Blended Learning A to Z:
Myths, Models, and Moments of Magic

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What I will discuss...

1. Definitions of blended learning
2. Myths of blended learning
3. Models of blended learning
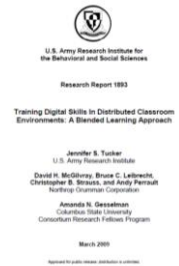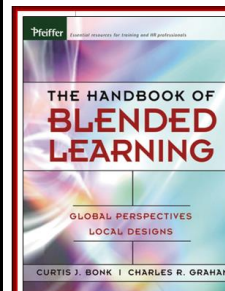4. Examples of blended learning

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Myth #1: If you read the enough research you will be able to know the impact of blended learning.

1. Improved Pedagogy
   - More interactive instead of transmissive
   - Authentic, real world, etc.
2. Increased Access/Flexibility
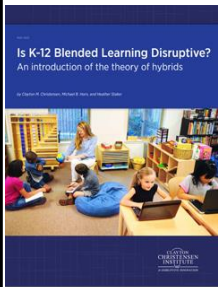3. Increased Cost Effectiveness

Does Your Blended Learning Recipe Work Better on Paper?

Recent Reports on Blended
The Handbook of Blended Learning:
Global Perspectives, Local Designs (Bonk & Graham)
http://www.dtic.mil/cgi-bin/GetTRDoc?Location=U2&doc=GetTRDoc.pdf&AD=ADA495731
http://www.dtic.mil/cgi-bin/GetTRDoc?AD=ADA495731

Is K-12 Blended Learning Disruptive
Heather Staker and Michael B. Horn,
Innosight Institute, May 2013
http://www.projectred.org/uploads/The-Rise-of-K-12-Blended-Learning.pdf

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August 12, 2013
Blended Learning Improves Test Scores, Information Week
http://www.youtube.com/watch?v=D3PasjxHNjw
http://www.carnegielearning.com/
http://carnegielearning.iebox.net/algebra-effectiveness/study/

Ten Strategies to Improve Blended Course Design
Faculty Focus, July 26, 2013, Ike Shibley
http://www.facultyfocus.com/white-papers/ten-strategies-to-improve-blended-course-design/?campaign=FF1307266&utm_source=cheetah&utm_medium=email&utm_campaign=2013.07.26%20-%20Faculty%20Focus%20Alert

ADDIE: The Classic [early 1970's]
ADDIE: *Analysis, Design, Development, Implementation,* and *Evaluation*
Online Learning Insights, May 28, 2013
http://onlinelearninginsights.wordpress.com/2013/05/28/start-here-instructional-design-models-for-online-courses/?mkt_tok=3RkMMJWWfF9wsRoiuajMZKXonjHpfsX66uUqWq%2BxiM1%2F0ER3fOvrPUfGjI4ET8pnI%2BSLDwEYGJlv6SgFQ7LMMbRm0LgMWBU%3D

Blended Learning Defined and Explained

Myths #2: Blended learning is easy to define.
Myth #3: Blended learning is hard to define.
Blending Online and F2F Instruction

"Blended learning refers to events that combine aspects of online and face-to-face instruction" (Rooney, 2003, p. 26; Ward & LaBranche, 2003, p. 22)

Classifying K-12 Blended Learning
Heather Staker and Michael B. Horn, May 2012
http://www.projectred.org/uploads/The-Rise-of-K-12-Blended-Learning.pdf

"Blended learning is any time a student learns at least in part at a supervised brick-and-mortar location away from home *and at least in* part through online delivery with some element of student control over time, place, path, and/or pace."

Classifying K-12 Blended Learning
Heather Staker and Michael B. Horn, May 2012
http://www.projectred.org/uploads/The-Rise-of-K-12-Blended-Learning.pdf

