An Andragogical Approach to Developing Dialogic Learning through Wikis

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This article examines the effectiveness of using wikis for collaborative projects in college journalism classrooms, with the principles of andragogy as a framework. The use of wikis in two journalism courses at a large university in the American Midwest illustrates how wikis can encourage learners to become more self-directed by engaging in online collaborative writing about how best to produce reports about diverse populations. Two case studies are related to journalistic best practices in the coverage of two sensitive topics: Islam and immigration. The content of these wikis was compiled into best-practices documents that informed the students' subsequent coursework. The documents were also published online for use in classrooms and newsrooms, offering a "real world" audience for the work. This article provides educators with an outline for engaging students in similar projects to improve their application skills as well as critical thinking.

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Abstract

This article examines the effectiveness of using wikis for collaborative projects in college journalism classrooms, with the principles of andragogy as a framework. The use of wikis in two journalism courses at a large university in the American Midwest illustrates how wikis can encourage learners to become more self-directed by engaging in online collaborative writing about how best to produce reports about diverse populations. Two case studies are related to journalistic best practices in the coverage of two sensitive topics: Islam and immigration. The content of these wikis was compiled into best-practices documents that informed the students' subsequent coursework. The documents were also published online for use in classrooms and newsrooms, offering a "real world" audience for the work. This article provides educators with an outline for engaging students in similar projects to improve their application skills as well as critical thinking.

In recent years, educational paradigms have shifted from teacher-centric models based on providing instruction to learner-centered models focused on the production of learning (Switzer, 2004; Morris, 2004). Consistent with this shift is an acknowledgement that helping students become self-directed learners is one of the main goals of the educational process — the "North Star" of adult education (Grow, 1991, p. 128). Placed in counterpoint to pedagogical models, andragogy is defined as learning for adults where student and teacher learn together and from each other.

Thus andragogy provides a powerful framework for understanding what differentiates adult learning from childhood learning. Not only are so-called "Web 2.0" tools increasingly popular with students, but research also suggests they have potential to create collaborative learning environments (Wheeler & Wheeler, 2009). However, these tools are rarely developed with the specific needs of teachers and learners in mind (Laurillard, 2009). As more and more college courses migrate online, it is important to examine whether wikis could provide the interaction to enhance the student experience or give a voice to students who are unable to or unwilling to communicate in a classroom discussion setting.

Using the principles of andragogy as a framework, this article examines the use of wikis in two journalism courses at a large Midwestern university, encouraging learners to become more self-directed by engaging them in an online dialogue about how best to report on diverse populations. The contents of the wikis were compiled into best-practices documents that informed the students' subsequent coursework (and professional work as journalists). These documents also were published online, giving their student authors a publication citation on their resumes.

Furthermore, this article discusses the use of media technology to foster student interaction and growth, representing a method to educate practicing journalists as well as future journalists. It provides educators with an outline for engaging students in similar projects to improve their skills as journalists and critical thinkers.

This article presents two case studies applicable to self-directed learning and critical thinking within journalism classes, which should also help journalism instructors encourage accurate and objective reporting. It also provides a method for applying wiki-based projects in non-journalism classrooms.

Andragogy: An Approach to Adult Learning

Introduced by Knowles in the 1960s, the concept of andragogy focuses on the ways adult learning differs from childhood learning. The exact nature of adult learners is complex. To better understand adult learners, researchers have examined biological, psychological, and sociocultural models, while integrative models have been developed to consider combinations of those three factors (Imel, 2001). When considering what it means for adults to learn, it is important to remember that adult learning needs are intertwined with the social context in which they are rooted (Merriam, Caffarella, & Baumgartner, 2007). Bandura (2008) noted: "People are contributors to their life circumstances, not just products of them" (p. 1). The phrase "not just" suggests that there is some interplay between human choice and behavioral predetermination, and educators should not ignore either.

 To understand the complexities of andragogical learning, one must attempt to define what it means to be an adult learner. Research in adult learning examines participants with minimum ages from 16 to 25 (Merriam, Caffarella, & Baumgartner, 2007). Such a wide range is needed because learners progress into adulthood at different speeds. Similarly, the divide between pedagogy and andragogy is a continuum upon which learners travel as they develop and become more self-directed (Knowles, 1990). However, research suggests that learners should be making the switch from pedagogical to andragogical styles of learning by late adolescence (Knowles, 1990) — a period that encompasses traditional college undergraduates.

