Our New Heroes are not Theoretical or Psychological

Technology of the 1980s

Things That Became Obsolete This Decade
December 11, 2009, Silicon Alley Insider

Gadgets that Changed Everything This Decade
December 9, 2009, Jay Yarow, Silicon Alley Insider

iBand Rocks Christmas Tunes on iPads and iPhones, Dec 10, 2010

June 9, 2010

TwitterPeek: Restricted to Twitter.

WikiReader: Updating can be a pain.
Mark Zuckerberg, Time Meg Person of the Year, Dec 15, 2010

Social Networking Gaming (e.g., Farmville)
For social networks, it's game on, USA Today, Jon Swartz

Skype for iPhone adds two-way video calling
CNET Reviews, December 20, 2010
http://reviews.cnet.com/8301-15512_7-20026805-253.html

The year we stopped talking
Sharon Jayson, USA Today, Dec 30, 2010

Week after holidays, e-book sales outdo print, USA Today, January 5, 2011, Bob Minzesheimer and Carol Memmott

As the Web Goes Mobile, Colleges Fail to Keep Up,
http://chronicle.com/article/Colleges-Search-for-Their/124046/

"I used it to sign up for classes. I used it to check e-mails," says Laura Patterson, a junior at Nevada State College, about her iPhone. "I used it all the time, for everything." More than 40 percent of all college students, like Nevada State's Laura Patterson, used mobile devices to get on the Internet every day last year, compared with 10 percent in 2006.
Study: Online learning might be less effective for some, eSchool News, Dennis Carter, September 15, 2010

Classroom students scored 84.5 percent on the first exam in the economics course, and online students scored 83.3 percent.

Faculty Views About Online Learning

May 24, 2010
Author Nicholas Carr, The Web Shatters Focus, Rewires Brains, Wired
http://www.wired.com/magazine/2010/05/w Nicholas Carr

Clay Shirky, NYU: How cognitive surplus will change the world, TED, June 2010
http://www.ted.com/talks/clay_shirky_how_cognitive_surplus_will_change_the_world.html

Marissa Mayer talks the company's product management efforts on search products - web search, images, news, groups, products, maps, google (beta), Google Toolbar, Google Trends, Google Earth, Google Maps and more. She joined Google in 2005 as Google's first female engineer and led the user interface team. Mayer oversaw the ability to serve more than 150 languages, deliver Google Maps, Earth, and Google, and integrate them with 200 partners and products on websites.
Brewster Kahle, and Aaron Swartz, Open Library the Internet Archive

Mobile Learning
April 10, 2010: Seton Hill University, 2,100 students an iPad and freshmen a 13-inch MacBook laptop.

July 23, 2010
India unveils $35 computer for students, CNN World, Harmeet Shah Singh

Online Education vs. Traditional Learning: Time to End the Family Feud, Mark David Milliron, Chronicle of HE, Oct 31, 2010

August 9, 2010, Bill Gates Predicts Technology Will Make 'Place-Based' Colleges Less Important in 5 Years, By Jeff Young, Chronicle of HE
Salmon Khan (Khan Academy) (videos on math, bio, trig, chemistry, money and banking, economics, statistics, etc.; [https://www.khanacademy.org/](https://www.khanacademy.org/))

Which of these video sharing sites do you use?
1. BBC News Video and Audio
2. CNN.com Video
3. HSNBC.com
4. Google Video, Yahoo Video
5. Current TV
6. Fox TV
7. NET World
8. YouTube, YouTube Edu
9. TeacherTube
10. Link TV, Explore, Global Pulse, Latin Pulse
11. Howcast, Blip Think, WonderHowTo, Explo.TV, NASA TV, ClipChef, TV Lesson, BookTV, Edutopia videos, MonkeySee, doPpick, the Research Channel, VideoSong

Academic Earth
Free online video courses from leading universities.

Link TV: Global Link of World Educators (GLOWE)

Question:
What is the Web?
- An entertainment system?
- A writing aid?
- A communications system?
- A means to handle commercial transaction?
- A social networking device?

Answer:
The Web of Learning

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

Today we have the Web 2.0

We are entering a jumping off point...

Life in the Cloud...

Where are you headed?

Do you know the shape of the world?
WE-ALL-LEARN:
Ten Forces that Opened the Learning World
- Web Searching in the World of e-Books (i.e., 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 (i.e., shared content)
- Learner Participation in Open Info Communities (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)

"Video Primers in an Online Repository for e-Teaching and Learning" V-PORTAL, TravelinEdMan (27 free/open YouTube videos), September 2010
http://www.youtube.com/user/TravelinEdMan

Audience Participation!
1. WE
2. ALL
3. LEARN!!!

