Prepare for Natural Disasters and Outbreaks with Blended Learning
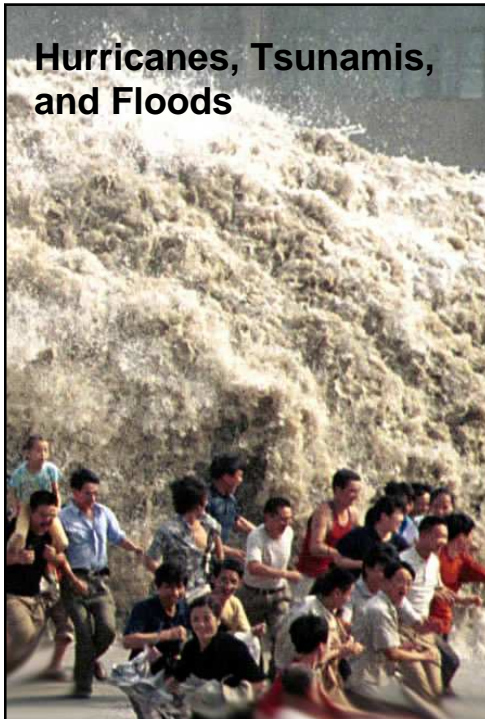
Curt Bonk, Professor, Indiana University

President, SurveyShare, Inc.
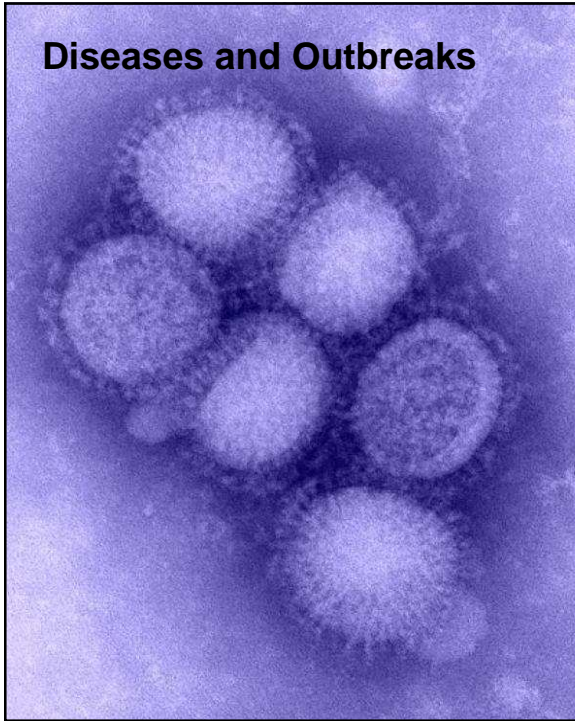cjbonk@indiana.edu
http://mypage.iu.edu/~cjbonk/
http://SurveyShare.com

1

Hurricanes, Tsunamis, and Floods

New video shows tsunami power

2

Diseases and Outbreaks

Blizzards and Ice Storms

SARS in Hong Kong

Reflection: Which of these have you experienced?

1. SARS
2. Earthquake
3. Tsunami
4. Winter Blizzard or Ice Storm
5. Major Flood
6. Hurricane, Typhoon, or Serious Tropical Storm
7. Swine Flu, Asian Flu, or Similar
8. Tornado
9. Near death weather-related situation
10. Other (not listed above)

6

School Closings

When H1N1 Hits Schools

CDC's Swine Flu Toll: 4,000 Dead

November 13, 2009

9

Steps to Prepare for Outbreaks and Disasters

- **Work on a crisis plan**
- **Use online resources**
- **Evaluate the telecommunications infrastructure**
- **Make sure teachers are prepared**

10

Had this happened five or 10 years ago, we'd probably say, 'School is closed, see you in three weeks.'

How Schools and Parents Can Prepare for Swine Flu

How Schools and Parents Can Prepare for Swine Flu

Strategies could be built around anything:

1. Take-home course packets
2. Online materials
3. Listservs
4. DVD and MP3 players
5. Conference calls
6. Internet-based, webinar-style classes

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What can you do?

