

Canadian Journal of Learning and Technology La Revue canadienne de l'apprentissage et de la technologie

Volume 37(3)

Fall/automne 2011

The Impact of a Collaborative Wikipedia Assignment on Teaching, Learning, and Student Perceptions in a Teacher Education Program

Les effets d'un travail de collaboration sur Wikipédia sur l'enseignement, l'apprentissage et les perceptions des étudiants dans le cadre d'un programme de formation des enseignants

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Abstract

This study explored students' perceptions and behaviors of public wiki use during a collaborative Wikipedia assignment in a graduate technology and literacy education course. Results confirmed that the majority of students had an overall positive experience posting content on Wikipedia. Students learned how to use Wikipedia through collaborative practice, including, how to adhere to its standards and cite work properly, the importance of critically evaluating online information, and the value of publishing work to an authentic audience. Students (prospective and current teachers) reported numerous ways in which collaboration on Wikipedia could be integrated into their K-12 classrooms in order to promote higher order thinking and foster meaningful knowledge construction.

Keywords

Wiki, Wikipedia, collaboration, literacy, teacher education

Résumé

Cette étude a permis d'explorer les perceptions et les comportements des étudiants par rapport à l'utilisation publique de Wikipédia durant un travail de collaboration dans le cadre d'un cours universitaire en technologie et littératie. Les résultats ont confirmé le fait que, dans l'ensemble, la majorité des étudiants sont parvenus à diffuser du matériel sur Wikipédia. Ils ont appris comment utiliser Wikipédia en collaboration, comment suivre ses règles et comment citer des travaux adéquatement, l'importance d'une évaluation critique des renseignements en ligne et l'intérêt que représente la publication de travaux à l'intention d'un public réel. Les étudiants (enseignants éventuels ou diplômés) ont signalé de nombreuses façons d'intégrer Wikipédia dans

les classes de la maternelle à la douzième année de manière à favoriser une réflexion de plus haut niveau et à encourager l'acquisition de connaissances véritables.

Introduction

In order to best prepare students for the 21st century, it is critical that teachers develop and cultivate students' collaborative skills in the classroom, and provide them with a variety of contexts to hone those skills, both online and offline (Partnership for the 21st Century Skills [P21], 2009). The National Educational Technology Standards [NETS] indicated that students must be able to publish their work online to a wide range of audiences (International Society for Technology in Education [ISTE], 2007). When students publish to an authentic audience (i.e., not just the teacher or peers in their classroom), "they work harder as a group than they work for their teacher alone . . . Many teachers also agree that students generally work harder for an authentic audience than for a grade" (November, 2010, p. 5). A wiki is an example of one web 2.0 tool that has the potential to promote students' collaborative skills through the posting of content to an online authentic audience. Even though wiki technology has been around for many years, its use in education is still somewhat novel (Parker & Chao, 2007). Therefore, for the purposes of this study it is important to provide definitions and examples of wiki technology and collaborative practice.

Terminology

A wiki is a web site that can be edited by anyone who has been given access (Wikipedia, 2011a). Access level depends on the creator's goals and intentions for the wiki, and may be set to public, semi-public (protected), or private. A private wiki is only viewable and/or editable by users that have been given permission to access its content. On a semi-public wiki, anyone can view its pages, but only those given special privileges can edit. Finally, a public wiki is viewable and editable by anyone. Wikipedia is one example of a public wiki, whose unprotected pages can be edited by anyone with Internet access (Wikipedia, 2011b). It is also an example of a public wiki where the likelihood of student collaboration with others outside the classroom is high, as the English version of Wikipedia receives about 10 million views per hour (Wikimedia Foundation, 2010). Wikipedia is a site where students can asynchronously collaborate with other users outside the classroom, and participate in the continual evolution of a collective intelligence. For the purposes of this study, collaboration is defined as the act of adding to or modifying another's work on a single document (e.g., Wikipedia article or talk page).

Background

Literature has revealed that wiki technology is increasingly being used in teacher education programs to support and improve literacy, knowledge construction, and collaborative practices (Chi & Ng, 2011; Matthew, Felvegi, & Callaway, 2009; DeGennaro, 2010; Ren, Baker, & Zhang, 2009; Schroeder, 2009; Vratulis & Dobson, 2008; Wheeler & Wheeler, 2009; Wheeler, Yeomans, & Wheeler, 2008). Public wiki use has the potential to positively impact writing skills (sentence construction, spelling, and grammar), awareness of intellectual property, processing and understanding of content, interaction among students, and the development of critical thinking skills (Matthew et al., 2009; Schroeder, 2009; Wheeler & Wheeler, 2009; Wheeler et al., 2008). There is also some evidence to suggest that public wiki use can transform the writing

and knowledge construction process into a social experience, with multiple students adding content and modifying each other's work on one or more documents (Karasavvidis, 2010).

Collaborative Learning

Collaborative practice on public wikis can motivate and engage students in meaningful ways and challenge students to produce their best work (Chandler & Gregory, 2010; Every, Garcia, & Young, 2010; Wheeler et al., 2008). However, many instructors are unfamiliar with wiki technology and may not know how to take full advantage of learning with a wiki. Relatedly, some prior literature argues, it may also be difficult for instructors to relinquish their traditional role of "gatekeeper of knowledge," and instead, allow students to learn through active knowledge construction and collaboration with other users on the wiki (Vratulis & Dobson, 2008, p. 293). Students also need to understand that it is okay to edit another's work, and that by doing so, "it is not a breach of trust but an act of responsibility and mutuality" (Hemmi, Bayne, & Land, 2009, p. 28). As evident from this study, students' fears of editing another's work will often dissipate after their first wiki assignment. Therefore, instructors may only need to address this new form of collaboration and social knowledge construction at the first use of a wiki in the classroom.

Students may have difficulty appreciating and understanding the value of co-creating content on a wiki with their peers and with those outside the classroom (Wheeler et al., 2008). Additionally, students may have difficulty relinquishing ownership of published content and may need to learn that once their work is published on a wiki it is no longer their own, but the "property of the whole learning community" (Wheeler et al., 2008, p. 994). The instructor must help students understand the concept of social knowledge construction and should encourage students to engage in conversations about their published content on the discussion pages of the wiki (Maehre, 2009). In Maehre's (2009) study, students were more likely to understand and value collaboration on Wikipedia when another Wikipedia users edited their work. Students were also more likely to recognize and fix their errors when those errors were discussed in the discussion pages.

