A Web of Learning: Highlighting the Learning Opportunities for Today and Tomorrow

Curtis J. Bonk, Professor, Indiana University
President, SurveyShare
cjbonk@indiana.edu
http://php.indiana.edu/~cjbok

Where are you headed?

Do you have a compass?

Do you know the shape of the world?

Is the World Flat?

The Ten Forces that Flattened the World

Triple Convergence: (1) new economic players, (2) playing fields, and (3) processes.

1. 11/9/89: Berlin Wall came down
2. 8/9/95: Netscape went public
3. Work Flow Software (e.g., PayPal and eBay)
4. Open-Source (Self organs comark communities; Hostac, Apache, Wikipedia, Linux, Mozilla)
5. Outsourcing (Y2K)
6. Offshoring (e.g., China, Mexico, Thailand)
7. Supply-Chaining (e.g., Walmart)
8. In-sourcing (UPS fixing Toshiba laptops)
9. In-forming (e.g., Google, Yahoo, MSN Web Search)
10. The Steroids: Digital, Mobile, Personal, and Virtual (wireless, file sharing, VoIP, video camera in phone)
Is the World Curved?

Is it spiky?

Or is it Open?

Not open for everyone!

But many have “Grown Up Digital”!!!

What is the Web?

- An entertainment system?
- A writing aid?
- A communications system?
- A means to handle commercial transaction?
- A social networking device?

No, it is a learning tool!
The Web of Learning

The Explosion of the Web 2.0

We are entering a jumping off point...

Personalized Learning Environments (Stephen Downes and others)
We are entering an age of Digital Scholarship
(George Siemens, 2008)

As I said, in Education, "The World is Open!"

The World Is Open

Oregon Scientific Smartglobe 2008

UCLA Summer Digs Program
Dig in, archaeology fans! UCLA blogs to offer front-row seat at archaeology digs, Meg Sullivan, 6/25/2008
WE-ALL-LEARN: Ten Forces that Opened the Learning World
- Web Searching in the World of e-Books (e.g., Darwin)
- E-Learning and Blended Learning
- Availability of Open Source and Free Software (e.g., Moodle)
- Leveraged Resources and OpenCourseWare (e.g., MIT)
- Learning Object Repositories and Portals (e.g., shared content)
- Learner Participation in Open Info Communities (e.g., YouTube)
- Electronic Collaboration and Interaction (sync and async)
- Alternate Reality Learning (Online Massive Gaming, Simulations, and Virtual Worlds; e.g., Second Life)
- Real-Time Mobility and Portability (e.g., iPhone)
- Networks of Personalized Learning (Blogs, RSS)

Audience Participation!
1. WE
2. ALL
3. LEARN!!!
**Triple Learning Technology**
Convergence of “WE-ALL-LEARN”

1. **Pipes**: The availability of tools and infrastructure for learning.
2. **Pages**: The availability of free educational content and resources (OER—Open Educational Resources).
3. **Participatory Learning Culture**: A move towards a culture of open access to information, international collaboration, and global sharing.

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**Opener #1. Web Searching**
(e.g., Google, MSN, Yahoo!) in the World of e-Books (i.e., Darwin, Shakespeare, etc.)

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**Trend #1. Web Searching in the World of e-Books.**
What happens then?

**WE ALL LEARN!!!**

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**This Could Be the Year of e-Textbooks**
Many titles are available, but students are wary.

Jeffrey Young, September 7, 2009

Sign of the times: At the San Diego State U. bookstore, a poster exhorts students to "Buy This Textbook as an eTextbook."

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**E-books: 4 choices (Paperback, Kindle, iPhone, or iPod listening)**

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**Blio: Kurzweil Reinvents the Book**
Charlie Sorrel, Dec 29, 2009, Wired

- Blio is a free platform...run on any device.
- Blio is in color.
- Blio lays pages seen on paper, with typography and illustrations; uses video.
- More than a million library of titles.
- The end of the book?
Free Online Books
(Terry Anderson and Pathi Elouomi, eds. Theory and Practice of Online Learning, Canada: Athabasca University, 2004),
http://celc.athabasca.ca/online_books/ (55,000 downloads in first year)

Read, Listen, etc. to online books (e.g., "An International Episode" by Henry James)

Opener #2. E-Learning and Blended Learning

Trend #2. E-Learning and Blended Learning.
What happens then?