- **Post syllabus and content online**
- **E-books and other resources**
- **Fully online courses**

(EdWeek.org)

14

What can you do?

- **Phone conferencing (e.g., Skype, Google Talk, VOIP)**
- **Web conferencing**
- **Learning management systems to track progress**

(EdWeek.org)

15

What can you do?

- **Videotape master teachers**
- **Learning packets to be sent home**
- **Check out laptops to younger students**
- **Phone hotline for homework**

(EdWeek.org)

16

What can you do?

- **Interactive study guides online**
- **Online grading and assignment-posting programs**
- **Online resources, textbooks, instructional websites, online databases, and Google Docs**

(EdWeek.org)
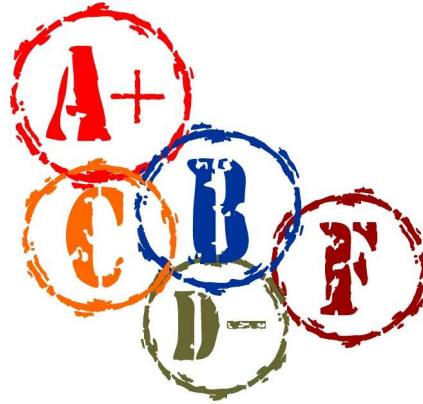
17

What can you do?

- **Post assignments**
- **Develop plan for file or assignment uploading and downloading as well as a system for feedback**

(EdWeek.org)

18

What can you do?

- **Develop plan for hard copies of assignments for students lacking computer access**

(EdWeek.org)

What Can You Do?

- **Elementary: Use website, cable TV programming, create teaching videos to show over TV, blogs, wikis, email to communicate.**

(EdWeek.org)
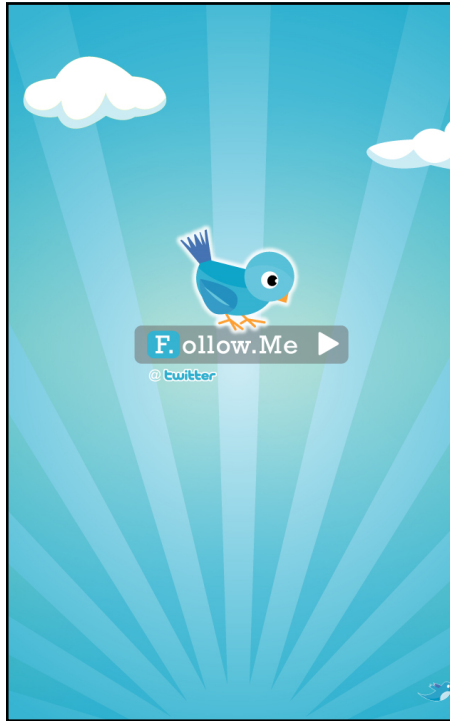
What Can You Do?

- **Middle School: add Twitter for district messages.**

(EdWeek.org)

What Can You Do?

- **High School: add laptops to take home, Blackboard to teach online.**

(EdWeek.org)

