Learning is Changing Part 1: Blended Learning A to Z: Myths, Models, and Moments of Magic
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Blended is Tinkering…

March 7, 2016
A Famous Tinkerer
Raymond Tomlinson, inventor of modern email, dies, USA Today
http://www.usatoday.com/story/tech/2016/03/06/tomlinson-inventor-modern-email-dies/81413414/

Blended is Tottering…

January 20 and 26, 2016
Weekly Sync Guests Chats
Weekly Guests in Zoom
RS11 Chat with Mike Molenda, IU
RS11 Chat Charles Graham, BYU

Blended is Transformative or even Extreme…
Learning is More Blended...

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

Poll #1: Who Needs Blended and Online Learning?

January 20, 2016
Universities tap growth of craft beer, offer classes, Chicago Tribune

January 20, 2016
Universities tap growth of craft beer, offer classes, Chicago Tribune

May 31, 2015
MERS, South China Morning Post

August 5, 2015
Anchored Instruction Videos
Shubham Jaglan Overwhelmed by "Dream" Return Home After Double World Championship
Disha Chopra, NDTV Sports

Portland State University in Oregon started an online Business of Craft Brewing program in 2013. It has become one of the school’s most successful professional certificate programs, drawing people from around the world, said Scott Gallagher, the university’s director of communications.
January 20, 2016
Universities tap growth of craft beer, offer classes, Chicago Tribune
“We discovered that there’s a huge need for people who wanted to get a certificate,” Gallagher said. “They didn’t necessarily want to go to college or already had a college degree and wanted to open up a brew pub.”

October 15, 2015
An EdTech Buzzword Bingo Card
NPR Ed, Anya Kamenetz

January 31, 2016
Hybrid Courses
University of Wisconsin Milwaukee
http://www4.uwm.edu/ltc/hybrid/

January 30, 2016
Welcome to the Blended Learning Toolkit, University of Wisconsin
https://blendedtoolkit.wisc.edu/blended-learning-modules-offer-dvm-students-more-comprehensive-education/

January 30, 2016
The Blended Learning Toolkit
University of Wisconsin Madison
https://blendedtoolkit.wisc.edu/blended-learning-toolkit-offer-dvm-students-more-comprehensive-education/
Myth #1: If you read 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

Classifying K-12 Blended Learning
Heather Staker and Michael B. Horn, May 2012

"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."

Myth #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)

Historical Emergence of Blended Learning
(Graham, 2006)

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

<table>
<thead>
<tr>
<th>Proportion of content delivered online</th>
<th>Type of Course</th>
<th>Typical Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>0% Traditional</td>
<td>Course with no online technology used - control is delivered in writing or oral.</td>
<td></td>
</tr>
<tr>
<td>1 to 25% Web facilitated</td>
<td>Course which uses web-based technology, such as email, minimally a face-to-face course. Might use Blackboard or WebCT to post the syllabus and assignments, for example.</td>
<td></td>
</tr>
<tr>
<td>25 to 75% Blended/Hybrid</td>
<td>Course that is a blend of the online and face-to-face course. Significant proportion of the content is delivered online. Typically, many online discussions, typically has some face-to-face meetings</td>
<td></td>
</tr>
<tr>
<td>75 to 100% Online</td>
<td>A course where the vast bulk of the content is delivered online. Typically has no face-to-face meetings</td>
<td></td>
</tr>
</tbody>
</table>

Myth #6: Knowing "how much" to blend is vital.

Range of Blends in Pew Cases

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?

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

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
- Dept/Program Level
- District/Institutional Level

- Instructor stakeholders
- 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)
Myth #10: There is a best model of blended.

Seven Example Blended Learning Models

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 #3. Online Lab (lab or field experience component of course is online)
Blended Model #4. Self-Blend (students decide on which courses they take online or which portion of the course is online)

Blended Model #5. 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 #6. Anchor (start with FTF or what students are familiar with and then move to online; or the opposite and start online and move to F2F)

Blended Learning Model #7: Gradual Human (F2F) Approach

Blended Learning Examples

August 19, 2015
Blended Solution #1. Use the Media to Supplement Content (e.g., CNN Money)

January 28, 2015

**Blended Solution #2.** Find Quality Supplemental Text Resources (e.g., Accounting Coach; includes tests, Q&A, visuals, forms, definitions, etc.)

