an [objective](#) truth. Yet due to its open nature, [vandalism](#) and inaccuracy are constant problems — and the status of Wikipedia as [reference](#) work has been controversial. It has also been criticized for [systemic bias](#), preference of consensus to credentials, and a perceived lack of accountability and authority when compared with traditional encyclopedias.

There are about 200 [language](#) editions of Wikipedia (about 100 of which are active). Ten editions have more than 50,000 articles each: [English](#), [German](#), [French](#), [Japanese](#), [Italian](#), [Polish](#), [Swedish](#), [Dutch](#), [Portuguese](#), and [Spanish](#). Its German-language edition has been distributed on [compact discs](#), and many of its other editions are [mirrored](#) or have been [forked](#) by [websites](#).

So with over 50,000 articles and 200 languages, you can see this is no small thing. No article on the topic you are searching for? Create your own! All *Wikipedia* articles begin, in fact, with a single contribution by a single person, who thinks he or she has some knowledge of some topic (which they pick and name) and who is motivated to contribute. Some topics never go beyond this one contribution.

But the power of the “wiki” technology that lies behind the *Wikipedia*, is that literally anybody who wants to can change or add to that original article, merely by hitting the “edit” button. In other words, on a wiki, everyone’s an editor. And this is what makes it, in its own words, “controversial”

For topics of wide interest, many people (tens, hundreds or even thousands) are motivated to read, contribute and change the entry, and often do so on a regular basis. Many argue that this process effectively culls out mistakes, and makes many articles just as (or, some might say, even more) reliable—and almost certainly more up-to-date—than their counterparts in the *Britannica* or its brethren. (Whether this is, in fact, true, and how one might go about determining whether it is true, is a great topic for a class discussion.) The history of the changes to each article is also there for all to see.

It is fascinating to see how quickly a *Wikipedia* article emerges on a contemporary topic, such as Hurricane Katrina, often while the event is still happening. Someone writes a few lines, others add, and suddenly there are pages, pictures, etc.

So, one beginning lesson for students using *Wikipedia* is to look at the number of changes and additions to a particular article and the number of authors. More may mean more reliable information

But of course it's not that simple. Because information contains points of view. Was the Battle of Gettysburg a great, nation-saving event, a humiliating defeat, or just a bloody massacre? Is the 2005 war in Iraq an attempt to liberate a people, an attempt to further a political system, or a thinly-disguised protection of American oil interests? Were Pearl Harbor and 9/11 vile, sneak attacks, or brilliant military maneuvers? Is evolution "the" answer or "an" answer?

To address this the *Wikipedia* has established a "neutral point of view" policy, asking that all points of view be included and all sides of an issue discussed. This is not always easy, but it may include more information than an article by an expert, whose point of view might not be so obvious. (Again, a good topic for class discussion: Review some traditional encyclopedia articles on the topics listed above. Are all the points of view represented?)

So, other than to count the number of authors in an article, what *should* we teach our kids about *Wikipedia*?

First, that it's a source. Second, that it's *never* the only source.

And third, that merely searching, finding and citing the *Wikipedia*—or even the *Brittanica*—does not constitute "research," even by an elementary school kid. Students need to be taught early to cross check information, to consult multiple sources, and to go to, read and cite original documents and sources, where they exist. Especially in this time and political climate, students must be taught not to necessarily believe what they hear or read—even from so-called "experts,"—but to always look for additional, corroborating sources. (By the way, that's the "re" in research.)

A Hypothetical Example

And we should start inculcating good habits early. To me a gem of a third-grade (or so) research paper might read something like this:

Abraham Lincoln

By ???



(Source of images: www.historyplace.com)

My Google search on “Abraham Lincoln” returned 10 million hits. According to all the sources I consulted (listed at the end), Abraham Lincoln was President of the United States from 1861 to 1865. The *Wikipedia* calls Abraham Lincoln one of our greatest presidents. So does the *Encyclopedia Britannica* and so do several of his biographies I consulted. I therefore conclude that he was one of our greatest presidents. A timeline of Abraham Lincoln's life was found by me online at <http://www.historyplace.com/lincoln/#prez> on October 13, 2005. Some highlights include...

All my sources agree that Lincoln freed the slaves in 1862 with the Emancipation Proclamation. That document reads, in part, “all persons held as slaves within any State or designated part of a State, the people whereof shall then be in rebellion against the United States, shall be then, thenceforward, and forever, free.” To me, this means that...

New Understanding: How to Help Our Students in a Digital Era:

Fellow teachers, librarians, and parents, let us all be clear. Our kids will always find and use whatever new thing appears. We oughtn't *ban* the *Wikipedia*, or *any* new technology, ever. Nor should we fear these technologies.

As educators our duty is to *teach* our students to understand both the power and the limitations of all the new technological tools that are, and will increasingly be, at our kids' disposal. It is our job to show them how they can use all these new tools well, and wisely.

Of course the first step in doing this is to understand the tools ourselves. So on what topic will *you* be writing *your* first *Wikipedia* article?

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