Recorded class meetings

23
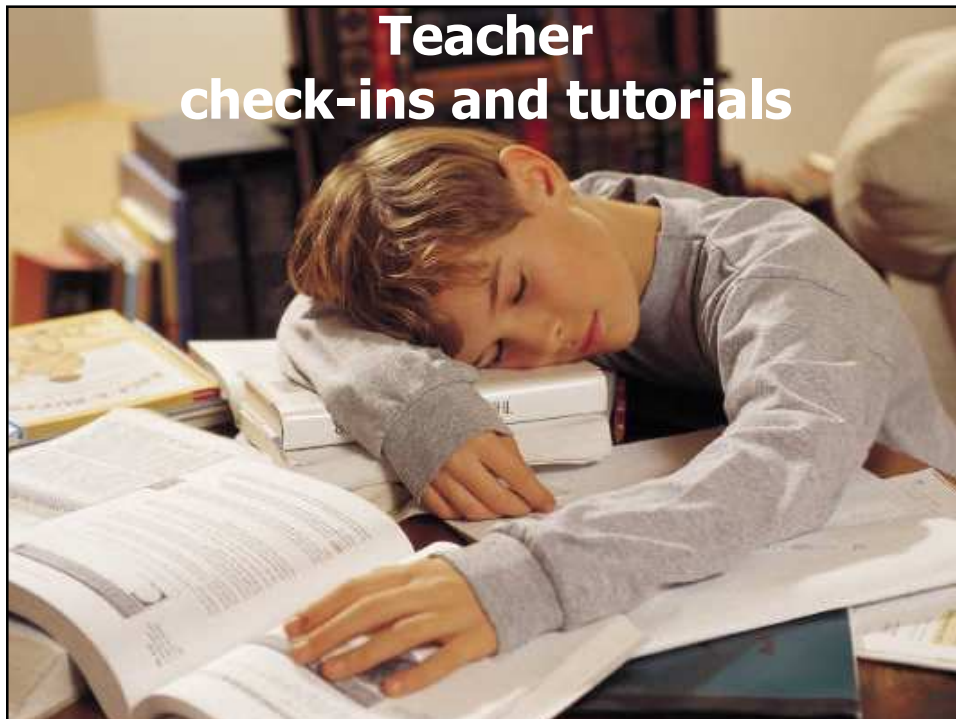
Teacher check-ins and tutorials

Blending Online
Is the Solution!

Proportion of content delivered online	Type of Course	Typical Description
0%	Traditional	Course with no online technology used - content is delivered in writing or orally.
1 to 29%	Web facilitated	Course which uses web-based technology to facilitate what is essentially a face-to-face course. Might use Blackboard or WebCT to post the syllabus and assignments, for example.
30 to 79%	Blended/Hybrid	Course that is a blend of the online and face-to-face course. Substantial proportion of the content is delivered online, typically uses online discussions, typically has some face-to-face meetings
80+%	Online	A course where the vast bulk of the content is delivered online. Typically has no face-to-face meetings.

Who is demanding fully online and blended learning?

Fully Online and Blended Learning Advantages

1. More time to reflect
2. Increased Learning (better papers, higher scores)
3. More effective pedagogy and interaction

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Fully Online and Blended Learning Advantages

4. **Convenient and flexible**
5. **Lower costs**
6. **Increased human interaction and communication**
7. **Introverts participate more**

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	Traditional F2F		Computer-mediated
Space	Live (physical/F2F)	Mixed Reality	Virtual (distributed)
Time	Live Synchronous (very short lag time)		Asynchronous (long lag time)
Fidelity	High (rich all senses)	Medium (e.g., audio only)	Low (text only)
Humanness	High Human / No Machine		No Human / High Machine
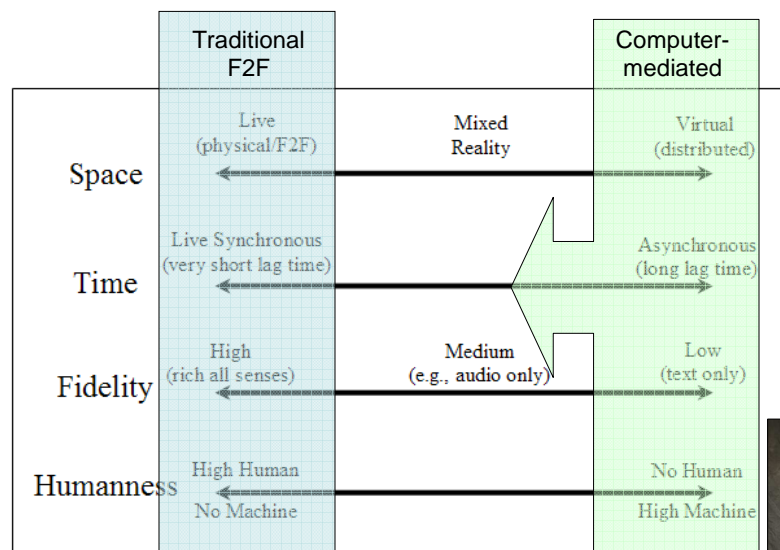
(Graham, 2006)