[Image of Accounting Coach website]


**Blended Solution #3.** Workplace Internship, Practicum, and Field Experiences Online Reflections

**Blended Solution #4.** Interactive Labs and Simulations

[Image of PhET Interactive Simulations]


**Blended Solution #5.** Online Role Play or Debate (e.g., documentary production)

**Blended Solution #6.** Reflect on Virtual Timelines (Dipity, xtimeline, Simile, etc.)

- [http://dipity.com/](http://dipity.com/)
- [http://xtimeline.com/](http://xtimeline.com/)
- [http://simile.com/](http://simile.com/)

**Blended Solution #7.** Online Database Activities (e.g., WolframAlpha)

August 31, 2015
Blended Solution #8.
Short Educational Video Anchors:
CNN, BBC, TED, TED-Ed, ForaTV
BBC One-Minute World News

Blended Solution #9.
Videos with Test Questions (e.g., TEDEd)
(Lessons about every single element on the periodic table)

Blended Solution #10.
Video Profiles of successful female scientists,
(e.g., For Girls in Science)

Blended Solution #11.
Collaborative Video Annotations and Discussions (Craig Howard, IU)

Blended Solution #12.
Video Tutorials, Demonstrations, and How-To’s
Investopedia (videos, tutorials, etc.)
http://www.investopedia.com/video/play/deferred-revenue/

Blended Solution #13.
Create Screencasted Tutorials
(Jing, GoView, Screenr, Overstream, Screencast-o-Matic; see http://tec-variety.com/TEC-Variety_links-examples-resources.pdf)
Blended Solution #14.
Combining Media (Dual Coding Theory: Wikipedia + Video + Pictures)

Blended Solution #15.
Animations with Practice Tests
(e.g., Human Embryology)
(Valerie O’Loughlin, Indiana University)

Blended Solution #16.
Using Readings from Open Access Journals
(e.g., PLOS, IRRODL, etc.)

Blended Solution #17.
Online Practice Tests and Interactive Flash Cards

Blended Solution #18.
Student Collaborative Knowledge Building and Sharing
(e.g., Popplet: [http://popplet.com/](http://popplet.com/))

Blended Solution #19.
Flipping the Classroom
January 7, 2015
When a Flipped-Classroom Pioneer Hands Off His Video Lectures, This Is What Happens, Jeffrey R. Young, The Chronicle of Higher Education

A student watches a video of Norman Nemrow’s accounting class. Mr. Nemrow started the video lectures nearly 15 years ago at Brigham Young U. He is now retired, but students still watch him on the screen.
Blended Solution #20. Analyzing Financial Statements (e.g., Twitter)
https://finance.yahoo.com/q/is?s=TWTR+Income+Statement&annual
http://www.marketwatch.com/investing/stock/twtr/financials

Blended Solution #21. Review and Reflect on Existing Expert Content
https://www.youtube.com/watch?v=Sb0jR-C57f0

Blended Solution #22. Online Longitudinal Maps
(e.g., New USDA climate zone map reflects northward warming trends, By Janice Lloyd, USA TODAY, January 26, 2012)

Blended Solution #23. Sample Student Work
(e.g., Interactive Archive/Gallery of Student Exemplary Work
(University of Notre Dame, Freshman Writing September 24, 2014; https://freshwriting.nd.edu/)

Blended Solution #24. Language Lessons Online
BBC Learning English
http://www.bbc.co.uk/learningenglish

Blended Solution #25. Goal Setting Tools
(e.g., I Done This, Milestone Planner, and 43 Things)
March 22, 2015
Blended Solution #26.
Online News with Embedded Media
Madagascar marvel: Divers find fossils of extinct giant lemurs
Daisy Carrington, for CNN, March 22, 2015

May 28, 2015
Blended Solution #27.
Immediate Science
New species from Ethiopia further expands Middle Pliocene hominin diversity, researchers say, Laura Smith-Spark, CNN
http://www.nature.com/nature/journal/v521/n7553/full/nature14448.html

So far, this talk covered...
1. 1 Definition of blended learning
2. 10 Myths of blended learning
3. 7 Models of blended learning
4. 27 Examples of blended learning

A Blended Approach: The R2D2 Model

Addressing Learning Styles with R2D2
August 12, 2015
Create Engaging Learning Experiences


Southern Illinois University, Carbondale, Illinois
Heidi Jung and Cheryl L Bosarge
Instructional Designer
Center for Teaching Excellence
Heidi Lynn Jung hjung@siu.edu
Cheryl L Bosarge cbosarge@siu.edu

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. Exploring the Life of a Prominent People (Wikipedia)

Read 1c. Grammar Checkers
(e.g., Grammarly, Ginger, GrammarCheck, PaperRater, and SpellCheckPlus)
http://www.grammarly.com/

Read 1d. Podcasts
IU Bloomington podcast series to launch Jan. 24, Steve Hinnefeld, IU Newsroom
IU's Media School dean James Shanahan, at left, will host a new campus podcast. Senior Luqmann Ruth will read the news for the inaugural podcast. PHOTO BY JENNIFER PIUREK, OFFICE OF THE PROVOST

