Distributed Thought-Leadership And Passive Learning in Online Education

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Online Learning – yeah !

- Any time, anywhere learning -- free from boundaries of time and space
- Supports non-traditional higher education learners
  - Lifelong learners
  - Career changers
- Facilitates long-distance cooperation/collaboration
- Asynchronous model supports greater reflection
- Co-construction of knowledge through scaffolded discourse
- *Nice little earner*

Ah but …

- Physical separation can lead to a lack of sense of belonging
  - This isolation can inhibit participation
- Physical separation breeds selfish behavior
  - Some will lurk (leach) and not contribute
- Some will by nature attempt to dominate discourse
- Learners will adopt particular roles
  - Some frankly, are more valuable than others
- Less of a Dewian participatory democracy but hopefully a benign oligarchy

Engagement

What does it mean to engage with online learning?
- Impossible without sense of belonging to community
- *Presence* is insufficient to engender deep participation
- Online students need to "own" their own learning
- Drivers to participate vs. forces of inertia (Lurking)
  - Lack of confidence to post (Mason 1999)
  - Passive (Sitcom) (Morris and Ogan 1996)
  - Uncomfortable in Public
  - Learning about a group
  - Fear of persistence
  - **No need to post**
  - Too much / too little traffic
  - Don't want to get drawn into sparring (Katz 1998)
  - Flaming

No need to Contribute ?

- Vicarious learners (McKendree et al 1998)
- Constructivist – learning through dialogue
- Dialogue very difficult in very large classes
- **<u>Observation of dialogue</u>**
- Constructivist
- Ego-Less (synthesize not defend)

Analyzing student strategies

- Grounded theory approach (Glaser and Strauss, 1967)
- Observed student-student interactions online
- Ten (wholly online) 10 week graduate IS courses
- Range of technical and management topics
- Quantitative and Qualitative analyses
- **<u>Fluid</u>** set of 8 identifiable role-behaviors emerged
- Activity tended to show a brontosaurus-shaped curve

Analysis

- 9393 messages in discussion boards
- 239 students
- Average age 31years old
- Average professional domain experience 6 years
- Average prior domain knowledge 11 courses
- 60% female , 40% male

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Observed Role-Behaviors

Designation	Behavior
Initiator	Initiates discussion and interactions (often social)
Closer	Summarizes and synthesizes debate
Complicator	Draws attention to inconsistencies, presents new evidence, challenges assumptions, reframes debate
Peer knowledge elicitor	Requests insights or knowledge from others
Facilitator	Enables debate by providing positive feedback, active restating of issues and follow-up questioning
Vicarious-acknowledger	Draws attention to and acknowledges contributions of others
Contributor	Fulfils contractual obligation to participate, continues discussion without altering perceptions or explicit interaction with others
Lurker	Makes few or no contributions.

The Facilitator

- *Good point. **<u>I tried to say something similar</u>** in a previous response. Some companies such as SAP, PeopleSoft, etc.. seem to be creating IS applications that could become commodities because many companies do the same type of general operations, **<u>BUT you made my point</u>** in that there is a large amount of customization of these applications to a specific companies processes*

- *Yes, I agree that economic feasibility is very important. Without the money, it won't get done. **<u>And,</u>** if we don't have the money to maintain the new system, the school would go bankrupt and everyone would lose out. **<u>I also think that there is a lot of grant money out there</u>** and foundations that would be more than willing to support a school library's improvement endeavors, as long as you have a grantwriter (probably the librarian) who knows how to write grants.*

The Complicator

- *I'd like to rephrase this question slightly. "How important are **<u>the correct information systems</u>** to organizational success?" IS must be properly aligned with the business objectives in order to provide any real value*

- *A **<u>broader definition of IT includes</u>** the innovative uses to which it is applied. In any case, the innovater(sic) needs to be aware of the available tools and how they can be integrated to achieve the innovater's(sic) purpose*

The Closer

- *"**Just ask Wal-Mart, UPS, Amazon, eBay or even Xerox and Apple if it really matters**. All of these companies are continually attempting to innovate current technology to develop an edge over their competitors. **Even though Apple & Xerox are currently minor players** in their fields, as long as innovation continues to drive IT forward, they could be at the top of their class 10 years from now.; In my opinion, **IT, science and medicine will never become commodities. All three will continually progress forward and will always truly matter."***

Interactions that work

- The adoption of *dynamic* behaviors leads to multi-threaded debates where students **reference the ideas of others frequently** and challenge the current topic or problem differently because of these influences.
- This appears to lead to **shared construction of knowledge** and thus collaborative learning that was facilitated by learners we refer to as peer "thought-leaders". These were students who could routinely mobilize, critique, refine, and reframe the debate.
- Thought-Leaders adopted Facilitator, Complicator, and Closer role-behaviors more frequently than other students. They were **consistently** recognized as experts by other learners. This could happen even if the Thought-Leaders were neophytes in that domain !