Andragogy is based on six assumptions:
1.   Adult learners are moving from dependency to self-direction.
2.   Prior experiences offer a rich resource for learning.
3.   Adult learners' readiness to learn is associated with real-life tasks or problems.
4.   Adult learners use education to develop competence to solve problems.
5.   Adults need to know the reasons they are learning something.
6.   The most powerful motivations for adult learning are internal (Knowles, 1990; Kerka, 2002; St. Clair, 2002).

Thus, if andragogy tells us that adult learners are motivated by goal- and relevancy-oriented learning opportunities coupled with experience-based problem solving (Wang, 2007), then the biggest qualitative difference between adult learners and childhood learners is the necessity to consider adult learners co-equal partners in the learning process. Vella (2002) asserted that the key to successful adult learning is a relationship that promotes respect between learner and teacher, adding that without respect "there is no honest defining of learning needs, no dialogue, no listening" (p. 62). Moreover, given their previous experiences, adult learners may be capable of teaching themselves to a certain degree. In fact, Wang (2007) concluded that an andragogical student-centered approach with adult students is a much better choice than a teacher-centered pedagogical approach. The incorporation of a wiki into a classroom involving adult learners results in equal partnerships that assist their learning.

Courses Using Wikis to Create Best-Practices Documents

A strong critique of traditional teacher-centered educational practices is Freire's banking concept of education (1970), in which education "becomes an act of depositing, in which the students are the depositories and the teacher is the depositor. Instead of communicating, the teacher issues communiqués and makes deposits which the students patiently receive, memorize, and repeat" (p. 72). An important part of encouraging learners to become self-directed is adopting a dialogic approach to instruction, based on the principle that adult learners have enough experience to engage in dialogue with teachers about myriad topics (Vella, 2002). The following course projects engaged students in this type of learning environment, recognizing their participatory skills as andragogical learners.

Research Method

To engage today's "digital natives" (Prensky, 2001a; Prensky, 2001b), the instructor of the two courses at a large Midwestern university chose wiki projects to generate discussions while also promoting learning in an online environment. This research investigates the effectiveness of wikis in the two case studies or courses detailed below. Research suggests that wikis are useful in the development of formative assessments which transcend simple grade-giving and promote dialogue between learners and instructors (Hatzipanagos & Warburton, 2009). They have also been found to encourage students' critical awareness of citing sources and intellectual property (Wheeler & Wheeler, 2009).

A wiki -- a website that allows individuals to interact through contributions and corrections to material that they create online -- ¬¬was used because of the shift in contemporary news media toward online interaction. As media consumers continue to turn to the Internet for news, students need to feel comfortable working in an online environment. Wikis possess several characteristics that make them useful in collaborative learning environments: ease of use, ability to co-edit documents, automatic publication of contributions, and non-hierarchical control structures that give students ownership and control over their contributions (Larusson & Alterman, 2009). Furthermore, wikis promote teaching strategies focused on thinking in ways that allow classrooms to function as systems capable of growth that mirrors human progress (Glassman & Kang, 2011). Classroom use of wikis simultaneously promotes individual learning and building collaborative knowledge (Cress & Kimmerle, 2008; Harrer et al., 2008).

During each 15-week semester, the wikis used in both courses allowed students to write and share their suggestions, comment on one another's ideas, and edit the compilation of these suggestions to amass collectively agreed-upon lists of best practices. Figure 1 illustrates each of the primary steps in this process.
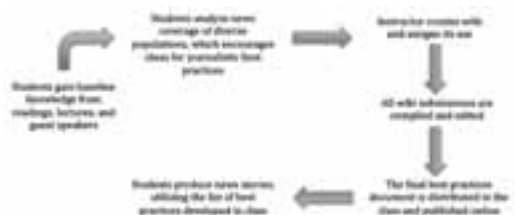

*Figure 1. Model for wiki use in a
journalism classroom*

Case One – "Reporting on Islam" Course

In the fall of 2009, a pilot course called "Reporting on Islam" offered students the opportunity to learn more about the complexities involved in such coverage. The class consisted of fourteen students (eight undergraduates, five master's students and one doctoral candidate; seven women and seven men; all Caucasian except for one African-American woman and one Chinese woman). Ten students listed journalism as their primary major; two were majoring in international relations, one in comparative cultures, and the doctoral student was enrolled in the media and information studies program. Using a wiki, the instructor assigned students to contribute to a list of best practices for reporting on the topic. What ensued was the aggregation of current and past reporting experiences with examples from recent news media. The material was compiled, edited, and ultimately formed into a document titled "Best Practices for Reporting on Islam," which is available online.