WE
ALL
LEARN!!!

Indiana University High School
(4,000 students and 1,400 enrolled in diploma programs)

Adora Svitak, age 11, World’s Youngest Teacher
A Grain of Rice: A Bloomington man’s computer vocab game feeding the world

Capella Tower
225 South Sixth Street, Minneapolis
Formerly, the “Halo”

iSMART: Integration of Science, Mathematics, and Reflective Teaching (iSMART) is a FREE 2-year online graduate program for middle school science and mathematics teachers in Texas, University of Houston
http://www.uh.edu/iSMART/ProgramOverview/MeetTheFaculty.html

Total and Online Enrollment in Postsecondary Institutions
Fall 2006 through Fall 2009

<table>
<thead>
<tr>
<th>Semester</th>
<th>Takers</th>
<th>Students Taking</th>
<th>Online Takers</th>
<th>Students</th>
<th>Online Takers</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fall 2006</td>
<td>60,377,195</td>
<td>52%</td>
<td>4,088,505</td>
<td>52%</td>
<td>11.7%</td>
</tr>
<tr>
<td>Fall 2007</td>
<td>59,042,803</td>
<td>51%</td>
<td>3,173,297</td>
<td>52%</td>
<td>11.7%</td>
</tr>
<tr>
<td>Fall 2008</td>
<td>57,322,665</td>
<td>51%</td>
<td>2,325,766</td>
<td>52%</td>
<td>11.8%</td>
</tr>
<tr>
<td>Fall 2009</td>
<td>55,404,750</td>
<td>51%</td>
<td>1,375,392</td>
<td>52%</td>
<td>11.9%</td>
</tr>
</tbody>
</table>

Open Teaching
(Tom Reeves Evaluation Course at Georgia; David Wiley’s Web 2.0 courses at BYU; Connectivism from George Siemens and Stephen Downes, 24 enrolled, 2,000+ sitting in)

Opener #3. Availability of Open Source and Free Software (e.g., Linux, Apache, Moodle, Sakai)

The Learning World is Open
Trend #3. Availability of Open Source and Free Software.
What happens then?

WE
ALL
LEARN!!!

Moodle (620,000 registered users in 204 countries speaking 78 languages, 2/10/2009)

Opener #4. Leveraged Resources and OpenCourseWare (OCW) (e.g., free courses from MIT, Utah State, CORE, OOPS)

Open Educational Resources (OER)
Post Courses in YouTube and iTunes (e.g., Berkeley)

OpenCourseWare (OCW)
Cate Kitten or Transformation?

Opensource Opencourseware Prototype System (OOPS) handed by the Foundation of Fantasy, Lucifer Chu, Chairman and Janitor of OOPS, Taipei)
Sample OpenCourseWare Projects (Tufts, Johns Hopkins)

Indian Institutes of Technology (IIT)

National Repository for Online Courses (NROC) Commons

Cape Town Open Education Declaration, Dec 2007

Peer2Peer University and University of the People (free!)

Opener #5. Online Learning Object Repositories and Portals (shared content)
Academic Earth
http://academicearth.org/

Thousands of video lectures from the world's top scholars.

Tracking Live Internet Thawing: A Colossal of an Idea

Ida (a transitional species)
47-Million-Year-Old Darwinius Masillae Fossil the Missing Link? (wowOwow, May 20, 2009)

The Complete Works of Charles Darwin

The Carlyle Letters Exploring Victorian World Through Letters and The Diary of Samuel Pepys
(Great Plague, Great Flee, Charles Dickens, Bronte, Chaucer, Mary Wollstonecraft Shelley, Robert Browning, John Stuart Mill, Ralph Waldo Emerson, Elizabeth Barrett Browning, and Alfred Tennyson)

The Royal Society 350th anniversary celebrations puts historic papers online (Captain Cook, Sir Isaac Newton and Benjamin Franklin), BBC, Nov 30, 2009
http://www.bbc.co.uk/history/anniversary/350th/index.shtml
Human Brain Dissected Today in a Live Webcast, Chronicle of Higher Education, December 03, 2006, 01:00 PM ET
https://chronicle.com/blogPost/Human-Brain-Dissected-Today-

Referatory: MERLOT.org
(78,472 members, 21,690 learning materials, January 3, 2010)