A number of studies have examined students' perceptions of collaborative practice on public wikis and reported both positive and negative outcomes (DiPietro et al., 2010; Hemmi et al., 2009; Lin & Kelsey, 2009; Neumann & Hood, 2009; Vratulis & Dobson, 2008; Wheeler et al., 2008). Typically, participation on public wikis incited initial negative reactions among students. This included frustration, hesitation, and anger related to modifying another's work or having their own work modified on a wiki (Chandler & Gregory, 2010; Hemmi et al., 2009; Lin & Kelsey, 2009; Schroeder, 2009; Vratulis & Dobson, 2008; Wheeler & Wheeler, 2009). This was a new form of collaboration for many students and they frequently avoided editing another person's work on a wiki by adding, rather than modifying, posted content (Schroeder, 2009). However, these issues were more likely to diminish when the instructor assigned specific roles or tasks to students (Wheeler et al., 2008). Positive outcomes related to wiki use in the classroom included more reflective processing of course content, a stronger sense of community and accomplishment, and increased potential for students to submit their best work (DiPetro et al., 2010; Lin & Kelsey, 2009; Matthew et al., 2009; Schroeder, 2009; Vratulis & Dobson, 2008).

The Study

This study builds upon current wiki research, providing additional insight into the use of public wikis, specifically Wikipedia, as a tool to facilitate collaborative practice in teacher education programs. This mixed-method study investigated participants' perceptions and use of Wikipedia as part of an asynchronous collaborative assignment given during a graduate-level technology and literacy teacher education course (see Appendices B and C for assignment details). Findings were compared to a similar study conducted in the previous year for the same course (Every, Garcia, & Young, 2010). Suggestions for Wikipedia use in K-12 classrooms were also provided. The research questions addressed in this study included,

- 1. What are participants' perceptions of participation on Wikipedia as part of a course requirement?
- 2. What are participants' perceptions of public wikis, specifically Wikipedia?
- 3. How do participants perceive that Wikipedia can be used in their K-12 classroom? For example, what types of Wikipedia-based activities do participants deem appropriate for the K-12 classroom.

Method

Course Characteristics

Participants in this study were enrolled in either the 2010 spring or summer section of an elective technology and literacy graduate teacher education course taught at a small, suburban, northeastern liberal arts college. Students enrolled in this course represented about 3% of the total population of graduate students enrolled at the College at that time. The instructor did not teach any other courses during the spring or summer 2010 semester. The main goal of this course was to provide K-12 teacher educators with a variety of teaching strategies and technology tools that could be used to promote and enhance literacy instruction in the K-12 classroom.

Sampling Procedures

The researcher used a non-probability convenience sampling method for this study. After both course sections were complete, the researcher (i.e., instructor) obtained the Institutional Review Board [IRB] approval to recruit students from both sections for participation in this study. All thirty graduate teacher education students enrolled in the spring (N=17) and summer (N=13) section of the course were recruited at the same time after both course sections were complete and final grades were assigned at the end of summer 2010. Important IRB-approved study information and forms were mailed to the students including: an information sheet that provided study details, two copies of the consent form requesting permission to use previously submitted assignments, and a self-addressed stamped envelope to send the consent form back to the researchers. Participants were informed that their real names would not be used. A total of sixteen, or 54% of students agreed to participate in the study. There was an even split between sections, as half of the participants were from the spring section, and the other half were from the summer section. The majority of participants were female (93.8%), with only one male, and ages ranged from approximately 21-50 (see Table 1 for additional participant demographics).

Table 1: Participant Degrees Pursuing During Time of Coursework

| Master's Degree | Total | % |
|---------------------------------------|-------|------|
| Secondary Reading & Language Arts | 9 | 56.3 |
| Elementary Reading & Language Arts | 4 | 25 |
| Curriculum and Instruction | 2 | 12.5 |
| Nursery to Grade 3 | 1 | 6.3 |

Instructor Role

The first researcher listed in this study was also the course instructor. At the time of the study, the instructor was a doctoral student at a large, public, northeastern university, pursuing a degree in educational technology. The instructor, along with her advisor (i.e., second researcher) obtained IRB approval before recruiting students to voluntarily participate in the study. This study posed minimal risk to participants. All data were collected from previously submitted assignments, surveys, and email correspondence. No data were altered during the collection or analysis process, and all results were truthfully reported. No data were excluded from the final results. Data were maintained and electronically stored on the researcher's password-protected computer and only shared with the second researcher for review. The instructor removed identifying information on students' survey and open-ended responses and replaced student names with pseudonyms prior to analyzing qualitative data in order to maintain students' confidentiality.

In this study, there was a potential for intervention and proficiency biases, in that the classes were comprised of different students and were completed at different points of the year at different computer lab sites. Differing interactions between instructor and student and available technology between the two sections may have influenced the results of the study. Also, students may have presented more favorable views of Wikipedia and of the assignment in their openended responses, with the false perception that their grade was dependent on a positive response. There was also a potential for instructor biases as the instructor was responsible for assigning pseudonyms to student data, and may have been able to associate pseudonyms with actual student names.

Wikipedia Survey

Both sections of the course completed the same online Wikipedia survey at the beginning and end of the semester. The surveys administered during both sections and at both points of the semester (i.e., beginning and end of the assignment) contained exactly the same instructions and questions. Survey items collected general demographics and information on student perceptions and behaviors regarding Wikipedia use for academic work and personal benefit.

At the time of both course sections, the instructor was unable to find an appropriate validated survey that would measure students' perceptions of Wikipedia as an information source for use in the classroom. As a result, the instructor used a recently developed survey instrument that had yet to be validated. It was suitable for the Wikipedia assignment and provided the instructor with valuable course information. In order to ensure content validity, the instructor consulted an expert in survey research and in the subject matter during the development of the instrument. The expert's input was used to make appropriate revisions and additions to the survey.

The survey was used in this study in order to determine whether or not students' perceptions of Wikipedia changed over the course of the semester following the Wikipedia assignment. Thirty questions measured students' perceptions of Wikipedia's usefulness for academic and personal work, credibility and accuracy of the site, and the likelihood that they would edit and/or create articles on the site. Survey items were based on a 6-point likert-type scale with responses ranging from strongly disagree to strongly agree (see Appendix A for survey instrument).

Wikipedia Assignment

Students in both sections of the course completed a Wikipedia assignment, where they were required to create an account on Wikipedia and asynchronously collaborate with other Wikipedia users on a single document (i.e., add content to the site). Students participated in collaborative practice through the addition of content to Wikipedia articles already in progress and through changes made to their posted content from other Wikipedia users. As previously defined in this paper, collaboration included the act of adding content to an online document already in progress. This assignment was an opportunity for students to contribute to a collective intelligence and participate in the asynchronous collaborative nature of Wikipedia. The assignment instructions differed slightly between the two sections and are as follows:

Spring Section

In the first section during the spring semester, students were required to add content, individually, on any topic of interest and, in groups, on a topic related to educational technology (see Appendix B for assignment details). In essence, students were asynchronously collaborating with others Wikipedia users on an ever-evolving document. After posting, students monitored their contributions once a week until the end of the semester and reflected on their perceptions and experiences by answering nine required assignment-related questions, and submitting to the instructor via email during the last week of the course (see Appendix B for reflection questions).