The Historical Emergence of Fully Online and Blended (Graham, 2006)
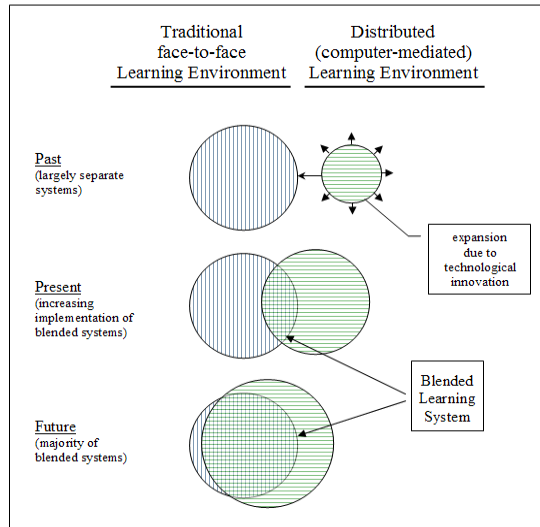
Part II: 10 Teaching Problems and 40 Blended Learning Solutions
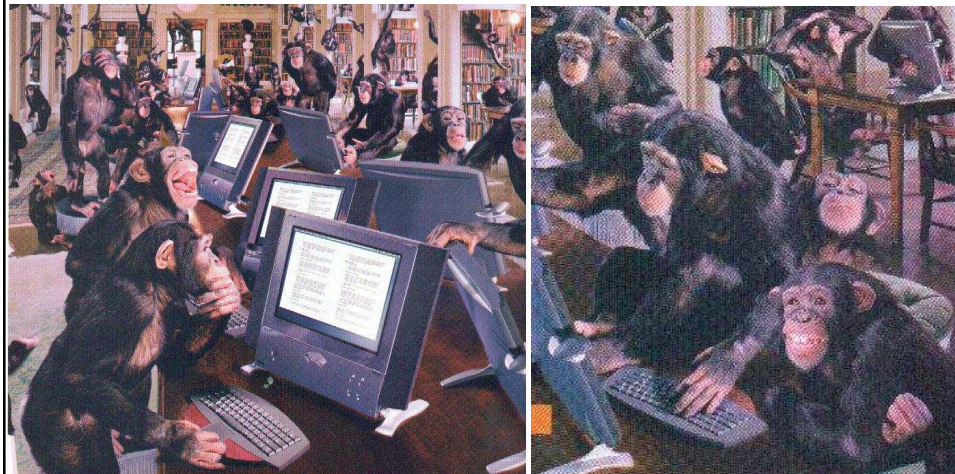
Problem Situation #1:
Many Students Are Missing

33

Blended Solution #1
Webinars
(Elluminate, Dimdim, WebEx, Adobe Connect Pro)

34

Blended Solution #2
Public TV

e.g.,Mongolia teachers addressing H1N1
(Otgo Okhidoi, Nov 10, 2009)

Blended Solution #3
Create Online Class Space for H1N1
(e.g., Microsoft Office Live, Google Sites)

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Microsoft Office Live

Blended Solution #4
Streaming Class Video for Remote Students
(e.g., Tegrity, Univ of Central Florida)

38
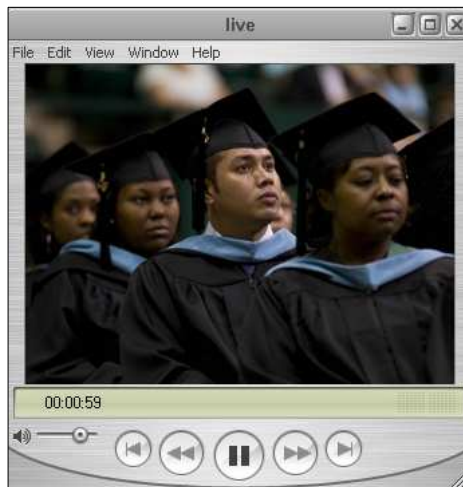
Problem Situation #2:
Typical Student Absenteeism

39

Blended Solution #5
Class Site (e.g., Google Sites)

Google sites

Thinking of creating a website?

