



**"My Classroom Teaching Has Been Changed So Much":
Elementary School Teachers' Perspectives on Teaching
and Learning with Wikis**

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Maria Montessori and John Dewey



Seymour Papert
MIT Media Lab







SEEDS OF EMPOWERMENT

Empowering
be a part of the story

John Seely Brown (2008)
Minds on Fire!, EDUCAUSE Review



A Circle of Knowledge Building and Sharing



Create
Support for creating representations of pedagogical knowledge

Open Knowledge Exchange Zone
Provide venues for sharing experiences/evidence to improve practice

Use
Encourage teachers to review, critique, and learn from peers' represented knowledge

Re-mix
Enable teachers to integrate others' knowledge into their knowledge

Promote these organically & sustainably

Kids are Blogging...

Kids are Podcasting...

Salem City Schools Podcasting

Kids are using Wikis (in schools today, kids have power!)

Pre-Kindergarten Wikis

Kindergarten class wiki

(view homework, calendars, student work, videos, plan parties, ask q's)
<http://mrstaylorkinder.pbworks.com/>

2nd Grade Wikis for Monster Writing (student collaboration)

Littlewood 5th grade wiki: Pictures of plants in environmental center

<http://littlewoodnatureguide.wetpaint.com/>

Student Developed Wikibooks (Wikibooks Junior)

Current Titles

There are currently more than a dozen Wikibooks on dozens and hundreds of subjects with some being developed by students. For information on creating new titles see the 'Our World' page. You can also help create what you think should be included by voting.

Discovery and Innovation

Our World of People

Wikis for Teachers to Share Ideas

The Age of the Wiki

- Everyone has been to Wikipedia and millions use it.
- Wiki use exploding in educational, business, and informal learning settings.
- Minimal research; especially in K-12 education.

My Previous Research on Wikis...


Jimmy Wales, Wikipedia

Research Questions

Goal: to investigate how wikis are integrated in k-6 classrooms.

1. What are the teachers' **motivations** to create class wikis? What are their teaching **goals** by integrating wikis in teaching? What are their **personal beliefs** behind their teaching innovation?
2. How do **teachers, students, and parents** contribute to class wikis?

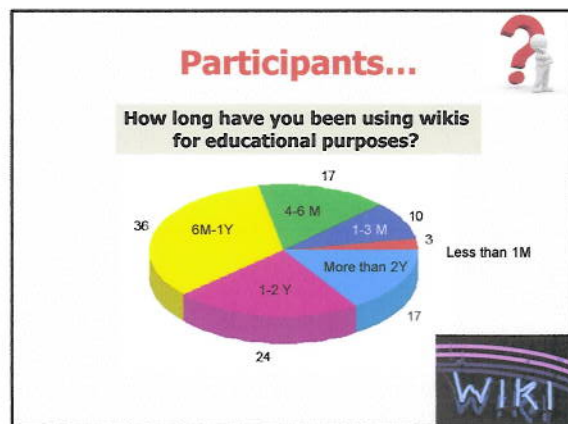
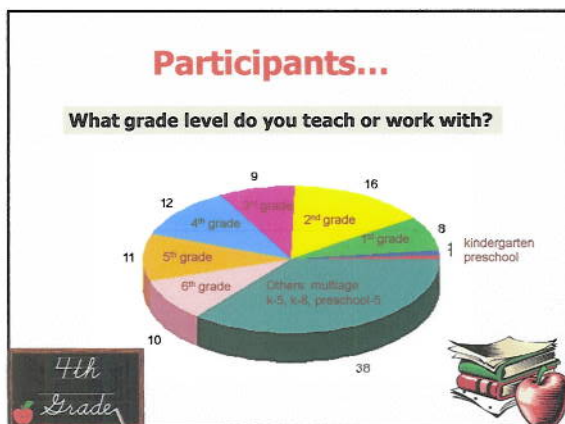
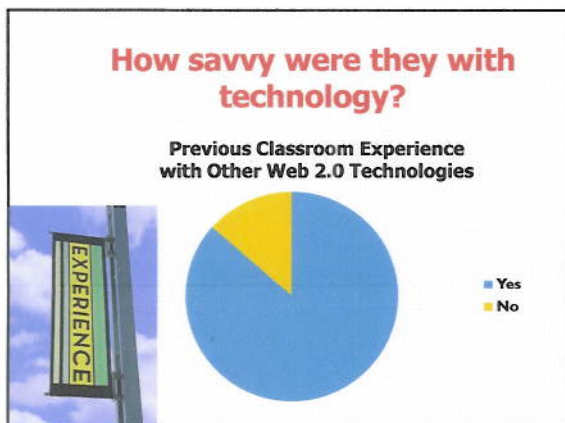
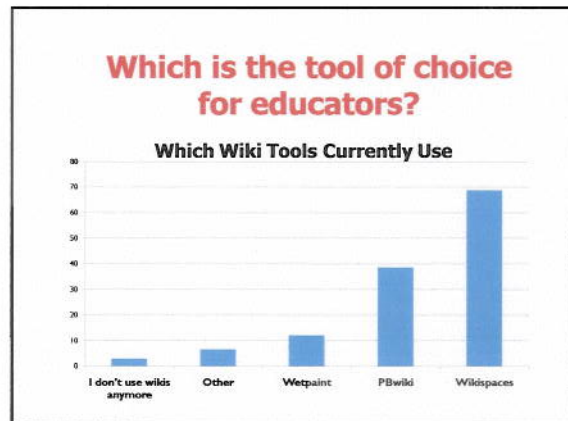
Study Participants