One critical part of the definition of blended learning is that it involves "some element of student control of time, place, path, and/or pace." Digital Learning Now! describes each dimension:
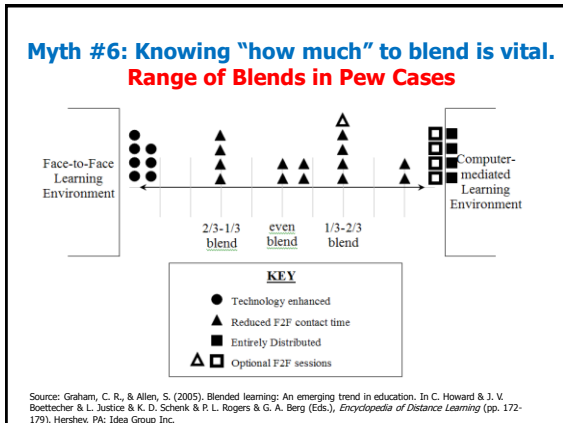
- **Time:** Learning is no longer restricted to the school day or the school year.
- **Place:** Learning is no longer restricted to the walls of the classroom.
- **Path:** Learning is no longer restricted to the pedagogy used by the teacher. Interactive and adaptive software allows students to learn [in a method that is customized to their needs].
- **Pace:** Learning is no longer restricted to the pace of an entire classroom of students.

Source: "Roadmap for Reform,"
http://digitallearningnow.com/wp-content/uploads/2011/10/Roadmap-for-Reform-.pdf

Slide 1

Historical Emergence of Blended
(Graham, 2006)

Slide 2
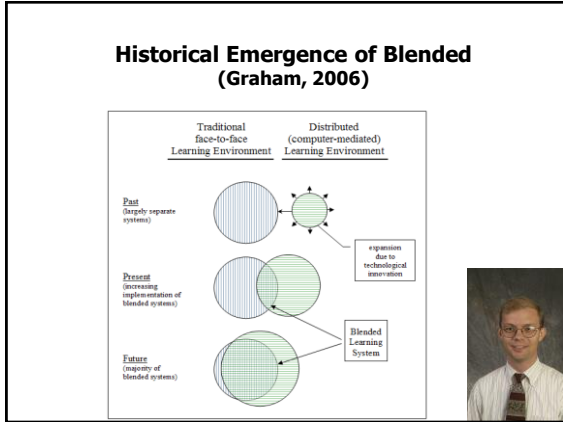
Myth #4: People will know what I am saying when I say "blended learning."
Myth #5: Blended is the same as "hybrid."
The Sloan Consortium

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.

Slide 3

Myth #6: Knowing "how much" to blend is vital.
Range of Blends in Pew Cases

Source: Graham, C. R., & Allen, S. (2005). Blended learning: An emerging trend in education. In C. Howard & J. V. Boettcher & L. Justice & K. D. Schenk & P. L. Rogers & G. A. Berg (Eds.), *Encyclopedia of Distance Learning* (pp. 172-179). Hershey, PA: Idea Group Inc.

Slide 4

Myth #7: Blended learning works everywhere.
Where is Blended Beneficial?

- **Intro Classes (Spanish, psych, algebra, biology)**
- **AP Classes**
- **Classes with low success rates**
- **Classes with students working part-time**
- **Required classes**
- **Students are rural or spread over a distance**
- **Classes with certification or standardization**
- **Classes with new requirements or standards**
- **Writing intensive classes, theory classes, etc.**
- **Lab classes?**

Slide 5

Examples of Blended Learning

- **Put assessments/reviews online**
- **Online discussions**
- **Online labs**
- **Put reference materials on Web**
- **Deliver pre-work online**
- **Provide office hours online**
- **Use mentoring/coaching tool**
- **Access experts live online**

Slide 6

Myth #8: People learn more in face-to-face settings than blended or fully online ones.
Fully Online and Blended Learning Advantages

1. **Increased Learning (better papers, higher scores)**
2. **More effective pedagogy and interaction**
3. **Course access at one's convenience and flexible completion (e.g., multiple ways to meet course objectives)**
4. **Reduction in physical class or space needs, commuting, parking, etc.**
5. **Increased opportunities for human interaction, communication, & contact among students**
6. **Introverts participate more**

Myth #9: Instructors can have a logical discussion with administrators about blended learning.