Case Two – "Telling Immigrant Stories" Course

In Spring 2010, the same instructor developed a course called "Telling Immigrant Stories." It gave students the chance to learn more about the diverse immigrant populations in the United States and analyze news coverage. There were ten students (five undergraduates and five master's students; nine women and one man; all Caucasian except for one African-American). Eight listed journalism as their major; one was in communication and the other in American studies. Using a wiki, students collaborated to create a journalistic resource that presents answers to frequently asked questions about immigrants and how they should be covered by the news media. This wiki produced an online document, "100 Questions and Answers About Reporting on Immigrants."

The Wiki Projects

Before students were asked to contribute to their respective wikis, they were exposed to media texts, media critiques, and presentations by guest speakers. The media texts included recent examples of U.S. news coverage. Students also read scholarly media critiques and developed their own critiques through in-class discussions and analyses of news stories. Guest speakers ranged from journalists to scholars and included practicing Muslims and recent immigrants. Students were encouraged to make decisions about what constitutes fair or unfair coverage of Muslims and immigrants. They were asked to add to the wikis only after they had developed a basic knowledge of the topic and reflected on deficiencies in news coverage. The learning was self-directed, as it was left up to the students to identify and expand their own critiques of the media coverage. Their critiques informed the subsequent class discussions and, ultimately, the direction of the class, encouraging "iterative exchange of ideas and practice attempts" as suggested by Laurillard (2009) to allow student contributions to clearly influence the synthesis of ideas in the course, giving them ownership of their learning process (p. 14).

Halfway through the semester, the instructor enabled the wiki and assigned its use. In the first stage, each student contributed five guidelines for journalists to follow when reporting on Muslims or immigrants. Students were encouraged to submit specific examples from news coverage to illustrate the relevance of their submissions and to make sure their contributions were grounded in real journalistic problems. Since many guidelines were

submitted, some overlap emerged. In the intermediate stage, the instructor edited each document to merge similar submissions. For example, in "Best Practices for Reporting on Islam" several contributions mentioned the need to avoid generalizing about Muslims, since they are diverse; these were summed up under one topic: "Research Islam." Next, students participated in class discussions and online revisions. By the end of the semester, a list of best practices was distributed to each class. The resulting documents show what a collaborative, dialogic approach to journalism instruction can produce in upper level classes.

Results of Wiki Assignments

The effectiveness of online learning has been demonstrated in journalistic and academic contexts. The social nature of online tools such as blogs and wikis encourages the development of open and less formal dialogue (Hatzipanagos & Warburton, 2009). Wolfe et al. (1998) predicted that assisting students in generating Internet-facilitated materials would engage them and encourage collaborative learning. The authors presented four case studies and found journalism students effectively taught themselves by using Web-based resources enabled by the teacher (p. 43). More recently, Pena-Shaff and Altman (2009) surveyed students after their participation in online discussions. While some students identified disadvantages of the technique, a majority found it useful in understanding course content.

The wikis used in these courses proved a way to engage journalism students in reflective and collaborative learning environment. The students were able to consider the implications of poor news coverage (i.e., media effects) and justify the need for substantial efforts to increase education among journalists to improve reporting. Contributing to the wikis gave them the opportunity to share ideas with other aspiring or working journalists.

The results of these wiki interactions included classic reporting standards such as adherence to established ethics, accuracy in gathering facts, striving for objectivity, and using sources. The students found that journalists must better adhere to well established standards of good journalism enumerated in the resulting documents. The student work suggested that these standards should be practiced regardless of subject matter, including a strong commitment to the core democratic values of a free press. Both documents gave reporters an outline for how to avoid common misperceptions about Muslims and immigrants often perpetuated in news reports.