Connexions Growth
January 2009
>8,000 modules (3-5 pages)
>425 collections (books and courses)
multiple languages
engineering, computer science, nanotech, physics, statistics, math, history, music, bio-diversity, botany, bio-info, JP, BRTF, UNESCO, UN, Sigma Xi, ...
from authors worldwide
Usage October 2008
45 million hits
2m page views
1m unique users
from 200 countries

Opener #6. Learner Participation in Open Information Communities (e.g., Slashdot, Digg, Wikipedia, YouTube)

Wikis: Wikipedia and Wikibooks

Conference to Conference
(You Ustreamed my Ustream; Now that's a Twitter of an Idea)
Shared Online Video  
(e.g., YouTube and the Royal Channel)

Individual Produced Videos  
(e.g., African School Dream in Current TV)  
http://current.com/items/77146862_african_school_dream

TV Lesson  
(How-to lessons from experts:  
1,000's of instructional videos and articles;  
http://www.tvlesson.com/)

Link TV and Fora TV

dotSUB (subtitling video)

Participatory E-Books
Second Life
(business, law, education, English, medicine)

University of Texas:
50 Islands in Second Life, Nov 2009
http://archive.treet.tv/metanomics/campus-life

Opener #9. Real-Time
Mobility and Portability (e.g., iPhone, low cost wireless devices)

We Are Going Mobile!
40,000 new mobile subscribers a week in Rwanda; Rwanda Newtimes report, January 2009
Africa is the continent with the fastest growth, International Telecommunications Union (ITU), March 2009

India: In January, 2009, the number skyrocketed to 15.4M
Globally: 60,000 new mobile subscriptions every hour!!
(per Paul Kim, Stanford, 2009); Nokia Research Lab
http://www.phone.com/2009/01/06/more_and_more_subscriptions

Terabyte thumb Drives and Magic Pens!
(The Pulse from Livescribe, $129-$169)

TwitterPeek, WikiReader not worth the loot, USA Today, Edward Baig, November 5, 2009

TwitterPeek: Restricted to Twitter.
WikiReader: Updating can be a pain.
Mobile Learning in India with Paul Kim
http://www.stanford.edu/~phpkim/curt/India.pdf

One Laptop Per Child program collides with reality
GEOFFREY YORK, Toronto Globe and Mail, Oct 15, 2009
Bhutia, Khendum Gyabak (Univ. of Texas at El Paso)

Opener #10. Networks of Personalized Learning
(Blogs, Podcasts, MySpace, Flickr, and RSS)

September 30, 2009
the Samsung DualView TL225

Teaching With Twitter
Chronicle of HE, Jeffrey Young, November 22, 2009
Sangita Ghose, a professor of computer science and engineering at Purdue University, has welcomed Twitter into the lecture hall, even though the service lets students engage in back-channel discussions. The questions submitted via Twitter for the professor and guest speakers are projected for all the students to see.

Facebook: The New Classroom Commons?,
Chronicle of HE, Harriet L. Schwartz, Sept. 28, 2009

### Social Networks
- MySpace: 11.2 million
- Friendster: 11.2 million
- Ning: 1.1 million
- Orkut: 21.5 million
- Facebook: 21.5 million
- AIM: 21.5 million

### Growth of Social Networking Sites
[Graph showing growth of social networking sites]
Podcast Shows
(subscribe to ShakespeareCast.com)

Learning Towns are Popping up!

Livemocha
(29 languages, 160 hours of lessons, over 2 million users, FREE)

Predictions
1. Five Billion "Have-Hots" Have at It!
2. Emergence of Lifelong Super E-mentors/Coaches
3. Quarter-Century Learning Clubs
4. Taxonomy Learning Access Points
5. The Scandal of Learning
6. Personalization + Portfolios
7. The Selection of Global Learning Partners
8. The SharePoint Learning Era
9. Teaching-Learning Perpetuities
10. Teachers, Teachers
11. The Rise of the Super Blends
12. Self-Determined Humans
13. Free Learning Zones
14. Authentic Learning Amalgamations
15. Alexandrian Aristocrats

Slides at: TrainingShare.com
Papers: PublicationShare.com
Book: http://worldisopen.com/
The World is Open.
What happens then?

WE ALL
LEARN!!!