Summer Section

In the second section during the summer semester, students were required to individually add content on any topic of interest on Wikipedia and monitor their contributions once a week until the end of the semester (see Appendix C for assignment details). They were required to post their responses to the same nine reflection questions as the spring section on their personal blog during the last week of the course (see Appendix C for reflection questions).

Assignment Objectives

This study only examined components of the assignment that were identical to both sections (i.e., students' individually posting content on any topic of interest and responses to the Wikipedia survey). The course and assignment were the subject of a previous research study conducted in the spring 2009 semester (Every et al., 2010). However, in this study, students had more time to monitor their page for contributions from the general public and had more flexibility on the type of content that was posted. The researcher's (i.e., instructor of the course) intention for this assignment was for students to collaborate with other Wikipedia users (i.e., an authentic audience) through the addition of content. It was assumed therefore, that collaboration would occur with Wikipedia users outside of the classroom (i.e., not the teacher or peers). Students were not directed to comment on, or edit their peers' Wikipedia articles or reflections. They were

to post content on Wikipedia and monitor their own page in order to see if outsiders from the general public would edit and/or comment on their posted content. Students had the option of discussing article edits on the Wikipedia talk page and continuing to edit the article during and after the course.

Data Collection

The researcher obtained IRB-approval prior to collecting and analyzing the data. Data were collected from both sections at the same time. Procedures for data collection were almost identical.

Spring Section

Data were collected from email correspondence, responses to the pre- and post-course online Wikipedia survey, and student reflections at the middle and final point of the Wikipedia assignment submitted to the instructor via email. Student reflections consisted of their responses to nine required questions related to the Wikipedia assignment.

Summer Section

Data were collected from email correspondence, responses to the pre- and post-course online Wikipedia survey, and student reflections posted on their blogs at the final point of the Wikipedia assignment. Student reflections consisted of their responses to nine required questions related to the Wikipedia assignment.

Data Analysis

All data from both sections were collected and stored online and analyzed after the courses ended and grades were assigned. Quantitative survey data from both sections were analyzed separately and in aggregate using PASW Statistics 18.0 to test for significance and obtain frequencies and descriptive statistics. Qualitative transcripts from both sections for the Wikipedia assignment were analyzed using open-coding ethnographic research methods to identify common themes among student responses to open-ended questions. Data did not differ significantly between the two course sections, and therefore was presented in aggregate to provide a more comprehensive view of the results.

Results

Initial Wikipedia Assignment Perceptions

Findings suggested that students' initial reactions to the Wikipedia assignment were mostly positive, with only a third of students (31%) issuing negative remarks. This was in contrast to the previous year's study, where the majority of initial reactions were negative (Every et al., 2010). This may be due to the fact that in the previous year, students did not consult the instructor-provided Wikipedia resources before adding content to the site. They simply posted content without learning how to correctly use the Wikipedia markup language. As such, many students in the previous year experienced instantaneous deletions of content for failure to adhere to Wikipedia guidelines and standards. In the current study, students were more likely to consult the resources prior to adding content to the site.

Similar to the previous year, negative reactions included, intimidation, apprehension, skepticism, and nervousness. It was intimidating and overwhelming for students to determine what article they would edit. These fears were evident in Amy's comment when she said,

At first I was overwhelmed at the amount of information found on Wikipedia and trying to think of and find a page I could edit felt intimidating. Once I found a page, I was also hesitant to actually doing any editing. I was unsure of exactly how to go about editing the page and was afraid that I might publish something that someone would argue or delete from the site.

Many of the students were also afraid that other Wikipedia users would edit or delete their posted content. However, participants' perceptions evolved over the course of the assignment, as evidenced in Betty's comment,

My experience ended up being okay. I was very nervous at first because I hate posting things online. I felt like since anyone can update and change Wikipedia that I wasn't contributing to a good source. Through this class I proved myself wrong. It was interesting to post on two sites that I am interested in.

Contributing to Wikipedia was a new experience for many of these participants. They posted content on a site that would be viewed by thousands of people, so it was not surprising that some of them experienced minor initial negative perceptions related to this experience.

Wikipedia Collaboration

Posting Content

Participants were required to reflect on their collaboration with the public through edits made to their posted content or postings on the article's talk page. Almost every article on Wikipedia has an associated talk page, on which users can post comments, questions, or critiques related to content added to the article. Almost half, or 46% of participants, experienced modifications or deletions to posted content on their article page, and about a third (33%) posted on the talk page or received a comment on the talk page related to their article edits. This was more than the previous year, where few modifications to participants' article edits occurred (Every et al., 2010). For some participants, it did not matter if anyone edited their work. The mere thought of someone editing their work was enough to incite concern and discontent, as Carl stated, "At this moment, no one has edited my work. However, I would be upset if someone did edit my work." Participants that were either upset or offended when content was modified reacted in such a way because they felt that their posted content was accurate and appropriate. Debra provided a detailed account of such an occurrence in her reflection, yet was relieved when another Wikipedia user restored her content. She said, "... When I saw that my original post was restored, I felt good, but was thankful that someone else had done for me what I should have done the minute I noticed the original changes to my contributions." Although Debra was initially perturbed by this experience, it eventually gave her the confidence to restore future contributions, should a similar issue occur.

Four participants reported positive perceptions related to modifications made to their posted content. Typically, the changes were minor and related to grammatical errors or a failure to adhere to Wikipedia standards and guidelines. These four participants were not upset with the

changes because they realized that the changes were appropriate. Felicia learned more about Wikipedia's Neutral Point of View (NPOV) policy and the importance of presenting non-biased information on the site through the process of this assignment,

Several updates were made to my post. The first change was to remove NPOV ('negative' point of view). I was slightly surprised by this because I thought I had maintained a neutral perspective when I made the edit, but upon reading the revisions, I saw the errors in my point of view.

Collaboration with the public allowed participants the opportunity to perceive value in constructing knowledge and citing sources. This was evident in Gail's reflection on her content that was deleted,

I had about a split second of outrage, followed by about a minute of 'why do you people take yourselves so seriously,' and then I read the definition of the notability standard and realized that the reference I provided was not enough to meet the standard. I do think the changes were appropriate – or at least they made me feel as though someone with a standard was watching over the content on Wikipedia. I approve of the standard established. It gives me hope for the whole 'collaborative knowledge' aspect of the Internet. I will be resubmitting my information in the future with the appropriate citations.