Google Sites is a free and easy way to create and share webpages. Learn more.

Create
rich web pages easily
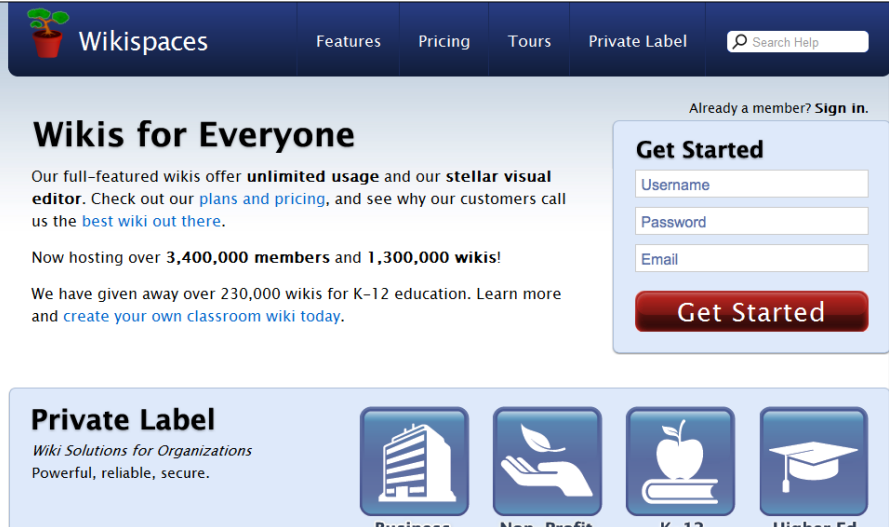
Collect
all your info in one place

Control
who can view and edit

New! Create a site from dozens of pre-built templates

Blended Solution #6
Wiki Collaboration Site
(e.g., Wikispaces)

Problem Situation #3:
Web Supplemental Activities

42

Blended Solution #7
Use Open Educational Resources
National Flu Readiness Initiative Taps Curriki for E-Learning,
Educ Week, Katie Ash on August 28, 2009
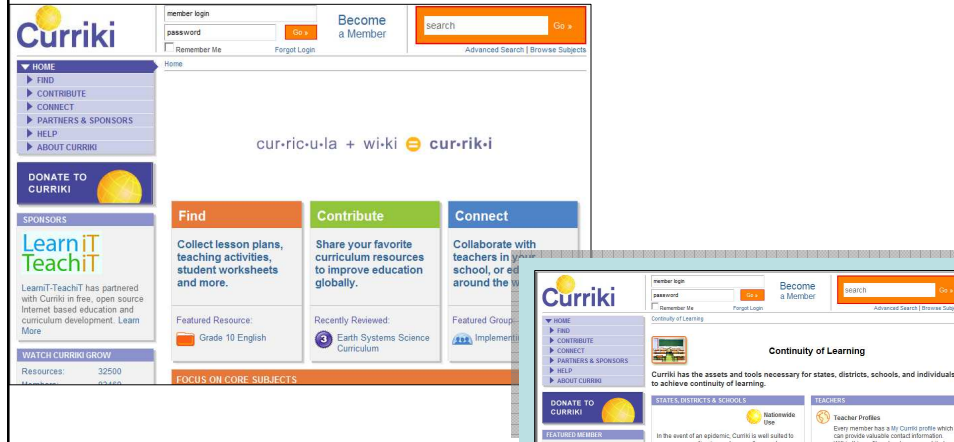
Companies help schools survive swine flu