Models of Blending

Blending occurs at the following four levels:

Activity Level

Course Level

Instructor stakeholders

Dept/Program Level

District/Institutional Level

Administrator stakeholders

Myth #10: There is a best model of blended.
AMA Special Report, Effectively Implementing a Blended Learning Approach
(Steven Shaw & Nicholas Igneri, 2006)

Source: American Management Association, AMA at Work

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10 Blended Learning Models

Classifying K-12 Blended Learning
Heather Staker and Michael B. Horn, May 2012
http://www.innosightinstitute.org/innosight/wp-content/uploads/2012/05/Classifying-K-12-blended-learning2.pdf

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Blended Model #1.
Face-to-Face Primary
(online is for remediation of supplement)

Blended Model #2. Rotation
(students alternate FTF and Online instruction)

Blended Model #3. Flex
**(curriculum primarily online with instructors available FTF)**

Blended Model #4. Online Lab
(lab or field experience component of course is online)
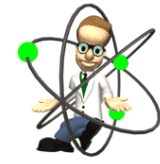
Blended Model #5. Self-Blend
(students decide on which courses they take online or which portion of the course is online)
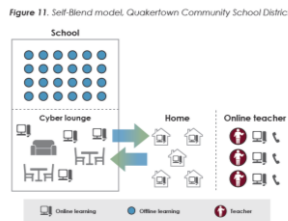
Blended Model #6. Online Driver
(now: "Enriched Virtual Model")
(courses primarily online and physical facilities used to supplement or as needed)
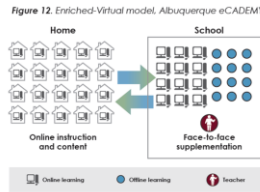
Blended Model #7. Bookend
(first and last part of the course is online and middle portion is FTF; AMA Special Report, Blended Learning Opportunities, Alison Rossett (2006))

Blended Model #8. Anchor
(start with FTF or what students are familiar with and then move to online)

Blended Model #9. Field
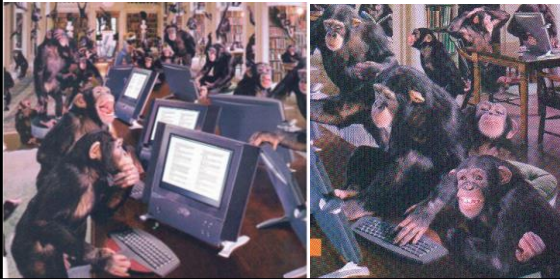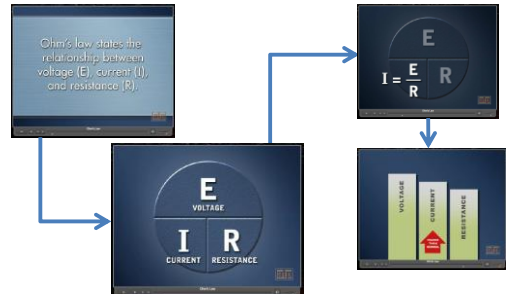## (combine FTF and online as needed...mix and match)

Blended Model #10. Degrees of Humanness
(rely on computer-based feedback and interaction at first and switch to human feedback later on)
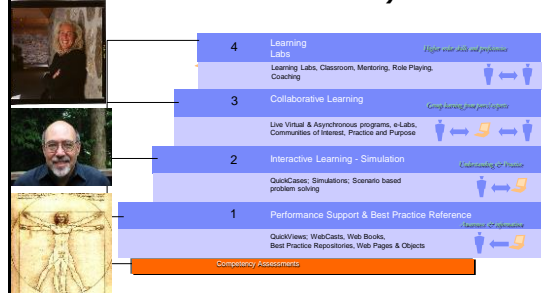
## Part II:
Some Blended Learning Solutions

Blended Solution #1.
Short Video Animations and Reflections
## (e.g., Ohm's Law)

Blended Solution #2.
Online Role Play or Debate
(Tulane University, Exercise for Renewable Energy, Freeman Sch. of Business, roles include power traders, electric utility analyst, independent power producers & utility dispatchers)

Blended Solution #3.
Anchor Course Concepts and Activities in Brief Shared Online Videos
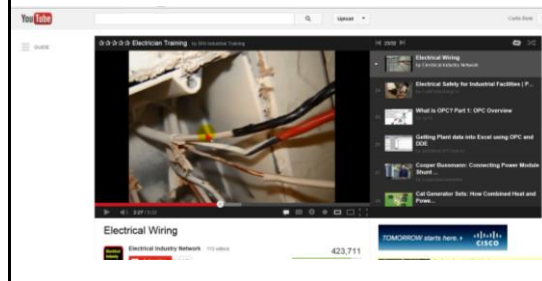
Blended Solution #4.
Online Practice Tests and Quizzes
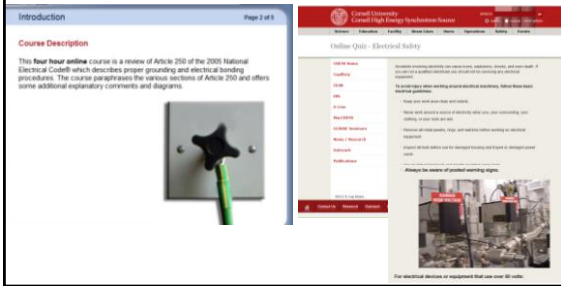
Blended Solution #5.
Just in Time or On-Demand Learning

