

Wired and deep: Is it possible?

Can deeper learning outcomes be achieved in a fully online context?

Presenters

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WATERLOO | CENTRE
FOR EXTENDED LEARNING

Centre for Extended Learning

- support design, development, delivery
- primarily asynchronous, online
- 300 individual courses, 3+ masters
- Quality Guidelines
 - equivalence (outcomes, rigor, time)
 - interaction:
student-student | student-instructor | student-content

Objective

“... to share some of the successful strategies used [by online instructors] to help students achieve the kinds of outcomes associated with deeper learning”

- What do we mean by “deep learning outcomes”?
- How do we know they’re successful?

Deep Learning Defined

*“A surface approach is one in which students attempt to rote learn material in order to subsequently reproduce it, while a deep approach is one in which they **seek meaning in order to understand it.**”*

(Trigwell & Prosser, 1991, p. 251)

“Seeking meaning in order to understand”

Students are better able to

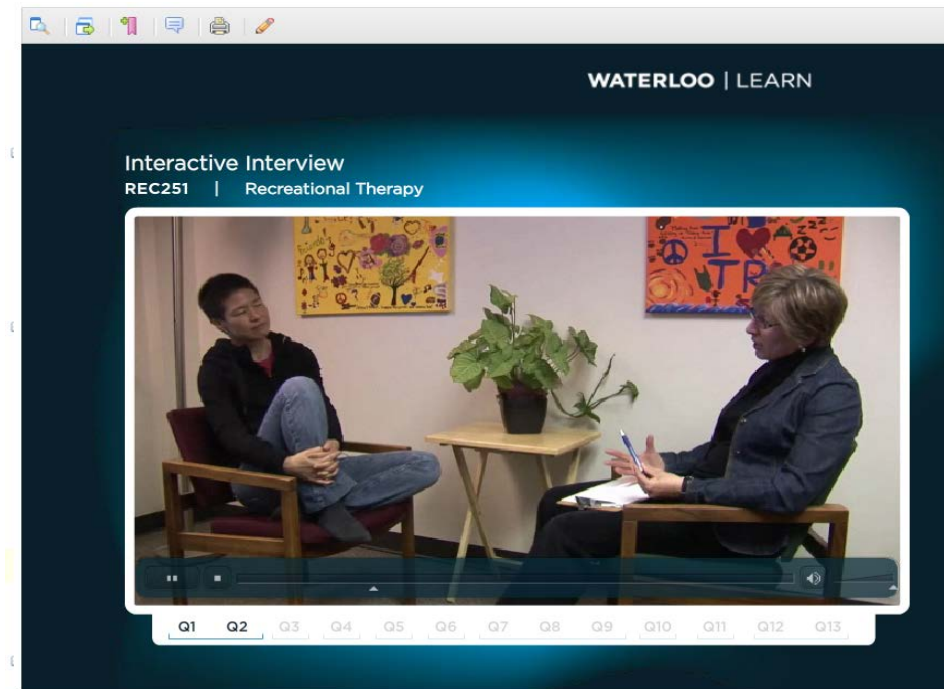
- retain knowledge and apply it to new and different contexts (also known as transfer)
- relate ideas and make connections between new and prior knowledge
- see concepts, ideas and/or the world differently
- engage in independent, critical, analytical thinking in a quest for personal meaning
- regulate themselves as learners
- rely on intrinsic motivation to learn
- engage in active learning by interacting with others and the course material

(Source: Task Force on Innovative Teaching Practices to Promote Deep Learning at uWaterloo: Final Report)

REC 251

Therapeutic Recreation: Developmental and Emotional Disabilities

Leeann Ferries



Transferring data from learn.uwaterloo.ca...

Interactive Interview Demo

Interactive Interview
REC251 | Recreational Therapy

The video player interface includes a progress bar and a navigation menu with the following questions:

- Q1
- Q2
- Q3
- Q4
- Q5
- Q6
- Q7
- Q8
- Q9
- Q10
- Q11
- Q12
- Q13

Deep Learning Outcomes Targeted

- Retain knowledge on assessment and apply it to various case studies
- Make connections between current knowledge about assessment and their new knowledge about the use of an interview to gather important assessment data
- See concepts and ideas differently
- Engage in active learning by interacting with the course material on the assessment process

Self-Reflection Assignment

Self-reflection is an important part of TR practice. Reflecting on thoughts, feelings, interactions, and behaviours offers the potential for insight and assists with ongoing learning and professional development. As a result of viewing the interactive interview, students will reflect on their experience by addressing the following questions:

- What have you **learned** from the interactive interview? (6 marks)
- How are you **feeling** about what you have *learned*? (2 marks)
- What *part(s)* of the interview **stood out** for you the most? (3 marks)
- Discuss your **level of comfort** with client *interviewing*. (3 marks)
- What do you think **you need to do** (opportunities and experiences), if anything, to *increase your level of confidence*?

Value of Exercise as Expressed Through Student Reflection

“I have never studied an interview in depth or had it broken down the way this interview was. It gave me a true understanding of how what seem like small details can have such a large impact on the interviewee in terms of their attitudes and responses.”