Effectiveness of the Wiki Projects

These two case studies provide successful examples of how instructors can lead adult learners to produce better news coverage. Both courses facilitated critical thinking among future journalists in an interactive online environment. Furthermore, these courses created best-practices documents that are now available online as informational resources for journalists. Hoewe, Bowe, and Zeldes (2011) illustrated the positive implications of using a wiki in a journalism classroom and documented the students' improved journalistic skills. Elaborating on those ideas, the wikis used in these two case studies provide more evidence that the method is effective. Both sets of reporting guidelines have been covered by the International Journalists' Network (2010a; 2010b), which has users, primarily journalists and media managers, from 185 countries. The Media Diversity Institute, a non-profit organization headquartered in London, also posted the "Reporting on Islam" guidelines.

Furthermore, these wiki exercises produced tangible, practical results for the students, lending authenticity to the task, a key component of the success of collaborative learning (Grant, 2009). After posting the best practices documents, students wrote news stories related to the course topic. Students in "Reporting on Islam" produced thirteen news stories published by an international wire service and three published by local news outlets. Several were also picked up by an online weekly news site. The same site published three news articles by students in "Telling Immigrant Stories," some written by undergraduates who were not journalism majors. In "Reporting on Islam," another student who is not a journalism major received second place in a prominent national competition for newswriting on religion. In "Telling Immigrant Stories," one student received honorable mention in a national student radio competition for her stories about an immigrant-owned business and the increase of foreign-born priests in the state.

Interviews conducted at the beginning and end of "Reporting on Islam" - posted on YouTube - suggest that as a result of the course, students gained a more sophisticated understanding of Islam. On the first day of class in September 2009 and the last day of class in December 2009, the instructor asked students, "What is Islam?" One student's response in September reflects a motivation for taking the course and his baseline knowledge of Islam: "Basically, I guess I probably know enough to know I don't know enough about Islam to probably speak on it. So, I'm looking for this class to help me kind of have guidance on that as well."

Asked the same question at the end of the course, this student said, "It's a culture, a religion, a political expression that is a way of life for individuals. And individuals apply it in different ways. It is not monolithic. It's not something that is the same in all circumstances and in all universes and time. It's something that is changing that responds to modernity and is also at the same time traditional."

Taken together, the comments reveal that the course was meaningful for him: It "definitely made me uncomfortable at times, but honestly, that is how I know it was worthwhile … It helped me experience a part of the world and this country that I never had before."

Figure 2. A screen shot of an article on the course "Reporting on Islam" published on the wire service.

In "Telling Immigrant Stories" the words of a student interviewed for a radio story illustrate how the course pushed students to gain practical knowledge: "I think it's hard to access immigrant populations and kind of put yourself out there because there can be cultural barriers and language barriers but I think it can really help you develop as a journalist and as a person."

Figure 3. A screen shot of an article on the course "Telling Immigrant Stories" published on the wire service.

Interviews with students, publication of students' work produced in these courses, and coverage of the best-practices documents testify to the success of the wiki projects. This supporting evidence should encourage other instructors to employ similar methods as a way of promoting learning among adult students.

Application to Other Academic Contexts

The wiki projects outlined here are applicable to non-journalistic academic settings. Figure 4 illustrates the primary steps involved in implementing a wiki project in a non-journalism classroom.
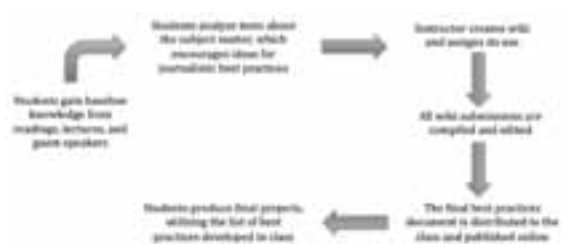

Figure 4. Model for wiki use in a non-journalism classroom

To implement this type of project, instructors should begin by providing students with baseline knowledge through readings, lectures, and guest speakers. Students should have access to a number of texts related to the subject matter. The texts should be critiqued as positive and negative examples of writing and research about the course's primary topic. The critiques of these texts are fodder for the wiki submissions.