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Blended Solution #8
Department of Education free lesson plans
http://www.free.ed.gov/
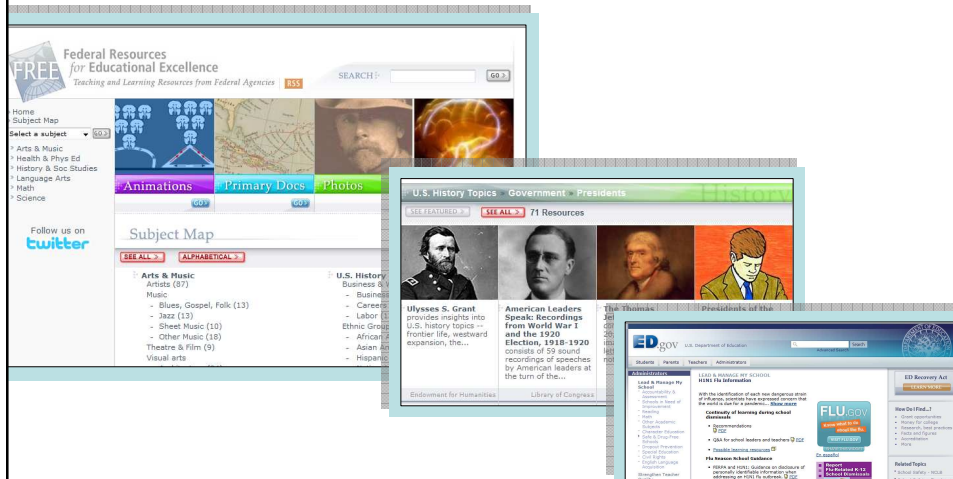
Blended Solution #9
Free Lessons from Smithsonian Education
http://www.smithsonianeducation.org/educators/
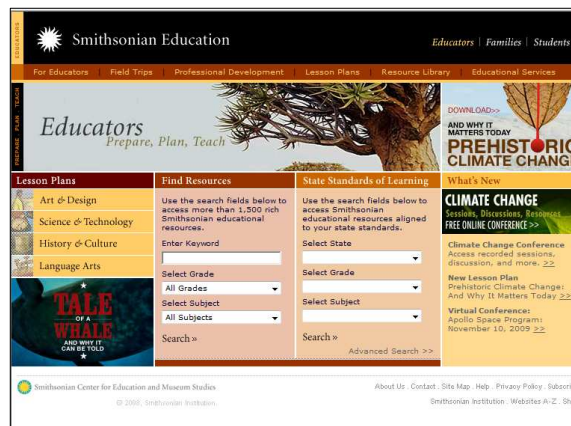
Blended Solution #10
Practice Skills (e.g., A Grain of Rice)

47

Blended Solution #11
Online Reading Programs
(See free-Reading.net)

48

Blended Solution #12
Online Referenceware

Blended Solution #13
Visual Resources
(e.g., Periodic Table of Visualization; Visual Thesaurus)

A PERIODIC TABLE OF VISUALIZATION METHODS

Blended Solution #14
Use Free Shared Online Videos Lessons
(How-to lessons from experts: 1,000's of instructional videos and articles; http://www.tvlesson.com/)

Blended Solution #15
Online Portal & Resource Explorations
(Encyclopedia of Life, history, science, poetry, literature, etc.)

Blended Solution #16
Science Portals
(e.g., Complete Works of Charles Darwin, Einstein, etc.)

Blended Solution #17. Species Portals
Ida (a transitional species); *47-Million-Year-Old Darwinius Masillae Fossil the Missing Link?* (wowOwow, May 20, 2009)

Blended Solution #18
Science Live
(Live Internet Thawing of Collosal Squid)

Blended Solution #19
Online English Literature
(e.g., The Carlyle Letters Exploring Victorian World Through Letters and The Diary of Samuel Pepys)
(Great Plague, Great Fire, Charles Dickens, Erasmus Darwin, Mary Wollstonecraft Shelley, Robert Browning, John Stuart Mill, Ralph Waldo Emerson, Elizabeth Barrett Browning, and Alfred Tennyson)
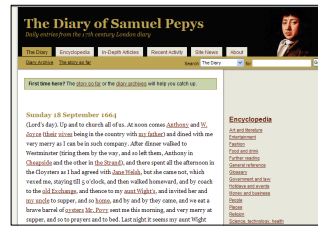
Problem Situation #3:
Collaborative Skill Deficit