Recruiting participants:

- (1) identified class wiki owners
115 existing wikis from Wikispaces, Pbwiki, and Wetpaint. (Criteria: created by or for k-6th classes)
- (2) Requested well known K-12 educators to invite more potential participants

106 total survey responses (response rate undeterminable)



Research Methodology

- Survey: 44 items
 - Multiple choice items
 - Open ended items
- Interview: 19 items for 17 email participants



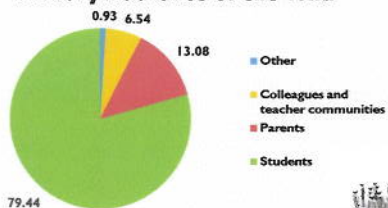
Goals and Motivations

- Target audience
- Instructional goals
- Learning areas and approaches promoted
- Motivations



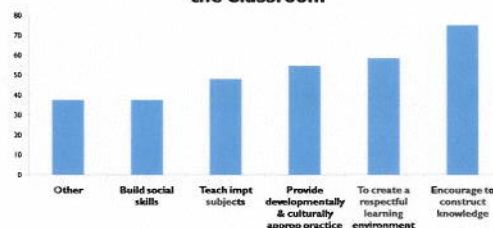
Who is your focus/audience...?

Primary Audience of the Wiki



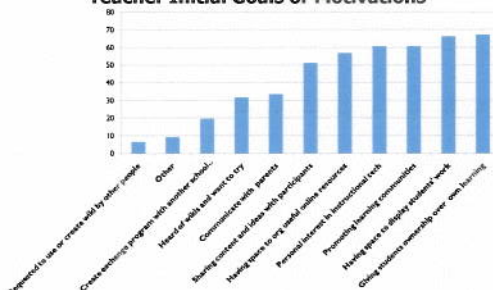
Instructional goals...

Primary Teaching Goal for Using Wikis in the Classroom



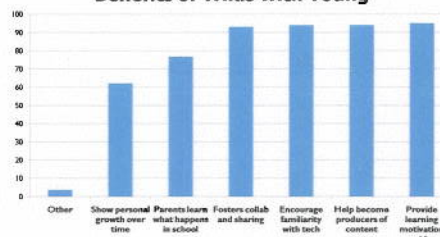
Personal goals...?