Participants were able to learn more about Wikipedia through the process of adding content to the site and subsequent collaboration with the public. As such, participants whose edits were not modified by other Wikipedia users considered themselves to be at a disadvantage. They perceived that their lack of collaboration with other Wikipedia users was a loss of potential learning opportunities that were available to other participants in the class. Helen was one participant whose posted content was not modified. She expressed discontent when she said, "Unfortunately, nobody made any changes to my addition. I was actually looking forward to the possibility of experiencing someone changing my work." This year I had participants post content at the beginning of the semester in order to provide ample time for other Wikipedia users to see the changes and respond. However, it was also possible that participants' posted content was accurate, thereby eliminating reasons why others would make changes to their articles.

Talk Discussion Page Participation

The talk page was a place where participants had the opportunity to collaborate with the public and discuss any changes made to the Wikipedia article. As previously stated, only a third of participants made contributions on the talk page. A few participants were surprised or upset with this lack of participation. Amy stated,

No one discussed my contributions to the page, though I wish they would because I would like to know what other people think. I also would like a little credit for fixing the section I edited because the information was wrong and there was not much there until I got my hands on it.

For those that participated on the talk page, feedback was mostly related to article improvements and modifications. For example,

No one updated my work but two people added to the discussion. One person just wanted to make sure that I was familiar with the source documentation. The other person suggested that I look for more information to make the page that much more informative. I liked getting the input because it gave me direction and more confidence to keep at it. I did not make any changes however, I rechecked my source citation and looked for more information which I was unable to find as of yet. (Irene)

Overall, when the talk page was used to post content, participants stated they became aware of their errors without requiring additional feedback from the instructor.

Overall Wikipedia Assignment Perceptions

Findings suggested that the majority, or 88% of participants' overall perceptions of the Wikipedia assignment were positive. They found it easy to add content, learned more about the Wikipedia process, and increased their trust of content on the site. The data also revealed some evidence of an increased awareness by participants of how to critically assess wiki information. Many found value in using Wikipedia for personal benefit and academic work. Similar to the previous year, the instructor of the course purposefully abstained from providing explicit instruction on how to use the Wikipedia interface (markup language). Instead, participants were directed to web sites that contained Wikipedia tutorials and support. Unlike the previous year, participants' reported little to no problems using the Wikipedia markup language. An example of this change from 2009 was found in Carl's reflection when he stated, "I found the process of adding content rather easy and non-intimidating. What also made this process easy was consulting the Wikipedia Cheatsheet; this was helpful in learning how to add a heading." This year, participants' were more likely to consult the online resources before they attempted to add content to the site.

As participants learned more about Wikipedia through the process of the assignment, their perceptions began to change and they recognized the value and accuracy of the site. This was evidenced in Eileen's reflection,

I found the wiki project to be very informative. I have told my students that they are allowed to use Wikipedia for a springboard to search for information, but that it does not necessarily have a lot of credibility. I now realize that it not necessarily true; it seems that from speaking with other classmates that the website is monitored and information posted on Wikipedia is actually back checked and sometimes it can be deleted. I think this was a positive experience for me so that I can more appropriately guide my students when they are researching information on Wikipedia.

Another fear that dissipated over the course of the semester was related to adding content to a public site. Some participants were initially afraid of posting information online, but later found it informative and enjoyable. Jen reported on this transformation after completing the assignment. She was more likely to contribute to other articles on Wikipedia and/or other public forums. She stated the following in her reflection,

During this project I learned that I am capable, as well as anyone, in contributing to Wikipedia pages. I also realized that Wikipedia is well monitored by others and that sources are usually of value because of the regulations required in posting them.

Four overall negative perceptions of the assignment were found including difficulty determining the content to post, fear and anxiety related to contributing to a public forum, and previously held biased perceptions of Wikipedia. Only one participant, Debra, expressed a strong aversion to the assignment. At the end of the assignment she said,

As I stated during my individual wiki project reflection, I had no real enthusiasm for Wikipedia. With the help of my history professors, I became indoctrinated with the belief that Wikipedia is NOT an acceptable source for history research. It may be used as a launching pad, but not to be cited in any research projects.

While most of the participants' perceptions of Wikipedia changed over the course of the semester, Debra continued to believe that Wikipedia was not appropriate for research and this perception negatively impacted her perceived value of the assignment.

Implications for K-12 Educators

As one requirement of the assignment, participants were asked if they would consider using Wikipedia in their current or future K-12 classroom. The instructor of the course was interested in determining whether or not participants' found value in using Wikipedia in a K-12 classroom setting. Students posted their responses to this assignment reflection question in an email to the instructor (spring section) or on their personal blog (summer section).

The majority, or 88%, would consider viewing, editing, and/or creating pages with their class. They listed a variety of ways to use Wikipedia in their own K-12 classroom in their reflection responses, including showing students how to use Wikipedia, encouraging students to publish work online, teaching students how to critically evaluate online resources, fostering meaningful class discussions, creating group collaborative opportunities, and promoting higher order thinking skills. Others remarked on its potential as a motivational tool and ability to present more enjoyable learning experiences for their K-12 students. Some participants were enthusiastic about using Wikipedia and more likely to integrate it into their future classroom than others, as Amy stated,

I would definitely consider using Wikipedia with future classes. Editing Wikipedia as a class would be an excellent way to show students appropriate ways to use Wikipedia and to have their work published online. Students could see how other people edit work online and would, hopefully, be more careful when using information found online.

The importance of publishing work to an authentic audience was another common reason why participants indicated that they would use Wikipedia in their future classroom. Carl, a middle school language arts teacher, discussed a variety of ways that he would use Wikipedia in his classroom,

I will be showing students my posting with the hopes that I may have my own students posting information to other Wikipedia sites based on our readings of novels . . . If I can find a page that is not already created for one of our novels or short stories, we might create a page together . . . any changes to the site we edited or created together would be done so by an authentic audience (someone other than me, the teacher) and may make for a wonderful classroom discussion on why we think someone felt the need to edit our content, is the editor a "credible expert" to make such changes, how it made them (us)

feel, and allow us to reflect on what we may change in the future, if anything, when posting on Wikipedia again.

Helen, another language arts teacher, saw Wikipedia as an opportunity for K-12 students to identify and fix grammatical issues,

I will most definitely edit pages on Wikipedia in the future. As an English teacher it is in my nature to make minute changes in grammar when reading through material. I did make one grammatical change on the softball page and will most likely repeat that as I continue reading articles on Wikipedia. I would also love to add material on other pages. I think this could be a great way of introducing Wikipedia to the students and show them what I have done, as an example to follow.