Triple Learning Technology Convergence of "WE-ALL-LEARN"
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.

The R2D2 Method
1. Read (Auditory and Verbal Learners)
2. Reflect (Reflective Learners)
3. Display (Visual Learners)
4. Do (Tactile, Kinesthetic, Exploratory Learners)
1. Auditory or Verbal Learners
- Auditory and verbal learners prefer words, spoken or written explanations.

Read 1. Wikibook or Wikipedia Editing or Critiques
- Ask students to critique a wikibook or page from Wikipedia

Reflect 2. Analyze Online Cases (problems, solutions, etc.)

Display 3. Concept Mapping and Timeline Tools (VUE, Bubbl.us, Cmap, Freemind, Gliffy, Mindmeister, or Mindomo)

Do 4. Create Blogs (e.g., Dr. Kim Foreman, San Fran State University, Come and See Africa Blog: http://comeandseeafrica.blogspot.com/)

We are not motivating students with the technologies that they love!
Ok, Million Dollar Question: How do you motivate online learners? What Words come to mind?

Magic #1: TEC-VARIETY Model for Online Motivation and Retention
1. Tone/Climate: Psych Safety, Comfort, Belonging
2. Encouragement, Feedback: Responsive, Supports
3. Curiosity: Fun, Fantasy, Control
4. Variety: Novelty, Intrigue, Unknowns
5. Autonomy: Choice: Flexibility, Opportunities
6. Relevance: Meaningful, Authentic, Interesting
7. Interactive: Collaborative, Team-Based, Community
8. Engagement: Effort, Involvement, Excitement
9. Tension: Challenge, Dissonance, Controversy
10. Yields Products: Goal Driven, Products, Success, Ownership

1. Tone/Climate: A Video Course Intros
   (examples from Northern Virginia Community College and Indiana University KD (online MBA) program)
   Yau Yen Chew, Open U Malaysia, Making Art Lessons Come Alive with Web 2.0
   http://www.youtube.com/watch?v=809q0x0169a

2. Encouragement, Feedback, etc.: A. Online Self-Testing (e.g., self-study in accounting, vocabulary, anatomy, chemistry, dissection, etc.)

6. Relevance, Meaningfulness:
   A. Tour an Online Oil Drilling Site or Role Play Situations (i.e., BP)

TEC-VARIETY Model for Online Motivation and Retention
   Tone/Climate
   Encouragement, Feedback
   Curiosity
   Variety
   Autonomy
   Relevance
   Interactive
   Engagement
   Tension
   Yields Products
Tinkering

Tinker #1. Reading from Open Access Journals (e.g., PLOS)

Tinker #2. Webcast Lectures (Tegrity, Echo360, MediaSite, etc.)

Tinker #3. Timeline Tools (e.g., SIMILE from MIT (http://simile.mit.edu/), Learning Tools from UBC)

Arlington Racetrack

Jockey's are Important
Tinker #4. Online Literature Search (Class Google Jockeys) (links to text, soundtracks, video clips, etc.)

Tinker #5. Video Animations and Self-Testings

Tinker #6. Pubcasts. (videos of authors of scientific papers and science; e.g., SciVee)

Tinker #7. Collaborative Groups (Google Docs, Ning, Google Groups, MSN Groups, Yahoo Groups)

Tinker #8. Track Life of a Scientist or Famous People (e.g., Brian J Ford, independent scientist)

Tinker #9. Online Portals of Rich Data United Nations Opens World Digital Library. Turning the Pages from the British Library, etc. (history, culture, literature, writing, art, etc.)
**Tinker #10. Online Experiments**
(e.g., psychology)

**Tinker #11. Open Ed Resources & OpenCourseWare**
(e.g., MIT OpenCourseWare)

**Tinker #12. Educational Simulations**

**Tinker #13. Online Role Play**
(e.g., Tulane University, Exercise for Renewable Energy, Freeman Sch. of Business, roles include power traders and utility dispatchers, etc.)

**Tinker #14. Podcast Reflections**

**Tinker #15. Expert and Domain Specific Blog Reflections**
(English, Health, Business, etc. blogs)
Tottering

Terminating Textbooks

Yonsei University Library, Seoul, Korea

Totter #1. Digital Textbooks
(What South Korean Schoolchildren Can Teach Colleges About E-Textbooks; Jeff Young, Chronicle of HE. Korea E-Learning Week, Coex, Seoul, Sept. 16-17, 2010.)

Totter #2. Bridges to World of Expert and Practitioners (e.g., Watch or Listen to Online Conferences, Expert blogs, chats, interviews)

Totter #3. Famous Expert Via TED (shared online video), Fast Company, Anya Kamenetz, September 1, 2010

August 5, 2010
Remaking the College Campus,
Bridget McCrea, Campus Technology
https://campustechnology.com/articles/renewal-of-college-campus-design/
Totter #4. Real World Problems (PBL online): Real-time Cases

Supercharging the case method, making it more realistic and engaging.