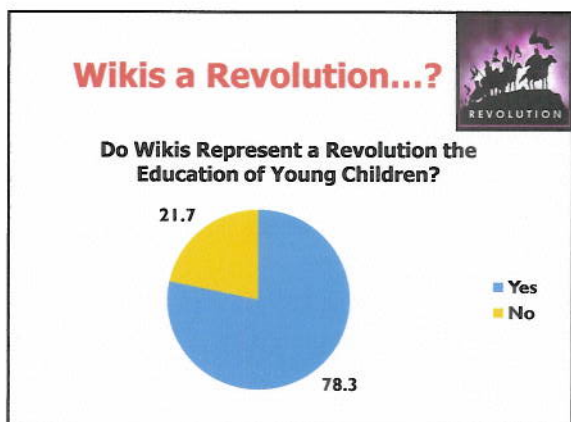
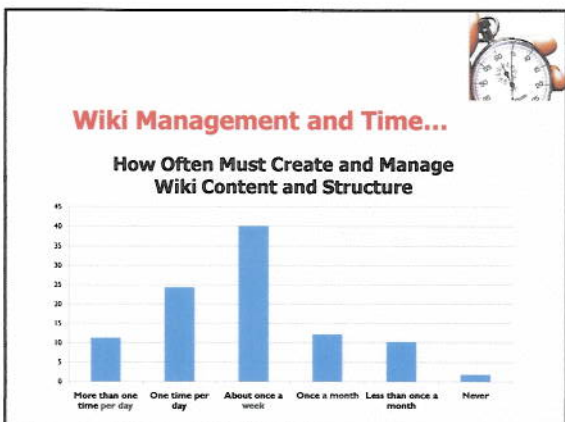
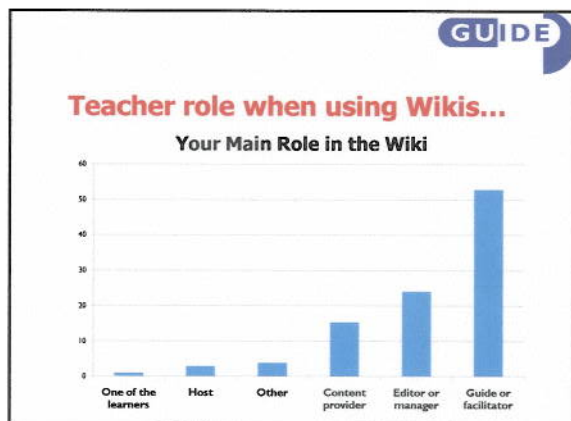
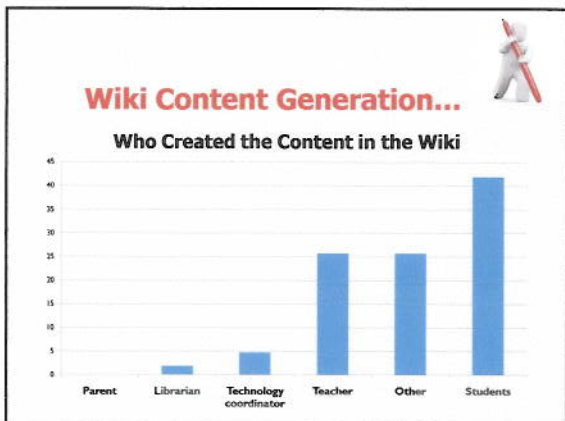
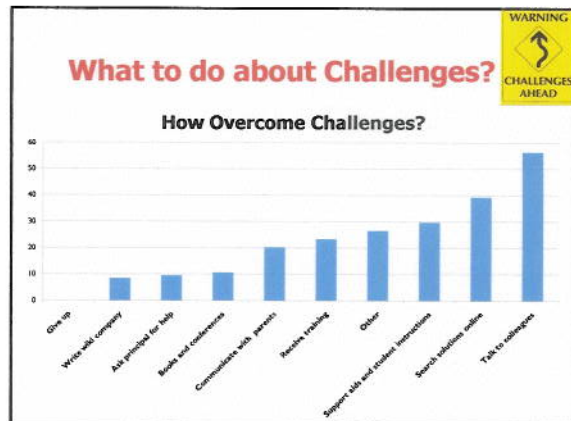
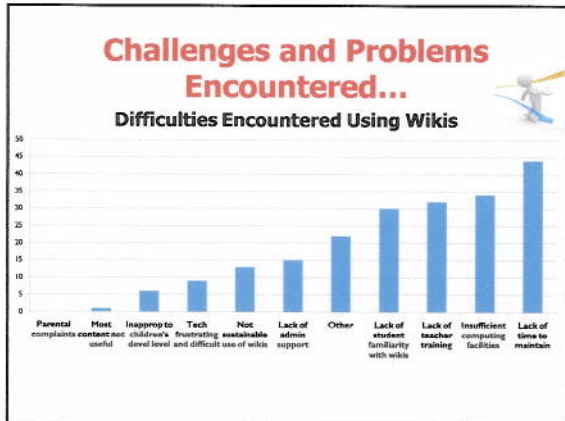
Teacher Initial Goals or Motivations



Benefits of Wikis...?

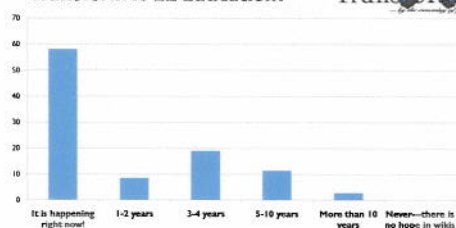
Benefits of Wikis with Young





Educational Transformation...

How Long Take Wikis to Transform K-12 Education?



Qualitative Themes

- Teacher Motivation
- Purpose and Skills Received
- Rewarding to Others
- External Communication
- Training and Development
- Teacher Roles
- Challenges



Teacher Motivation



"I was instructed to create my own wikispace during a Technology Academy held at my school district this past summer. I immediately saw the benefits of the tool and continued to improve and use it after the Academy."