January 28, 2015
Read 1e. Twitter Fed Class Discussions
Live-Tweeting Assignments: To Use or Not to Use?
The Chronicle of Higher Education, Adeline Koh
http://chronicle.com/blogs/profhacker/live-tweeting-assignments-to-use-or-not-to-use/58949

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. Cultural Blogs (e.g., Dr. Kim Foreman, San Fran State Univ, Come and See Africa Blog; http://comeandseeafrica.blogspot.com/)

Reflect 2b. Case and Online Discussion (Kelley Direct, IU)

April 13, 2016
Reflect 2c. Interactive Graphs
Tech billionaire announces $250 million in cancer immunotherapy funding, Jayne O'Donnell, USA Today

Dr. Jedd D. Wolchok, Chief, Melanoma and Immunotherapeutics Service at Memorial Sloan Kettering Cancer Center in Photo by John O'Boyle, Freelance ORG XMIT: JO 134700 seanparker 4/7/2016 [Via MerlinFTP Drop]

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

How much rainforest in that chocolate bar?
Global Forest Watch, Nancy Harris, Octavia Payne and Sarah Mann
http://blog.globalforestwatch.org/2015/08/how-much-forest-is-in-that-chocolate-bar/

Display 3b. Virtualize Words Used (e.g., Wordle, Tagzdeo, Tagul, WordSift, Word It Out)
March 24, 2015
Display 3d. Maps of Languages
Langscape, Language at Maryland
http://www.langscape.umd.edu/map.php

January 20, 2016
Display 3f. Embedded Videos
Why the Future Is Bright for the World’s Poorest Farmers, Gates Notes, the blog of Bill Gates

Display 3e. (April 28, 2015)
Concept Mapping and Timeline Tools
(Bubbl.us, Cmap, Gliffy, Spicynodes, or Mindomo)
http://www.spicynodes.org/index.html

December 17, 2015
Display 3g. Conference Resource Visuals
Elliott Masie’s Learning 2015, Nov 1-4, 2015
http://learningtalks.com/learning-2015-videos/sabrina-key-the-learner

Display 3h. Tracking the Life of a Scientist
(e.g., Brian J. Ford, independent scientist)
http://www.youtube.com/user/tellymonitor?p/a/u/1/LhGeApsKjasr
http://www.labnews.co.uk/news/prehistoric-revolution
Display 3i. Videos for clinical education
(Sungkyunkwan University School of Medicine, www.mededu.or.kr)

March 10, 2016
Display 3j. Videostreamed Conferences
Watch SXSWedu Live, Connie Yowell
http://sxswedu.com/live?utm_campaign=Edu+2016&utm_source=hs_email&utm_medium=email&utm_content=27144469&_hsenc=p2ANqtz--ag6U7VJGlpYaciareNq6mryKvA63kCR5O3U8JVQkfAYp7yiTnncHnxw7_PmMpcjioI9V7z1-01hvyCrDPVEAR-_hsmi=27144469

March 7, 2016
Display 3k. Brief Info Videos, Chief Learning Officer

Display 3l. Short Video Anchors
(e.g., TubeChop of V-PORTAL: Video Primers in an Online Repository of e-Teaching and Learning)
Curt Bonk: http://www.tubechop.com/watch/378752

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.

December 8, 2015
Do 4a. Take a MOOC
P540 Final Assignment for Meina Zhu: MOOC, Coursera, Introduction to Psychology, University of Toronto
https://www.coursera.org/course/intropsych
December 8, 2015
Do 4b. Student Final Project Videos
PS40 Final Assignment: Learning Theories and Psychotherapy,
Shu-Yi Wang
https://www.youtube.com/watch?v=PN9mpjxnA5M

Do 4c. Student Music Recordings of Course Content
April 26, 2015
IST Groove Song, Jeffrey Jenkins, R511: https://www.youtube.com/watch?v=nZTwcHj6Jpk
The World is Open, Jill Kaufman, R678: https://www.youtube.com/watch?v=ZRGV0Mg5Vmw&feature=youtu.be
Daniel Halluska, P540: http://www.youtube.com/watch?v=1097K08sPmg

March 12, 2016
Do 4d. Timeline
R678 John Falchi, Timeglider, An Abbreviated History of Distance Education
http://timeglider.com/t/50843d8903a48008?min_zoom=1&max_zoom=100

Do 4f. Website Development
R511 Final Projects, April 2016
IT and HPT Comparison (Website)
Doug Hsu
http://dougandindira.wix.com/r511finalproject

Poll #2: 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.

Any Questions or Comments?
Slides at: TrainingShare.com
Papers: PublicationShare.com
Free book: http://tec-variety.com/
Dr. Curt Bonk – CJBonk@Indiana.edu