Totter #5. Class Synchronous Sessions and Archives (Breeze/Adobe Connect Pro, Elluminate, WebEx, Dim Dim)

Totter #6. Global Class Videoconferencing

On Wisconsin, Fall 2010

Dissolving Borders
Can we use distance as a tool to explore the dairy industries in Wisconsin and Mexico?

Totter #7. Synchronous and Asynchronous Events (e.g., Breeze + Video + Online Forum + Online Papers)

Totter #8. Online Language Learning and Conversations (e.g., PalTalk, ITalki, Palabre, Babbel)
Totter #9. Course Announcements
(e.g., Teaching with Twitter; Course announcements and following people (e.g., microblogging))

Totter #10. Wikibooks, Wikipedia editing, wiki syllabi, wiki glossaries
(Ron Owston, York University, Toronto)

Totter #11. Student YouTube Products
http://www.youtube.com/watch?v=sk8St9yh930
http://www.youtube.com/watch?v=n3FJy48n_P
http://www.youtube.com/watch?v=رق5wpaSa2P0

Totter #12. Podcast Productions and Virtual Performances for students of pronunciation class (e.g., Tzu-Su Chen, Taiwan)

Totter #13. Video Blogging

Totter #14. YouTube as Class
Totter #15. Learn Anytime, Always On/Mobile.  Will Technology Kill the Academic Calendar?  Online, seminars give way to students who set their own schedules. Marc Perry, Chronicle of HE, October 10, 2010

Robert Johnson, who championed the open format Learn Anytime program at a two-year college in Louisville, Ky. (above) checks students’ e-mail while waiting for a flight. “Everything I need to do today, I can do on my phone,” says Robert Johnson, who led the self-paced Learn Anytime program at Jefferson Community & Technical College, in Louisville, Ky. He often grades papers and communicates with students from a café near his home.

Totally Extreme #1. Free Online Degrees

SMART: Integration of Science, Mathematics, and Reflective Teaching (iSMART), University of Houston

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Totally Extreme #2. Live Science (e.g., Human brain dissections, colossal squids discovered and investigated)

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Totally Extreme #3. Immediate Science

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

Totally Extreme #4. Live Expeditions

(Oceanographer tours deep sea web surfing; Nautilus Live allows people to watch expeditions live & listen to scientists in control rooms as discoveries made, eSchool News, June 2010, Deep-sea images reveal colorful life on ocean’s floor, Sept. 2010)
**Totally Extreme #5. Adventure Learning, GeoThentic, GoNorth (National Geographic)** (Aaron Doering, Univ of Minnesota)

**Earthducation, Aaron Doering and Charlie Miller, The University of Minnesota**
http://lt.umn.edu/earthducation1/

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**Explorer Blogging and Interaction, e.g., Cassandra Brooks, Ice Stories**

**THE LAST OCEAN, The Last Ocean Project**
http://www.lastocean.com/ and
http://lastocean-project.org/
Cassandra Brooks

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**Adventure Learning (cars and bikes) Dan Grec and Mark Beaumont**

**Totally Extreme #6. Armchair Archaeology UCLA Summer Digs Program**
Totally Extreme #7. Google Earth Archeology (David Thomas, Archeologist, La Trobe University, Australia)

Totally Extreme #8. Teen Solo Sailing. May 2010, Jessica Watson became the youngest person ever to sail solo, non-stop and unassisted around the world.

Abby Sunderland's blog


South African teens get virtual mentoring from all over the world, By Danielle Berger, CNN January 14, 2011 3:44 p.m. EST

Totally Extreme #10. On-Demand Multi-Participant Synchronous Conferencing

Totally Extreme #11. Robot Teachers Another Benefit of Robot Teachers: No 'Morale Problems', Chronicle of Higher Ed, elf Young, Sept 15, 2010

Totally Extreme #12. International and Global Education and Competitions (e.g., Global Game Jam, online role play, Global Videoconferencing)

Totally Extreme #13. Pocket School and Videoconferencing in Developing World
(Paul Kim, Stanford, Rwanda, August 2010, Kigali Institute of Education linking up with universities in India and Cameroon through Satellite Internet video conferencing system. They were discussing Java programming.)

Totally Extreme #14. Second Life (business, law, education, English, medicine)

Totally Extreme #15. Telepresence and Teleportec Systems (e.g., Cisco and HP)

Final Poll: How many ideas did you get?
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.

Any Extreme Questions and Comments?