Wikipedia was not limited to the language arts classroom. Many of the participants recognized the importance of collaborative practice on Wikipedia and felt that such experiences would promote higher order thinking skills in other content areas, as Nancy stated,

This would be an excellent extension activity to promote higher-level thinking and response skills as well as collaboration through technology. This type of activity would fit best after a science or social studies research activity or during Writer's Workshop.

In summary, participants' reflection responses suggested that Wikipedia could be used as a research tool, as an opportunity for spelling/grammar improvement, to promote higher order thinking, and to provide authentic and meaningful collaborative experiences in the K-12 classroom.

Barriers to K-12 Classroom Implementation

Only three participants reported that they would not be able to use Wikipedia in their future K-12 classroom. Findings suggested that the barriers preventing Wikipedia use in the classroom were outside the control of the participants. One participant was unable to use Wikipedia because of her school's firewall settings. The other two participants, Betty and Liz, were unable to use Wikipedia due to readability issues and the age/maturity level of their students. Betty, a second grade teacher, stated that she would only be able to use the tool if it was for higher grades, but did not specify appropriate grade levels: "I wouldn't use Wikipedia in my second grade classroom. There is too much text for the kids to sort through . . . Wikipedia may be more beneficial to older students." Liz, a special education teacher, also found Wikipedia to be a difficult tool to integrate in her classroom. She stated,

Right now I am teaching a fourth grade special education class and I do not think it would be a great activity for my students . . . If I had an older group of students and they were researching a topic, I would absolutely begin to use this.

These findings were consistent with last year's study where many of the participants were unable to use Wikipedia in their classroom due to readability issues (grade level), but recognized its applicability and value for upper elementary (i.e., grades 5-6), middle, and high school (Every et al., 2010).

Wikipedia Survey

Findings from the online Wikipedia survey revealed that participants' perceptions of Wikipedia changed from the beginning to the end of the semester following the completion of the assignment. There was a statistically significant (p < .05) difference for 27 out of the 30 items when comparing the pre- to post-assignment survey (see Table 2 for descriptive statistics and statistical significance). In all cases, participants' perceptions of Wikipedia improved. After completion of the assignment, participants were more likely to agree with the following statements:

- Wikipedia is a credible source.
- I am not afraid to edit or add to another person's work on Wikipedia.
- I enjoy collaborating on Wikipedia.
- Wikipedia can be used as a reference for college projects and/or papers.
- Wikipedia is helpful for academic work, to learn course material, and to prepare for a test in college.
- I can complete academic work more efficiently with information that I find on Wikipedia.
- If I see something incorrect on Wikipedia, I will edit the page and correct it.

In order to eliminate the possibility of a sample bias effect on survey results, we compared the class average with the sample average. Results confirmed that our sample was representative of the class population. The class population reported slightly more positive perceptions of Wikipedia following the assignment, as there was a statistically significant (p < .05) difference for 29 out of the 30 items when comparing the pre- to post- assignment survey. The single item that was not significant for the course population was the same as one of the non-significant items for the sample (i.e., I always check to see if the information that I find on Wikipedia is credible).

Originally, many participants in this study reported that they did not know enough about any subject or were not an expert, and therefore, could not edit a page on Wikipedia. After the assignment, participants no longer believed those statements to be true, and were comfortable creating and/or editing pages on the site. Also of note, participants' initial belief that many of the pages on Wikipedia contained false information reduced from 56.3% to only 18.8%. The Wikipedia assignment had a positive impact on participants' overall perceptions of Wikipedia and their capabilities of creating and/or modifying articles on the site.

| Survey Item | Pre-test M (SD) | Post-test M (SD) | ρ |
|--|--------------------|---------------------|------|
| Wikipedia is a credible source | 2.9 (1.3) | 3.9 (1.0) | .03 |
| I know that I can edit any unprotected page on Wikipedia | 4.1 (1.6) | 5.3 (.86) | .01 |
| Wikipedia should not be used as a reference for scholarly work | 5.1 (.96) | 3.6 (1.3) | .001 |
| I know that I can create a page on Wikipedia | 3.9 (1.6) | 5.4 (.73) | .002 |
| I am afraid to edit another person's work on Wikipedia | 4.3 (1.3) | 2.5 (1.4) | .000 |
| I am afraid to add to another person's work on Wikipedia | 4.1(1.4) | 2.4 (1.4) | .001 |
| I don't like editing another person's work on Wikipedia | 4.4 (1.1) | 2.9 (1.5) | .004 |

Table 2: Wikipedia Survey Results

| I don't like adding to another person's work on Wikipedia | 4.5 (1.1) | 2.8 (1.2) | .000 |
|--|-----------|-----------|------|
| I do not know enough about any subject to contribute to Wikipedia | | 2.3 (1.2) | .009 |
| I do not have enough time to add to or edit pages on Wikipedia | | 3.6 (1.6) | .04 |
| I am not an expert; therefore I cannot edit any pages on Wikipedia | | 2.3 (1.1) | .004 |
| I am not an expert; therefore I cannot create any pages on | | 2.3 (1.1) | .003 |
| Wikipedia | | | |
| I enjoy collaborating on Wikipedia | | 3.9 (1.4) | .000 |
| Wikipedia can be used as a reference for college projects and/or | | 3.6 (1.3) | .003 |
| papers | | | |
| I am comfortable editing pages on Wikipedia | 2.9 (1.5) | 4.4 (.96) | .002 |
| I am comfortable creating pages on Wikipedia | 2.8 (1.6) | 3.9 (.93) | .02 |
| I am only comfortable editing pages on Wikipedia related to topics | 2.6 (1.3) | 4.4 (.96) | .000 |
| that interest me | | | |
| Many of the pages on Wikipedia contain false information | 3.8 (1.2) | 2.8 (.93) | .02 |
| If I see something incorrect on Wikipedia I will edit the page and | | 4.3 (.96) | .000 |
| correct it | | | |
| If I edited a page on Wikipedia, I told others about it | 2.1 (.98) | 4.4 (1.1) | .000 |
| If I created a page on Wikipedia, I told others about it | 2.2 (1.1) | 3.9 (1.0) | .000 |
| Wikipedia is as accurate as a regular encyclopedia | 2.4 (1.4) | 3.5 (1.1) | .02 |
| Overall, Wikipedia is beneficial to me during the school year | 3.0 (1.6) | 3.8 (1.0) | .12 |
| Wikipedia is helpful for my academic work | 2.8 (1.4) | 4.0 (1.2) | .01 |
| Wikipedia is helpful for my personal work | 3.3 (1.4) | 4.3 (1.2) | .05 |
| Wikipedia is helpful to learn course material | 2.7 (1.4) | 3.9 (1.2) | .01 |
| Wikipedia is helpful to prepare for a test in college | 2.6 (1.4) | 3.9 (1.2) | .03 |
| I can complete academic work more efficiently with information | 2.5 (1.3) | 3.5 (.82) | .01 |
| that I find on Wikipedia | | | |
| I am satisfied with the content on Wikipedia | 3.4 (1.4) | 4.1 (.85) | .14 |
| I always check to see if the information that I find on Wikipedia is | 3.8 (1.8) | 4.6 (1.3) | .12 |
| credible | | | |
| | | | |