After the introductory learning experience, the instructor should enable the wiki. Students should be required to produce at least five entries to be included in a list of best practices about the topic. They also should have the opportunity to collaborate by examining other students' submissions and providing feedback. The instructor should also provide feedback to each student. These steps will culminate in editing, compressing, and compiling the work.

The instructor should conduct a last edit of the document and post it online so the students as well as the public have access. Finally, students should be assigned a final project that offers them the opportunity to use the best practices document they created. As these steps show, the case studies described in this article show how wiki projects can encourage dialogic learning among adult learners.

Discussion and Conclusions

Best practices for teachers dictate that teaching should match the level of the learners' self-direction while pushing them toward greater self-direction — a process that educators can either help or hinder (Grow, 1991). The wiki projects outlined in this article featured minimal instructor direction at key parts of the project; rather, they allowed students the opportunity for intellectual heavy lifting. As Wolfe et al. (1998) predicted, the use of wikis helped a faculty member advance active learning, reinforce community, and enhance the intellectual interactions among students.

The use of wikis in the two courses examined illustrates a way in which journalism instructors can help students cover specific populations more accurately; it involves asking them to work with their peers in an online environment that requires the analysis of common stereotypes and generalizations. The wiki projects empowered students to use classroom-based knowledge to critique the news media, media texts, and ultimately news media production. As students created their contributions for the best-practices documents, they generated a greater knowledge of Muslims, Islam, and immigrants while simultaneously improving their reporting. Enabling critical thinking that produced a set of best practices helped spur introspection among the future journalists in the courses. Students were then able to produce news stories with fewer instances of biased and unfair reporting.

Overall, the courses examined in this article provide a framework upon which other courses can be developed. They shine a light on the need for critical thinking within journalistic classrooms and sparking desire within students to produce better news coverage.

Similar to Weisgerber's findings (2009), each of these wiki projects served a twofold purpose, offering students a way of documenting their progress over the semester while simultaneously giving the instructor a way to assess their achievement of course goals. Ultimately, it coupled dialogic learning through an online tool with andragogy to produce an effective teaching strategy in journalism classrooms that is applicable in other academic contexts as well.

By developing their own list of best practices and using them to produce copy, adult learners use the principles of andragogy in which they can "participate in the diagnosis of their learning needs, the planning and implementation of the learning experiences, and the evaluation of those experiences" (Merriam, Caffarella, & Baumgartner, 2007, p. 85). Notably, students have varying degrees of ability to function in a self-directed learning environment — a situation that can become particularly problematic when a student who needs direction encounters a teacher who does not provide it (Grow, 1991). The wiki projects outlined here encouraged interaction in a collaborative environment with both the instructor and fellow students, which formed the type of co-equal relationship proven necessary by prior research about adult learning. The results bolster Yukawa's (2006) finding that wikis can play an integral role in encouraging co-reflection — a type of collaborative critical thinking that involves cognitive and affective interactions along with personal relationship building.

By allowing students to offer ideas and test their theoretical understanding in an environment where they receive feedback from instructor and peers, this combination of activities is congruent with the type of learner-centric framework proposed by Laurillard (2009).

Limitations, however, do exist if these wikis are not properly implemented. Cubric (2007) cautioned that student engagement in wiki-based learning projects is directly related to the frequency of instructor feedback and the clarity of the assignment design — limitations that educators should heed when conceptualizing such assignments.

While the results of one-shot case studies like these cannot be generalized, they may offer a necessary incremental step toward understanding the use of an online social media tool in educational settings, as suggested by Wheeler and Wheeler (2009). Since such use of social media tools brings both great enthusiasm and "moral panic" in the education community and little solid evidence has been found to support either perspective (Selwyn & Grant, 2009, p. 82), the case studies presented here offer some evidence in support of an enthusiastic and positive approach to use of these tools in the classroom. However, the design of the wiki tool itself can erect barriers to collaborative writing (Forte & Bruckman, 2007). This project did not conduct usability tests, and it is certainly possible that a different wiki tool would yield better results.

Future study should include the production of more classes that seek to produce best-practice documents. While some such information is available now, reworking it into a compressed, simple, and functional model will facilitate and encourage its use in both the classroom and the newsroom. Ultimately, the use of wikis in journalism and other courses will help instructors create in an online environment the kinds of "real-life" projects that may benefit adult learners during their formal studies and long after.

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