Blended Solution #20
Paired Article Critiques in a Blog

Article	Student Critique	Student Peer Review
Arbaugh, J.B. (2007). *Does the Community of Inquiry Framework Predict Outcomes in Online MBA Courses?*	Stephen Moses	Larraine Ryan
	Carolyn Pawelko	Karen Leppard
	Lin Yu	Flora Liu
	Alex Brierley	Lori Atkinson
Meyer, K.A. (2003), Face-to-Face versus Threaded Discussions: The Role of Time and Higher-Order Thinking.	Larraine Ryan	Paul Anderson
	Harjit Dhanjal	Yvonne Toney
	Neera Arora	Carolyn Pawelko
	Karen Leppard	Lin Yu
	Fransica Wilkinson	Alex Brierley
Shea, P., Li, C.S. and Pickett, A. (2006). A study of teaching presence and student sense	Heather Burnett	Stefan Rasporich
	Daryl Wilson	Neera Arora

Problem Situation #4:
Student Reflections and Connections

59

Blended Solution #21
Student Blogging

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Problem Situation #5:
Learning Community

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Blended Solution #22
Online Community and World Teams in Ning, Google Groups, or Yahoo Groups

Problem Situation #6:
Need to Visualize Content
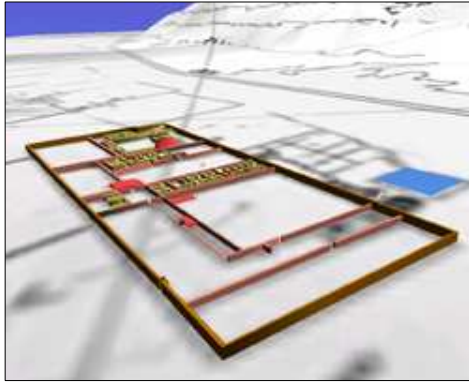
Blended Solution #23
Shared Online Video (WatchKnow, Monkeysee)

Blended Solution #24
Videos of the Periodic Table
(University of Nottingham)
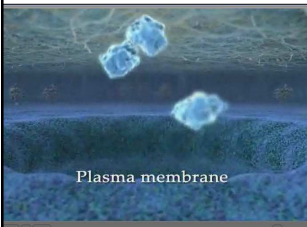
65
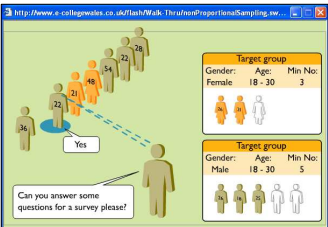
Blended Solution #25
Flash, 3-D Visualization, & Laboratory Software

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Blended Solution #26
Shared Online Videos for Anchoring or Ending Instruction

Blended Solution #27
Explore Online Human Body and Museum Exhibits

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Blended Solution #28
Adventure Learning
(e.g., Aaron Doering, Discovery Channel)

Blended Solution #29
Religious, Political, and Historical Video Portals
(e.g., YouTube and the Royal Channel)

Blended Solution #30
Individual Produced Videos
(e.g., African School Dream in Current TV)
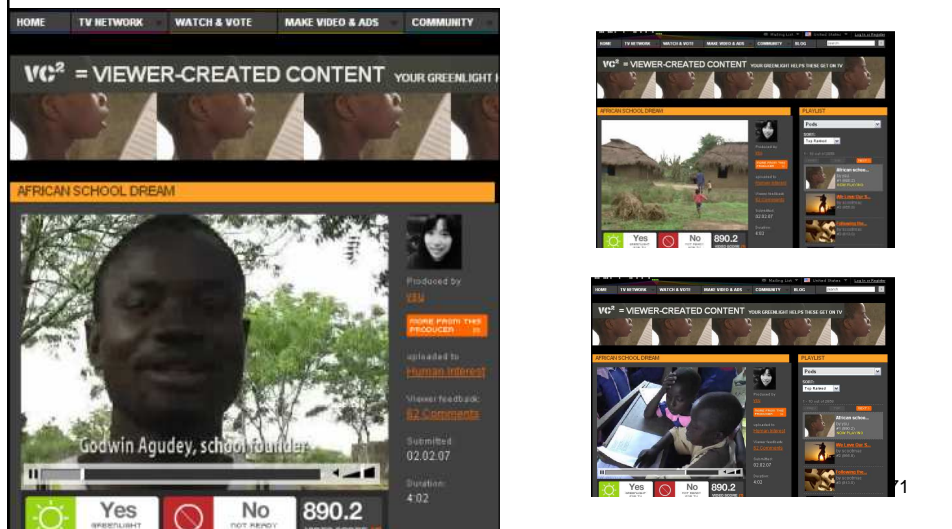
Blended Solution #31
Link TV & Fora TV

72

Did you realize all the freely shared online video resources you can use today that did not exist 5 or 10 years ago?