Value of Exercise as Expressed Through Student Reflection

“Watching this interactive interview was a very good way to gain first-hand experience on how to conduct an interview with a client, providing examples of the different kinds of questions to ask. This was a great way to learn how to conduct an interview; it’s one thing to read about it in a book, but it’s another to see it happen. I feel that this will stick with me, and the interview has provided me with a better experience.”

Value of Exercise as Expressed Through Student Reflection

“I learned about the importance of watching for non-verbal cues and body language. This was mentioned in the readings and the lectures, but this interview did an excellent job of showing not only examples of behaviours to watch for, but also how they can hinder the interview process.”

Value of Exercise as Expressed Through Student Reflection

“I feel like I have learned how to conduct a proper interview because, as Leeann was conducting the interview there is an opportunity to interact with questions providing more information about possible errors and how to fix them.”

Advice for Instructors

- Purpose of the activity
- Not the perfect interview - use of “non-examples” (mistakes)
- Ways to process the experience with the students – reflection
- Review efficacy of the activity
- Length of time to create (instructor) and complete (students)

Masters of Environment and Business (MEB)

The screenshot shows the University of Waterloo website. At the top left is the 'UNIVERSITY OF WATERLOO' logo. At the top right is a search bar with the text 'Search:'. Below the logo is the navigation menu with the following items: Home, About Environment and Business, Prospective Students (with sub-links for Undergraduate and Graduate), Current Students, Research and Graduate Studies, Alumni and Friends, Employers, Services and Facilities, SEED Home, Faculty of Environment Home. The main content area has a header 'WATERLOO | ENVIRONMENT ENVIRONMENT, ENTERPRISE AND DEVELOPMENT'. Below this is a green banner with the text 'Master of Environment and Business'. The main heading is 'A NEW MASTERS DEGREE'. The text describes the new MEB program offered by the School of Environment, Enterprise and Development, aimed at meeting the growing need for business sustainability professionals. It mentions that the program will offer a part-time program of studies through distance education courses with minimal on-campus study. There are links for a promotional brochure and a reminder about the application deadline. Below this is a section titled 'Degree Requirements & Graduate Courses' which states that the uWaterloo MEB program consists of two foundation courses, four core courses, two electives and an experiential project, which counts as two courses. An additional requirement is attendance of at least two designated scholarly or professional conferences and one capstone residency period. There is a link for course descriptions.

Amelia Clarke
MEB Program Director and
Course Instructor for two MEB online courses

MEB Program Design

Foundation Courses (2 courses)

Know each other, professors and program
Common knowledge base
Academic skills
Teamwork and online skills

Core Courses (4 courses)

Deeper knowledge
Introduction of content-based skills

Electives (choice of any 2, minimum one ENBUS)

How-to courses
Deeper content-based skills

Capstone (double course)

Applied project-based course

Conference Milestones (two)

Learn leading edge conversation
Interact with professionals

MEB Program Designed for Deep Learning – Student and Topic Attributes

- Audience lends itself to the use of authentic evaluation strategies and real world context
- Part time students with jobs in the workplace that relate to the field of study
 - Enables applied assignments in different contexts
 - Diversity of perspectives
- Environment and business topics are practical with real-world content
 - Students need to apply critical thinking to public reports and websites they read

MEB Program Designed for Deep Learning – Course and Milestone Attributes

- Considerable choice in assignments and opportunity to self-direct weekly engagement
- Assignments that apply course learning to their workplace – example memo to their CEO
- Interaction with professionals about course material (in courses and at conferences)
- Interaction between students from different sector perspectives (in discussion boards, team projects, comments on other team presentations)
- Professors with practical experience

MEB Program Designed for Deep Learning – Assignments

Every course:

- Team project and individual assignment
- Student-led discussion boards and summaries
- Guest experts related to week's content
- Other activities that relate to course topic
 - Negotiation exercise

Milestone conferences:

- Reflection

Negotiation Assignment

Negotiation - Assignment Description (13 points)

- This assignment is worth 13 points
- The negotiation occurs on the dates listed in the [Course Schedule](#).

**From
ENBUS 640**

Negotiations take place in the *Negotiation Group Discussions* Forum located by clicking on the **Discussions** link on the navigation toolbar.

The goal of the negotiation is to come up with a consensus recommendation to the CEO of Suncor (formerly Rick George), regarding what his company should do next concerning social and environmental issues in the oil sands and in Fort McMurray.

3. For the facilitator(s):




- Step 1: Read the case study from the perspective of a facilitator.
- Step 2: On your own, determine what topics might be relevant and where the group might achieve consensus. Do not share this; it is to help you prepare for your role.
- Step 3: Make sure that each representative has posted their opening statement.
- Step 4: Help the negotiation, if needed, by posting suggestions on topics they might want to discuss.
- Step 5: Draw together the consensus. Summarize the areas where there is growing agreement and post a "preliminary proposed recommendation" for the representatives to agree with or disagree with or wordsmith. If needed, keep offering revised versions until the group has consensus on some items.
- Step 6: In one final post, clearly document this consensus on behalf of the group. Also note other key topics on which the groups have 'agreed to disagree'. Complete the final post by **Thursday of Week 8** so you have time to complete your reflection report by **Sunday of Week 8**.