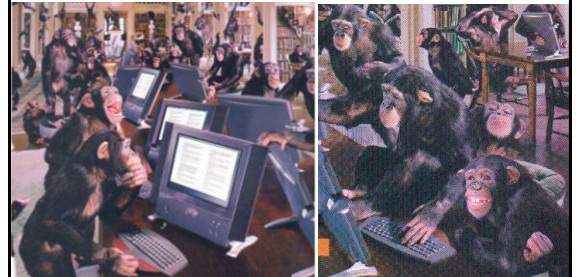Army Learning Concept 2015

Again, this talk covered...

1. 1 Definition of blended learning
2. 10 Myths of blended learning
3. 10 Models of blended learning
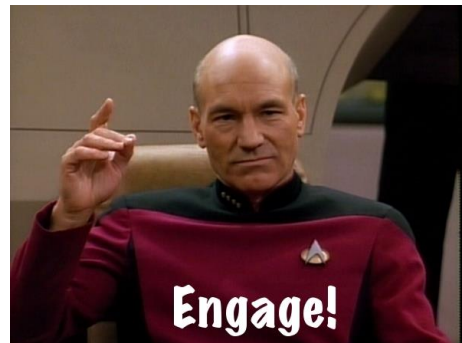4. 5 Examples of blended learning

Part II:
Wait, we are not done yet!

What did Jean-Luc Picard say?

That's right, Engage!

How can technology address diverse learner needs?

Framework #1: The R2D2 Model
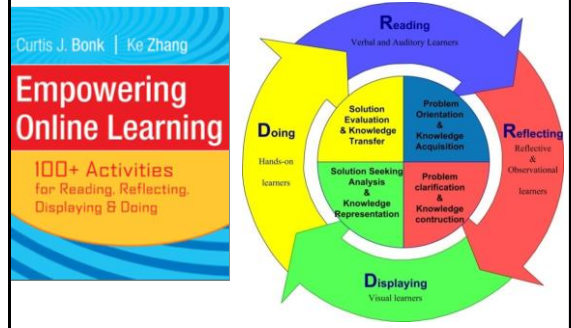
The R2D2 Method

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 1a. Collect and Listen to Interactive Stories
(e.g., Meograph: http://www.meograph.com/)

Read 1b. Follow on Twitter
https://twitter.com/USArmy
https://twitter.com/electricians

2. Reflective and Observational Learners

- **Reflective and observational learners prefer to reflect, observe, view, and watch learning; they make careful judgments and view things from different perspectives**

Reflect 2a. Big Issue Reflections
(Big Questions Online (BQO)), January 8, 2013
(e.g., Do We Have Souls?)
https://www.bigquestionsonline.com/content/do-we-have-souls

Reflect 2b.
Reflect on Virtual Timelines
(Dipity, xtimeline, Simile, etc.)
http://www.usatoday.com/tech/news/story/2011-09-22/steve-jobs-dies/50672498/1
http://www.usatoday.com/news/destinations/story/2011-08-25/Martin-Luther-King-Jr-Memorial-in-Washington-A-closer-look/50136470/1?csp=34news
http://www.usatoday.com/story/life/movies/2013/04/10/harrison-ford-jackie-robinson/2001783/

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3. Visual Learners

- **Visual learners prefer diagrams, flowcharts, timelines, pictures, films, and demonstrations.**

Display 3a. Virtualize Words Used
(e.g., Wordle, Tagzedo, Tagul, WordSift, Word It Out)
http://shellyterrell.com/2010/02/14/12-word-cloud-resources-tips-tools/
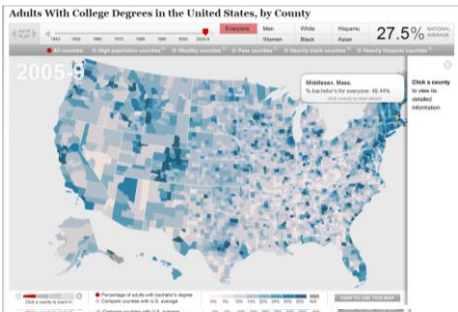

Figure 4. PLENK2010 Wordle.