Discussion

Limitations

Several limitations existed within this study. First, it may be difficult to generalize beyond the immediate population and context of the study due to the relatively small sample size and homogenous background of participants (i.e., language arts educators). Additionally, research methodologists have reported that the sampling method used in this study "should not be used for a study purportedly describing students as a whole" (Babbie, 1990, p. 99). Results may not be representative of other groups within or outside of teacher education programs. In this study, the language arts educators recognized the benefits of editing an article and fixing grammatical and spelling issues. In contrast, a mathematics educator may not consider fixing grammatical or spelling errors a priority. Therefore, the participants in this study may be more inclined to hold favorable views of the Wikipedia assignment due to its strong literacy focus. Teacher educators in other disciplines may hold different views.

Second, because the participants were largely new to wiki editing, findings may differ from those that are more experienced with such technologies and web sites and may vary with teachers more familiar with Wikipedia.

In order to eliminate the potential of respondents' biases, participants were not made aware of the study until after the course ended. It was possible that participants only agreed to participate in the study under the assumption that they may be participants in a future course taught by the instructor, who was also the researcher. However, this assumption was unfounded as the instructor only taught this course at the College, and therefore could not be the participants' instructor in a subsequent course.

Conclusion

The introduction of a Wikipedia assignment in a graduate teacher education course produced a few initial negative perceptions of apprehension, intimidation, and scepticism. This did not surprise the researcher, as it was the participants' first exposure to editing content on a wiki. Contributing to Wikipedia was a learning experience for many of the participants. Participants learned more about the wiki interface and markup language through collaboration with other Wikipedia users. At the end of the semester, participants reported overall positive perceptions of the assignment, and many found Wikipedia to be a valuable source of information and appropriate for use as an assignment or project in their own K-12 classroom. Participants' perceptions of Wikipedia as an information source improved after completion of the assignment, with many indicating that they would likely make corrections to errors on Wikipedia in the future.

References

Babbie, E. (1990). Survey research methods (2nd ed.). Belmont, CA: Wadsworth.

- Chandler, C. J., & Gregory, A. S. (2010). Sleeping with the enemy: Wikipedia in the college classroom. *The History Teacher*, 43(2), 247-257.
- DiGennaro, D. (2010). Grounded in theory: Immersing preservice teachers in technologymediated learning. *Contemporary Issues in Technology and Teacher Education*, 10(3), 338-359.
- DiPietro, J. C., Drexler, W., Kennedy, K., Buraphadeja, B., Liu, F., & Dawson, K. (2010). Using wikis to collaboratively prepare for qualifying examinations: An example of implementation in an advanced graduate program. *TechTrends* 54(1), 25-32.
- Every, V., Garcia, G., & Young, M. (2010). A qualitative study of public wiki use in a teacher education program. In D. Gibson & B. Dodge (Eds.), *Proceedings of Society for Information Technology & Teacher Education International Conference 2010* (pp. 55-62). Chesapeake, VA: AACE.
- Hemmi, A., Bayne, S., & Land, R. (2009). The appropriation and repurposing of social technologies in higher education. *Journal of Computer Assisted Learning*, 25(1), 19-30. International Society for Technology in Education. (2007) NETS student standards 2007. Retrieved from <a href="http://www.iste.org/standards/nets-for-students/nets-stude
- Karasavvidis, I. (2010). Wiki uses in higher education: Exploring barriers to successful implementation. *Interactive Learning Environments*, 18(2), 219-231.
- Lai, Y. C., & Ng, E. M. W. (2011). Using wikis to develop student teachers' learning, teaching, and assessment capabilities. *Internet and Higher Education*, 14, 15-26.
- Lin, H., & Kelsey, K. D. (2009). Building a networked environment in wikis: The evolving phases of collaborative learning in a wikibook project. *Journal of Educational Computing Research*, 40, 45-169.
- Maehre, J. (2009). What it means to ban Wikipedia. College Teaching, 57, 229-236.
- Matthew, K. I., Felvegi, E., & Callaway, R. A. (2009). Wiki as a collaborative learning tool in a language arts methods class. *Journal of Research on Technology in Education*, 42(1), 51-72.
- Neumann, D. L., & Hood, M. (2009). The effects of using a wiki on student engagement and learning of report writing skills in a university statistics course. *Australasian Journal of Educational Technology*, 25, 382-398.
- Nix, E. M. (2010). Wikipedia: How it works and how it can work for you. *The History Teacher*, 43, 259-264.

- November, A. (2010). *Empowering students and technology* (2nd ed.). Thousand Oaks, CA: Corwin.
- Parker, K. R., & Chao, J. T. (2007). Wiki as a teaching tool. *Interdisciplinary Journal of Knowledge and Learning Objects, 3*, 57-72.
- Partnership for 21st Century Skills. (2009). *P21 Framework Definitions*. Retrieved from http://www.p21.org/index.php?option=com_content&task=view&id=254&Itemid=119
- Ren, Z., Baker, P., & Zhang, S. (2009). Effects of student-written wiki-based textbooks on preservice teachers' epistemological beliefs. *Journal of Educational Computing Research*, 40(4), 429-449.
- Schroeder, B. (2009). Within the wiki: Best practices for educators. *AACE Journal*, 17(3), 181-197.
- Trentin, G. (2008). Using a wiki to evaluate individual contribution to a collaborative learning project. *Journal of Computer Assisted Learning*, 25, 43-55.
- Twu, H. (2009). Effective wiki strategies to support high-context culture learners. *TechTrends*, 53(5) 16-21.
- Vratulis, V., & Dobson, T. M. (2008). Social negotiations in a wiki environment: A case study with pre-service teachers. *Educational Media International*, 45(4), 285-294.
- Wheeler, S., & Wheeler, D. (2009). Using wikis to promote quality learning in teacher training. Learning Media and Technology. *Learning, Media and Technology, 34*(1), 1-10.
- Wheeler, S., Yeomans, P., & Wheeler, D. (2008). The good, the bad and the wiki: Evaluating student-generated content for collaborative learning. *British Journal of Educational Technology*, 39, 987-995.
- Wikimedia Foundation (2010). *Wikipedia statistics*. Retrieved from http://stats.wikimedia.org/EN/Sitemap.htm
- Wikipedia. (2011a). Wiki. Retrieved from http://en.wikipedia.org/wiki/Wiki
- Wikipedia. (2011b). *Wikipedia, the free encyclopedia*. Retrieved from http://en.wikipedia.org/wiki/Main_Page

Appendix A - Online Wikipedia Survey

The survey that you are about to complete will examine student perceptions and behaviors regarding the use of public wikis for academic work and personal benefit. Please complete the entire survey and submit before the designated due date on the syllabus. Thank you!