4. Reflection report

- Prepare a 1-2 reflection report that documents your opinion about the negotiation exercise. Include a summary of the consensus process (briefly documenting common and divergent opinions, how consensus was achieved, etc.) and your opinion on negotiation as a means of engaging with stakeholders. Be sure to make some connection to course content. No references required.
- This reflection should be completed by **Sunday of Week 8** at the latest.
- Submissions should be made to the *Reflection Document Dropbox* located by clicking on the **Dropbox** link on the navigation toolbar.

5. Once the negotiation exercise is completed, the discussion boards of the other teams will be available for you to view. Take a look to see if they came to the same agreement as your team.

Example of Discussion Board from ENBUS 602




★ [Module Discussions](#)   

★ [Module 1 Discussion](#) 
0 messages - 0 unread  

Discussion on global social and ecological trends; ecological footprint; and sustainable development & sustainability definitions:

After reading about global social and ecological trends, please discuss what stands out for you as being particularly troubling or important. Please also share your ecological footprint and discuss how your lifestyle is contributing to one or more negative social or ecological trends globally. Finally, if you have any thoughts about the definition(s) of sustainable development or sustainability you would like to add, please do.

Locked after Sep 18, 2011 11:55 PM

★ [Module 2 Discussion](#) 
0 messages - 0 unread  

Discussion on the history of corporate sustainability; introduction to regulations; BP case study (and the impact of crisis events on corporate sustainability and environmental regulation):

What is your reaction to the responses by various actors to the spill? Also, what are your thoughts on the long term impact of this crisis event on both corporate sustainability and environmental regulation? Feel free to supplement the information provided in the case study with videos or news from other sources and/or more recent coverage (be sure to provide links to your source).

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Value to students – Discussion Boards

“Thank you dear classmates for all your contributions. I thought it was time - during November, the darkest month and half way through our three year program - to send a note of thanks for sharing your experience, knowledge and insights.

I am gaining so much from reading your views on our course content. I so appreciate reading your posts and wonder how we can all look at the same topic so differently. I've come to count on expanding my knowledge by: ”

Value to students – Guest Expert Discussion

“The expert discussions were an unexpected added bonus. It was such a privilege to interact with some of these experts and get the inside story on their work. [The guest speakers] made the case studies so much more relevant and addressed the nuances not apparent in reading the websites.”

Value to students – MEB Program Overall

“Meeting a diverse group of peers and professors, which leads to interesting discussions and varied points of view.”

“I do find the content relevant and often tied to Canadian case studies which I enjoy. There is no doubt that the professors are leaders in this field and there are lots of real world evidence and exploration offered to students.”

“... the knowledge I gained regarding sustainability and what it means for organizations, from the fundamentals to the more specific details. A little more than half way through the program, I feel confident in my abilities to apply the knowledge I have gained in this program and have a successful career as a business sustainability professional.”

Key Characteristics of Deep Learning in MEB

Retain knowledge and apply it to new and different contexts

- Applied assignments
- Assignment formats

Relate ideas and make connections between new and prior knowledge

- Program design builds on previous courses and experiences

See concepts, ideas and/or the world differently

- Course content
- Student diversity
- Negotiation exercise

Engage in independent, critical, analytical thinking in a quest for personal meaning

- Individual assignments
- Reflections
- Discussions

Regulate self as learner

- Choice in assignments
- Additional resources

Rely on intrinsic motivation to learn

- Tied to workplace

Engage in active learning by interacting with others and the course material

- Discussions
- Team presentations and reports
- Engage professionals

Lessons learned

- Designing a program from scratch provides numerous opportunities to embed deep learning.
- Milestone conferences add considerable value for a professional program.
- Students love choice in assignments and assignments related to their workplace.
- Professional students gain about 50% of their learning from each other.
- Extensive and useful feedback on assignments is critical. Requires instructors who are very comfortable with material.
- Discussion boards are hard to 'time'. The more motivated the students are, the more time they spend...
- Guest experts are asked way more questions than they can respond to.
- Dynamic field that keeps evolving. Must keep courses current.

Wrap-up:

Some ideas for going wired and deep

- **Experiential learning *is* possible online**
 - reflection on experience is important
- **Situate abstract concepts in authentic contexts**
 - helps students retain knowledge
- **Make thinking processes visible to novice learners**
 - helps students develop a conceptual model of the targeted skill or task
- **Provide access to experts**
 - extends learning beyond the classroom
- **Incorporate peer learning**
 - multiple perspectives, ways of approaching a task

Wrap-up cont'd: Some ideas for going wired and deep

- **Use real world content (including mistakes)**
 - facilitates critical thinking
- **Provide extensive feedback**
- **Engage students in active learning**

Questions?

References

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For more information

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