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

Display 3c. Interactive Map Timelines
(adults with college degrees by county, May 7, 2012)

http://todayscampus.com/article/Keith_Hampson_interviews_Josh_Keller_on__Interactive_Graphics_for_Higher_Education

4. Tactile/Kinesthetic Learners

- **Tactile/kinesthetic senses can be engaged in the learning process are role play, dramatization, cooperative games, simulations, creative movement and dance, multi-sensory activities, manipulatives and hands-on projects.**
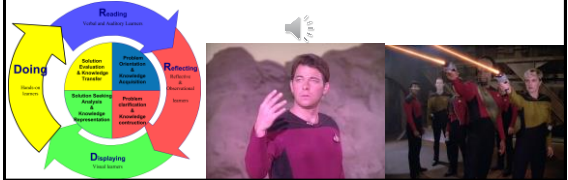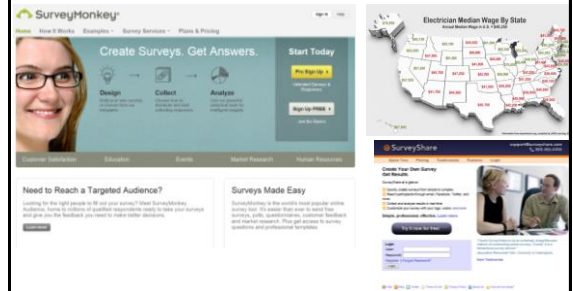

Do 4a. Student Class Documentaries
Umida's R546 Documentary Project
http://www.youtube.com/watch?v=EMLTzqCV_5A
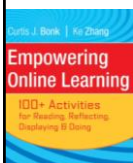

Do 4b.
Survey Research and Market Analysis
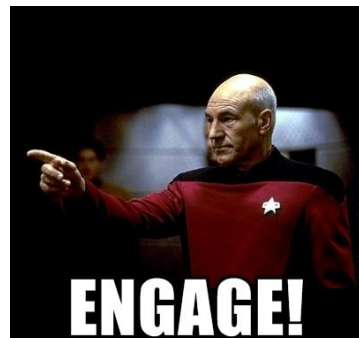**(e.g., SurveyShare, Zoomerang, SurveyMonkey)**

Poll #3: What phase of the R2D2 Method did you get the most ideas from ?

A. **Read (Auditory and Verbal Learners)**
B. **Reflect (Reflective Learners)**
C. **Display (Visual Learners)**
D. **Do (Tactile, Kinesthetic, Exploratory Learners)**

Where to next?

ENGAGE!

Sleepy U?

February 24, 2013
Big (MOOC) Data, Inside Higher Education, Dayna Catropa
http://www.insidehighered.com/blogs/stratedgy/big-mooc-data

Intrinsic Motivation

"…**innate propensity to engage one's interests and exercise one's capabilities, and, in doing so, to seek out and master optimal challenges**

(i.e., it emerges from needs, inner strivings, and personal curiosity for growth)

See: Deci, E. L., & Ryan, R. M. (1985). *Intrinsic motivation and self-determination in human behavior.* NY: Plenum Press.

Motivation Research Highlights
(Jere Brophy, Michigan State University)

1. **Supportive**, appropriate **challenge**, **meaningful**, moderation/optimal.
2. Teach **goal** setting and self-reinforcement.
3. Offer **rewards** for good/improved performance.
4. Novelty, **variety**, **choice**, adaptable to interests.
5. Game-like, **fun**, fantasy, curiosity, suspense, active.
6. Higher levels, divergence, dissonance, **peer interaction**.
7. Allow to create finished **products**.
8. Provide immediate **feedback**, advance organizers.
9. Show intensity, **enthusiasm**, interest, minimize anxiety.
10. Make content **personal**, concrete, familiar.

Ok, Million Dollar Question: What words come to mind when I say that I want to motivate learners?