Leadership in online learning

- Leaders can be important in online learning (Oliver and Shaw, 2003)
- Emergent leaders (Yoo and Alavi 2004)
- Different styles of leadership (Heckman and Misiolek 2005)
  - Triggers and responders
  - Distributed vs. concentrated leadership
- Many different ways of characterizing leadership behaviors (Carte et al 2006, Li et al 2007, Yoo and Alavi, Heckman and Misiolek)
  - Supportive, argument, knowledge adding, topic control, knowledge elicitation, organization, initiate, schedule, integrate, innovate, broker, producer, director, coordinator, monitor, facilitator, mentor ,planner, editor, collector…

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Thought-Leaders

- 16 Students nominated by peers as strong thought-leaders (At least 50% of peers)
- 10 Students nominated by peers as moderate thought-leaders (At least 40% of peers)
- 8 Students nominated by peers as weak thought-leaders (At least 30% of peers)
- 34 further students could be considered marginal (At least one vote)

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"Levels" of Engagement

| Level	Form of Activity	Observed Learning Interactions
Participation	Observable behavior that denotes interaction with course materials and reproduction of knowledge acquired in this way.	Predominantly contractual reproduction of knowledge, this results in *individual learning*.
Involvement	Behavior that indicates identification with course objects, indicating the internalization of knowledge from other learners and reuse in discussion posts.	Engaged students, enthusiastic about the topic and who debate points raised by others. This results in a joint learning outcome (*shared knowledge* across peer learners).
Social Engagement	Enthusiastic commitment to the facilitation and direction of sustained learning (*cycles* of knowledge externalization, objectivation, internalization, and reframing). Socially engaged students interacted with peers in the learning community as well as the topic.	Students who actively manage social interactions with peer learners, explicitly facilitating or directing discussions to reframe the subject of discussion. This results in the *active co-construction of knowledge* with peer learners.

Dynamic interactions or not?

Participation –
Contractual obligation

Involvement –
commitment of a sort
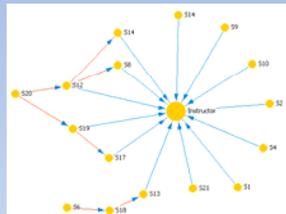
Social Engagement –
committed socially-focused
iterative knowledge building

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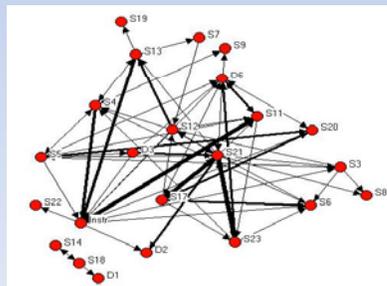
Impact of levels of engagement on discussion quality

- Socially engaged students are most objectively influential – **they inspire more responses**
- Students who iteratively engage the most start the best threads (messages, depth, participants) inspire more deepening discussion (branches) and inspire longer responses.
- Socially engaged students are also highest on measures of **facilitation and reframing** behaviors

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Common factors that identify student recognized thought-leaders

Those with zero or little theoretical knowledge tend to be more frequently considered as thought-leaders than those with strong prior theoretical experience, effect is significant at 5% level (P = 0.02)

Those with the very highest level of professional domain experience appear to be more frequently considered as thought-leaders than those with less prior professional experience, effect is significant at 5% level.

General work experience: No effect found

Student Age: No effect found

Student Prior online experience : No effect found

Student initial attitude towards discussion boards: No effect found

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Common factors that identify student recognized thought-leaders

There was a strong effect of frequency of posts on Thought-leader status.
(P < 0.01) Those posting with greater frequency are more frequently considered as thought-leaders than those with average or below average post frequency.

There was a strong effect of frequency of visits to the discussion board on Thought-leader status. P < 0.01 Those visiting with greater frequency were more frequently considered as thought-leaders than those with average/low post frequency.

Those who strongly agreed that the online discussion board was valuable were more likely to be thought-leaders, this was significant at the 5% level.

Those who strongly agreed that the online discussion board contributed to their understanding of the topic were more likely to be thought-leaders, this was significant at the 5% level (P = 0.014)

Those who agreed or strongly agreed that they frequently performed leadership roles in the online discussion board were more likely to be thought-leaders, this was significant at the 5% level. P = 0.015

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Is thought-leadership a personality trait ?

- Perhaps some folks will always tend to take control or lead regardless of context
- Do those who lead thought in one course do so in others ?

- 46 students appeared in two courses for the same term
- 13 students regarded as thought-leaders in at least one course
- Only 2 students regarded as thought-leaders in both courses
- Only 1 student regarded as a strong thought-leader in both courses

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The power of stories…. well duh !

- Relevant stories have power
- Stories used to emphasize a point or back up an argument
- **Thought-leaders used stories frequently:**

*The decision to say "OK, that's enough testing, let's do this," **is not always done by the person who should be controlling the project**… I was working in the news department of a TV station that was one of a group of nine stations. Management arbitrarily imposed a new computer system on four stations, including mine. Three of the stations accepted it and put it in service and experienced nightmare after nightmare. The systems managers didn't have the guts to say, "This system is awful. The vendor needs to debug it." **In my situation, the local management listened to my explanations that, until the new system underwent huge debugging, our old system was better. My managers agreed, and I spent six full months with the programmers until they got it right.***

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