Teacher Motivation



"I was faced with the challenge of teaching a subject that I was not particularly comfortable with. I researched ways that I could teach a writing workshop and I tried to incorporate my passion for technology into this. What I came up with was a writing workshop wiki. My goal is to have students of all ages interacting to help each other become better writers."

Purpose and Skills Served

"I believe we need to have our students display their work for others to see and provide feedback. Students need to be familiar with Web 2.0 or 3.0 sites and activities so as to improve their opportunity for success in the work world during the 21st Century. Digital natives, such as our students, are not served well with "seat time" and our pouring information into them...we really need to teach them how to think critically, be creative/imaginative, and be able to find information which is readily available in many places today."



Purpose and Skills Served

"Students each have their own user name and password. They are each responsible for going through the writing process on the wiki. After they have completed rough drafts, they collaborate together to edit, revise, and finalize their writing pieces. The students are also able to put their personal writing pieces on the wiki. Parents are able to view their child's work, but are not given writing privileges to the wiki."



Rewarding to Students

"The most rewarding part of wiki use is in the motivation and pride our students take in using it. As our 4th grade class worked on their part of the story the willingness to work together was there. They were also motivated to go back and check the progress of the story week by week until the eight week period was over. It was a projected they won't soon forget."



Rewarding to Parents, Grandparents, and Others



"The most rewarding experience has been responses from a set of grandparents in India who were able to email and talk with their grandchild about what was happening at school each week here in America. It was so powerful and experience for him, that he wrote about it often and he and his grandfather wrote a book together about life through the eyes of a 7 year old and a 70 year old. This was all sparked from conversations started from pictures and events posted on the wiki."

External Communication

"I only made it for a class I was teaching. I have expanded and added more things to the sight due to the response I have gotten from parents, and grandparents, about how it gives them things to see and discuss with their kids. I get lots of responses from extended families out of state who now have something concrete to discuss with their kids in my class."



External Communication

"Wikis facilitate in teacher-student-parent interaction and discussion. It allows information to be easily passed on between these parties. It also creates a great outlet for sharing student work."

"Parents get to easily see what we are doing in class. Students have an easy way to be creative and showcase work. Students also have a way to collaborate outside of the classroom. I find the ease of having all work in one place beneficial."



Teacher Training and Development



"Teachers use them for classroom web pages that are useful to the students and parents. Teachers post assignments on the wikis and students even participate in some of our wikis by creating wiki pages to present their projects and research. We also use wikis to organize internet content. We call these our content wikis and they cover all subject areas. Finally, we use wikis for professional development. Wikis are created to provide technology based resources for our staff. We even organize our wikis on a wiki."

Teacher Training and Development

"As I've stated we will continue to use wikis as a professional development and in-school collaboration tool for our instruction, and for use in procedures running our school. On the instructional side we will strive to implement projects state-wide (with the help of our instructional technology department) and globally."



Teacher Roles and Beliefs

In this study, many teachers viewed themselves as **guides, mentors, role models, and leaders**. They find resources and materials and facilitate student learning of them, instead of relying on "work sheet" based instruction.



Challenges: Fear New, No Time

"There is always a fear factor when teachers question if they can learn something new, but we have the best way to implement these types of tools is to jump in and use them. Our experience in the last year has been that teachers who were not comfortable using technology have grown much and are not afraid to any more. Time to learn and implement will always be a challenge, as will teachers who don't want to change the ways they are teaching and implement wikis."



Challenges: Time for Maintenance

"I feel that the most challenging aspects of using a wiki is finding the time to maintain it consistently and getting more student and parent involvement. I've also come across problems with formatting on the actual page that at times is very frustrating."



Challenges: Time within Mandated Curriculum

"The biggest challenge is the lack of time! The sheer volume of tested objectives for the subject I teach prevents me from doing many of the cool things I'd like to do. While I do incorporate Web 2.0 things like wikis during the school year, it's nothing compared to the amount of incorporation I do after the test is over!"



Challenges: Parent Internet Access and Student Literacy

"The main challenges are that some parents do not have internet access and those that don't (approximately 5-7% of our parent population this year) has no interest to go to a public library to use a computer. Another challenge is that little kids aren't fluent enough readers and writers to make their writing easily legible to post ideas or opinions on a Wiki."



Challenges: Technology Challenges

"Some of the tools do not always function quite as we would like them for examples inserting images in our wiki is sometimes problematic. Some of the Web 2.0 technologies that we would like to make use of are blocked by our proxy server."



Still To Do...

- Respondent interviews.
- Survey data analysis comparing k-3 and 4-6th graders.
- Other general data analysis.



Comments & Questions...?



- Note: We have posted many wiki papers to the Wiki-RIKI site:
- <http://wiki-riki.wikispaces.com/>
- <http://www.publicationshare.com/>