Public Wiki Behaviors & Perceptions

A wiki is a collaborative web site that can be directly edited by anyone who has access to it. Access is usually decided by the wiki's creator and can take many forms including public, semipublic, and private. A public wiki is viewable and editable by anyone. Wikipedia is an example of a public wiki. It is a free encyclopedia that can be viewed and edited by anyone in the general public. However, Wikipedia is not the only public wiki available. Many people have created their own public wikis and posted content that met specific needs and goals. This content could then be viewed and edited by anyone.

Wikipedia Use

Wikipedia is a free, web-based encyclopedia project. Wikipedia's 13 million articles (three million in English) have been written collaboratively by volunteers around the world, and almost all of its articles can be edited by anyone with access to the site.

1: How often have you used (viewed pages on) Wikipedia as a resource for academic work? (Select one: Daily, Weekly, Once a Month, Once Every 2-3 Months, Twice a Year, Once a Year, Never)

2: How often have you used (viewed pages on) Wikipedia as a resource for personal benefit? (Select one: Daily, Weekly, Once a Month, Once Every 2-3 Months, Twice a Year, Once a Year, Never)

3: How often have you cited Wikipedia as a reference for academic work? (Select one: never, once, twice, 3-4 times, 5-10 times, 11-15 times, 16+ times)

4: Have you ever created and/or edited a page on Wikipedia? (Select one: Created, Edited, Created and Edited, Never Created, Never Edited)

Experience with Wikipedia

1: What were your reasons for creating and/or editing a page on Wikipedia (check all that apply).

- Personal benefit
- School/class requirement
- Saw an error and wanted to fix it
- Interested in topic
- Knew a lot about topic
- Other: (space is provided for student to indicate other)

2: Has an instructor ever encouraged you to create or edit a page on Wikipedia, or required that you create or edit a page on Wikipedia for an assignment? (Yes/No Response)

• You are on this page because you indicated in the previous question that an instructor has encouraged, or required you to create or edit a page on Wikipedia. Please explain your experience(s): (space will be provided for student to explain)

Future Wikipedia Use

1: How many distinct pages on Wikipedia do you believe you will edit in the next 5 years? (Select one: none, one, two, three, four, more than four)

Please indicate the strength of agreement/disagreement with the following statements (select one: Strongly Disagree, Disagree, Tend to Disagree, Tend to Agree, Agree, Strongly Agree)

2: I will edit at least one page on Wikipedia in the next 5 years.

3: I will never edit a page on Wikipedia.

4: I will create at least one page on Wikipedia in the next 5 years.

5: I will never create a page on Wikipedia.

6: I will view at least one page on Wikipedia in the next 5 years

7: I will never view a page on Wikipedia

Discussion (Talk) Pages

Nearly every page on Wikipedia also has a talk page (also known as a discussion page). A talk page is a space for editors to discuss improvements to articles and other pages. You can get to the discussion page by clicking on the discussion tab at the top of most Wikipedia pages.

1: How many times have you participated on the discussion pages on Wikipedia? (Select one: never, once, twice, three times, four times, more than four)

You are on this page because you indicated in the previous question that you have participated on the discussion (talk) pages on Wikipedia.

- Why did you participate on the discussion pages? (Check all that apply)
- To ask a question
- To clarify/explain an edit that I made to a page
- To argue, point out a disagreement
- To agree with another contributor
- Other: (space will be provided for student to indicate other)

Wikipedia Perceptions

Please indicate your strength of agreement/disagreement with the following statements (select one: Strongly Disagree, Disagree, Tend to Disagree, Tend to Agree, Agree, Strongly Agree)

- 1: Wikipedia is a credible source.
- **2:** I know that I can edit any unprotected page on Wikipedia.
- **3:** Wikipedia should not be used as a reference for scholarly work.
- 4: I know that I can create a page on Wikipedia.
- 5: I am afraid to edit another person's work on Wikipedia.
- **6:** I am afraid to add to another person's work on Wikipedia.
- 7: I don't like editing another person's work on Wikipedia.

8: I don't like adding to another person's work on Wikipedia.

9: I do not know enough about any subject to contribute to Wikipedia.

10: I do not have enough time to add or edit pages on Wikipedia.

11: I am not an expert; therefore I cannot edit any pages on Wikipedia.

12: I am not an expert; therefore I cannot create any pages on Wikipedia.

13: I enjoy collaborating on Wikipedia.

14: Wikipedia can be used as a reference for college projects and/or papers.

15: I am comfortable editing pages on Wikipedia.

16: I am comfortable creating pages on Wikipedia.

17: I am only comfortable editing pages on Wikipedia related to topics that interest me.

18: Many of the pages on Wikipedia contain false information.

19: If I see something incorrect on Wikipedia I will edit the page and correct it.

20: If I edited a page on Wikipedia, I told others about it.

21: If I created a page on Wikipedia, I told others about it.

22: Wikipedia is as accurate as a regular encyclopedia.

23: Overall, Wikipedia is academically beneficial to me during the school year.

24: Wikipedia is helpful for my academic work.

25: Wikipedia is helpful for my personal work.

26: Wikipedia is helpful to learn course material.

27: Wikipedia is helpful to prepare for a test in college.

28: I can complete academic work more efficiently with information that I find on Wikipedia.

29: I am satisfied with the content on Wikipedia.

30: I always check to see if the information that I find on Wikipedia is credible.

Demographics

1: Gender (Male/Female)

2: Age (15-17, 18-20, 21-25, 26-30, 31-35, 36-40, 41-50, 51-60, 60+)

3: Please indicate your current academic status (Undergraduate/Graduate)

4: Please indicate your current degree program (Birth to Kindergarten, Nursery-Grade 3,

Curriculum & Instruction, Middle Level, Elementary: Reading/Language, Secondary:

Reading/Language, Self-Design, Special Education, Other)

5: Full Name

6: Please indicate whether you are taking this survey at the beginning or end of the semester (Beginning of Semester, End of Semester)

Appendix B - Spring 2010 Wikipedia Assignment

Introduction

This purpose of this project is to expose educators to critical web 2.0 technologies that have the potential to promote positive and powerful learning experiences in the classroom. Wikipedia has been selected for this assignment, as a form of collective intelligence that will allow you to contribute to a larger community outside of the classroom. While completing this project, consider the implications for your current or future K-12 classroom? How can Wikipedia be used in the classroom as a form of collective intelligence? What literacy skills does this technology promote? How can group work be incorporated into Wikipedia writing?