Framework #2: TEC-VARIETY for Online Motivation and Retention

1. **T**one/Climate: Psych Safety, Comfort, Belonging
2. **E**ncouragement, Feedback: Responsive, Supports
3. **C**uriosity: Fun, Fantasy, Control
   …
4. **V**ariety: Novelty, Intrigue, Unknowns
5. **A**utonomy: Choice: Flexibility, Opportunities
6. **R**elevance: Meaningful, Authentic, Interesting
7. **I**nteractive: Collaborative, Team-Based, Community
8. **E**ngagement: Effort, Involvement, Excitement
9. **T**ension: Challenge, Dissonance, Controversy
10. **Y**ields Products: Goal Driven, Products, Success, Ownership

Examples of TEC-VARIETY

1. Tone/Climate: Social Ice Breakers

A. 8 nouns (adjectives, verbs)

- List of nouns: (e.g., pirate, computer, traveler, roadrunner, wind, bookworm, musician, mentor, etc.)
  - http://www.momswhothink.com/reading/list-of-nouns.html
- List of adjectives: (e.g., lazy, powerful, shy, bored, exotic, cooperative, sloppy, rebel, etc.)
  - http://www.momswhothink.com/reading/list-of-adjectives.html
- List of verbs: (e.g., coordinate, entertain, amuse, push, unite, beg, dream, publicize, etc.)
  - http://www.momswhothink.com/reading/list-of-verbs.html

1. Tone/Climate: B. Video Course Intros
http://www.youtube.com/watch?v=jWOUygSnKLQ

2. Encouragement, Feedback, etc.: A. Voice Feedback
Vocaroo; http://vocaroo.com/
http://vocaroo.com/i/s0iIAqCoVTH7 (Fort Sill)

2. Encouragement, Feedback, etc.:
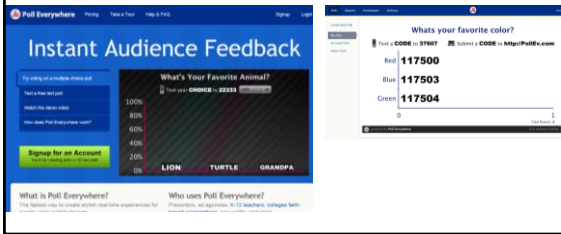### B. Quizlet (online quiz tools)
http://quizlet.com/
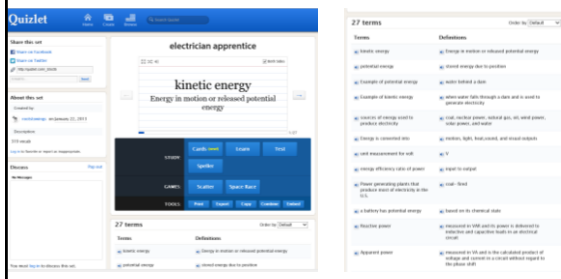
2. Encouragement, Feedback, etc.: C. Create Screencasts
(Jing, GoView, Screenr, slide from Zaid Ali Alsagoff [zaid.alsagoff@gmail.com])
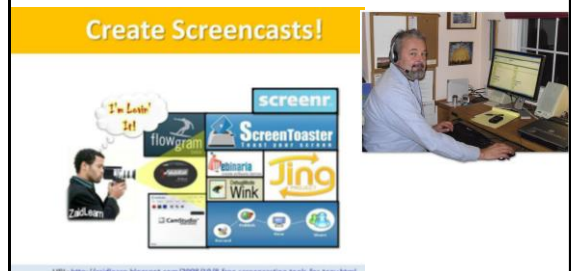
2. **E**ncouragement, Feedback, etc.: D. Blog and Website Polling
(e.g., Poll Everywhere, BlogPolls, BlogPoll, MicroPoll)
http://www.polleverywhere.com/

3. **C**uriosity, Fun, Fantasy, Control: A. Online Database Activities
(e.g., WolframAlpha)
http://www.wolframalpha.com/

3. **C**uriosity, Fun:
B. Something in the News
(e.g., Fauja Singh, 101, finishes last race, February 24, 2013)
http://espn.go.com/sports/endurance/story/_/id/8979487/fauja-singh-101-caps-career-10k-hong-kong