1. BBC News Video and Audio
2. CNN.com Video
3. Current TV
4. Fora TV
5. Google Video
6. Link TV
7. MIT World
8. MSNBC.com
9. NASA TV
10. TeacherTube
11. YouTube
12. YouTube Edu

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Problem Situation #7: Need for Hands-On Learning

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Blended Solution #32. Using Online Video (e.g., YouTube) to Memorize Sonnets and Poems
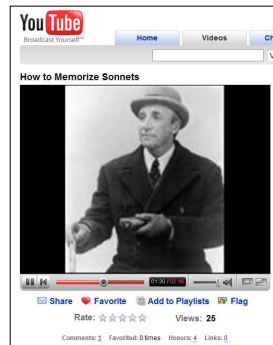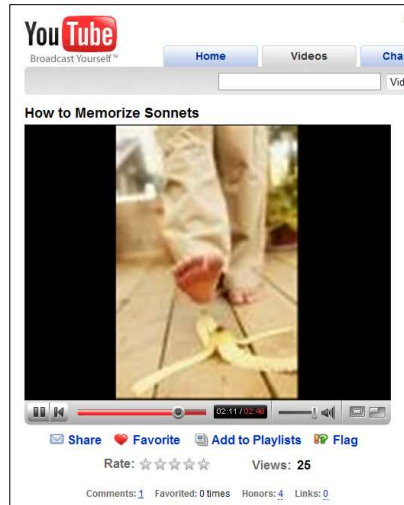
**Blended Solution 33.
Wikis in the Classroom**

Wiki tools from the Wikimedia Foundation

1. **Wikibooks**
2. **Wikicommons**
3. **Wikinews**
4. **Wikipedia**
5. **Wikiquote**
6. **Wikisource**
7. **Wikispecies**
8. **Wikiversity**
9. **Wiktionary**

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Blended Solution #34
Wikibook and Wikipedia Editing

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Blended Solution #35
Explore Virtual Worlds and Online Representations
(UCLAs CVRLab, University of Virginia)

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Problem Situation #8:
Preference for Auditory Learning

80

Blended Solution #36
Podcasts of Famous Literature
(e.g., Shakespeare)

Blended Solution #37
Online Language Learning: Practice
(ECpod, Mixxer, Livemocha, KanTalk,)

Blended Solution #38
Self-Paced Language Programs: Listen
(JapanesePod, SpanishPod, Arabic online)

Problem Situation #9:
Lack of Instructor Presence

Blended Solution #39
Tutorials with Screen Capture
(e.g., Jing, Screenr)

Blended Solution #40
Experts and Scientists
(e.g., Exploratorium-Sponsored Ice Stories Project from Antarctica)

Trends and Challenges for Blended Learning

1. **Teachers and students are more mobile.**
2. **Students more choices.**
3. **Student expectations rise.**
4. **Greater self-determined learning.**

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Trends and Challenges for Blended Learning

5. **More cross-school partnerships**
6. **Courses increasingly modular.**
7. **Less predefined schedules.**
8. **When teaching less clear; when learning less clear.**
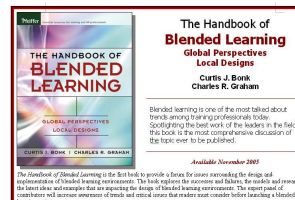

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How many ideas did you get from this talk?

1. 0 if I am lucky.
2. Just 1.
3. 2, yes, 2...just 2!
4. Do I hear 3? 3!!!!
5. 4-5.
6. 5-10.
7. More than 10.

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Questions and Comments

Note: Bonk papers and talks at:
http://www.publicationshare.com/
http://www.trainingshare.com/

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