Part 1 - Individual

The first part of the assignment involves selecting one (or more) topics on <u>Wikipedia</u> of interest during the first two weeks of class. Do you know a lot about a specific topic? Do you have an interest in a specific topic? This may include, but is not limited to, politics, pop culture, technology, literature, current events, history, science, mathematics, foreign language, geography, and education. Over the course of the semester you will monitor all of the pages that you have selected. On these pages you will make changes (additions and edits) where necessary. It is expected that you will:

- Create an account on Wikipedia (during first class session)
- Complete the Wiki Perceptions/Behaviors Survey (during first class session)
- Learn how to use Wikipedia
- Wikipedia Guidelines
- Wikipedia, Getting Started
- Create a user page on Wikipedia with a brief (few sentences) bio of yourself/background
- Post around one paragraph of text on at least one Wikipedia page (make sure you are logged in when you make these changes). *You may either post text on a page that already exists, or create a page on a topic that has not yet been created.*
- Monitor your page at least once a week for changes (sign up for the watchlist)
- Review & contribute to the talk pages discussion
- Adhere to the Wikipedia Neutral Point of View (NPOV) standards
- Send me an e-mail by with your mid-semester reflection. This reflection relates only to Part 1 (Individual Work).

Mid-Semester Reflection due via Email

Respond to the following questions:

- What pages are you monitoring/editing? (Please provide links and page title)
- What have you edited thus far (deleted, added, modified)?
- Has anyone made changes to your edits? If so, please explain.
- Have you participated on the discussion (talk) section on any of the pages that you are monitoring?

Part 2 - Group

As a class, or in 2-3 large groups, you will decide on one page on <u>Wikipedia</u> that you will create or edit. It is up to your group to decide what topic(s) will be updated, created, and/or revised on the wiki. The topic must be related to educational technology and/or literacy. Possible ideas are listed below, but you are not limited to that list. Think about the topics that you are interested in, or subjects that you feel you have some level of expertise. Ultimately, the group should add about 2-3 paragraphs of text to the Wiki. If you find that you cannot come up with that much information on one topic, then you will have to select another topic. If you are editing a page that already exists on Wikipedia, this needs to be a page that has relatively little information, or one that you can add at least 2 paragraphs of text. You will be working in groups (minimum of four people) or as a class. View timeline and rubric below to learn more about this project. *Note: Please check with other groups to see if they are going to be working on the same topic. If that is the case, you will have to decide whether or not to work together, or to select a different topic.*

Part 3 - Reflection on Individual & Group Experience, Post Project Survey

At the end of the semester each student in the class will write a reflection on both the individual and group experience answering the following questions, and submitting via email:

- What pages did you edit/monitor? (Please include URL to each page for individual and group work).
- What is your reaction to the entire wiki project process? Please describe any positive and negative reactions.
- What new literacies were involved in this wiki project?
- If someone from the general public updated or edited your work, or the group's work, how did that make you feel? What types of changes did they make? Did you think that their revisions were appropriate? Did you make any additional changes as a result?
- If someone discussed your contributions, or your group's contributions in the discussion (talk pages), how did that make you feel? Was the discussion positive, negative, or neutral? Did you make any changes as a result?
- Did you personally contribute to the discussion (talk pages)? If so, in what capacity? Did you receive any feedback/comments from others?
- Will you continue to check the pages that you, or your group updated/created in the future (after this course ends)? Why/Why not? Please explain.
- Do you think you will edit pages on Wikipedia in the future? Why/Why not? Please explain.
- Would you consider using Wikipedia in your current/future classroom? Why/why not?

Next, complete the Post Wiki Project Survey, which will be available on BlackBoard.

Appendix C - Summer 2010 Wikipedia Assignment

This purpose of this project is to expose educators to critical web 2.0 technologies that have the potential to promote positive and powerful learning experiences in the classroom. The 2008 Horizon Report (Johnson, Levine, & Smith, 2008) predicted that collective intelligence, knowledge gathered and recorded by many people, was an emerging technology trend that would have an enormous impact on education in the next four to five years. Therefore, Wikipedia has been selected for this assignment, as a form of collective intelligence that will allow you to contribute to a larger community outside of the classroom. While completing this project, consider the implications for your current or future K-12 classroom? How can Wikipedia be used in the classroom as a form of collective intelligence? What literacy skills does this technology promote? How can group work be incorporated into Wikipedia writing?

Wikipedia Writing

This assignment involves selecting one (or more) topics on <u>Wikipedia</u> of interest during the first two weeks of class. Do you know a lot about a specific topic? Do you have an interest in a specific topic? This may include, but is not limited to, politics, pop culture, technology, literature, current events, history, science, mathematics, foreign language, geography, and education. Over the course of the semester you will monitor all of the pages that you have selected. On these pages you will make changes (additions and edits) where necessary. It is expected that you will:

- Create an account on Wikipedia (during first class session)
- Complete the Wiki Perceptions/Behaviors Survey (during first class session)
- Learn how to use Wikipedia
- Wikipedia Guidelines
- Wikipedia, Getting Started
- Create a user page on Wikipedia with a brief (few sentences) bio of yourself/background. Do not post any personal information (address, phone number, full name, etc.)
- Post around one paragraph of text on at least one Wikipedia page (make sure you are logged in when you make these changes). *You may either post text on a page that already exists, or create a page on a topic that has not yet been created.*
- Monitor your page at least once a week for changes (sign up for the watchlist)
- Review & contribute to the talk pages discussion
- Adhere to the Wikipedia Neutral Point of View (NPOV) standards

Reflection

At the end of the semester you will write a reflection on your blog by answering the following questions and submitting via email:

- What pages on Wikipedia did you edit/monitor? (Please include URL to each page for individual and group work).
- What is your Username on Wikipedia?
- What is your reaction to the entire wiki project process? Please describe any positive and negative reactions.

- If someone from the general public updated or edited your work, how did that make you feel? What types of changes did they make? Did you think that their revisions were appropriate? Did you make any additional changes as a result?
- If someone discussed your contributions, how did that make you feel? Was the discussion positive, negative, or neutral? Did you make any changes as a result?
- Did you personally contribute to the discussion (talk pages)? If so, in what capacity? Did you receive any feedback/comments from others?
- Will you continue to check the pages that you updated/created in the future (after this course ends)? Why/Why not? Please explain.
- Do you think you will edit pages on Wikipedia in the future? Why/Why not? Please explain.
- Would you consider using Wikipedia in your current/future classroom? Why/why not?

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