4. **V**ariety, Novelty, Fun, Fantasy:
A. Timers (Random.org, Stopwatches, coins, playing cards, dice, Countdown Timers, Stopwatch Bombs, etc.; http://www.online-stopwatch.com/countdown-timer/**)**
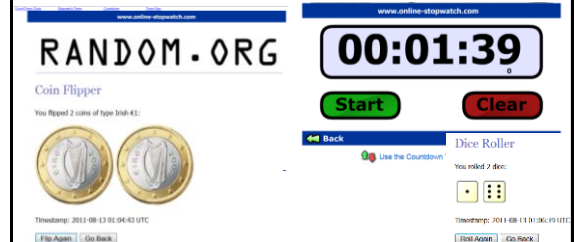
5. **A**utonomy, Choice:
B. Commonwealth of Learning, March 2013
http://www.col.org/news/Connections/2013Mar/Documents/Connections_March2013.pdf

6. **R**elevance, Meaningfulness:
A. Video Scenario Learning
(Franklin University, cost and forensic accounting course)
http://video.franklin.edu/Franklin/acct/managerialAccounting/cost-behavior-player.html
http://video.franklin.edu/Franklin/acct/342/common/fraudScenario02.html
http://www.youtube.com/watch?v=cJmosLSUgQ8&list=TLzymmALKW1TI

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6. Relevance, Meaningfulness:
B. Design Multimedia Glossaries
Ozgur Ozdemir, December 2012
http://r685glossary.shutterfly.com /
Umida Khikmatillaeva, Dec. 2011, P540
http://learningplanet.shutterfly.com/

7. Interactive, Collaborative:
A. Collaboration and Discussion in Google Hangouts
(January 29 and February 25, 2013)

7. Interactive, Collaborative:
B. Negotiate Meanings Online
(e.g., PiratePad: http://meetingwords.com/)
MeetingWords is a simple text editor for the web.
Your text is saved on the web, and more than one person can edit the same document at the same time.
Everybody's changes are instantly reflected on all screens. Work together on meeting notes, brainstorming sessions, homework, team programming and more!
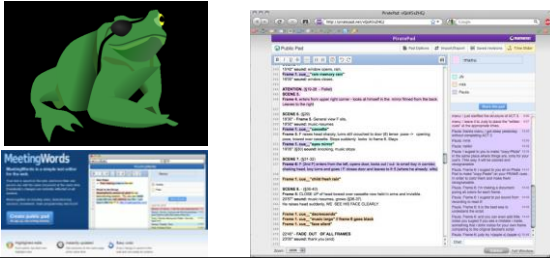
8. Engagement, Effort: **A.** Arab spring: an
interactive timeline of Middle East protests, The Guardian, Garry Blight, and Sheila Pulham, July 12, 2011
http://www.guardian.co.uk/world/interactive/2011/mar/22/middle-east-protest-interactive-timeline

9. Tension, Challenge, etc.:
A. Decision-Making Scenarios
(e.g., Articulate Storyline)
http://articulate.demos.s3.amazonaws.com/broken_co-worker/story.html

9. Tension, Challenge, etc.:
B. Combining Asynchronous and Synchronous Events (flipping classes)

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10. Yields Products, Goals:
A. Final Product Video Summaries
Piercarlo Abate: http://www.youtube.com/watch?v=_-TURzHO0aU
Gagnam: http://www.youtube.com/watch?v=7Q429IqxZaU&feature=youtu.be
Miguel Lara (Web 2.0 FREEDOM): http://www.youtube.com/watch?v=8cmCFWi9IW8

Commitments:
Stop and Share:
Which principle(s) of TEC-VARIETY will you use?

Tone/Climate
Encouragement, Feedback
Curiosity

Variety
Autonomy
Relevance
Interactive
Engagement
Tension
Yields Products

COMMITMENT

Poll #3:
Do you feel "MOTIVATED" to try any of this out?
A. Yes, R2D2
B. Yes, TEC-VARIETY
C. Yes, both
D. Neither

DON'T JUST WISH FOR A GREAT 2013, MAKE IT SO.

Stop and Share:
Three Words from Today's Session!

Any Questions?
Try the R2D2 Model!
Try TEC-VARIETY too...

Slides at: TrainingShare.com
Papers: PublicationShare.com
Book: http://worldisopen.com/
Email: curt@worldisopen.com