

TECHNOLOGY & its ROLE in the transformation of education

Lesson 2 of 4 – OERs

DESCRIPTION & OBJECTIVES

Description

This course explores the critical role of educational technology as one tool in the transformation of education. Involves students in change-related projects in the local environment. Taught using distance education resources.

Objectives

1. Through active participation in the class, students should be able to better facilitate complex educational changes by applying theoretical and scientific principles and technological tools.
2. Participate in interactive web-based instruction.

UNIT 2: Open Educational Resources – Further Review of OERs; Composing, Adapting, Designing and Creating

3. Further review of OERs: Composing and Adapting
4. Designing and creating your own OERs for sharing

Rationale: *Using information contained in the Open Educational Resources Handbook, this lesson will help students learn about the various aspects of composing, adapting on OER for their use. In addition, they will consider aspects of instructional design in order to create their own OER for sharing with others. Students will work to apply the concepts presented and discussed in the OER Handbook to complete a lesson plan.*

GRADE LEVEL

- ❖ Undergraduates and graduate students
- ❖ Generally beyond 18 years old

LEARNER CHARACTERISTICS

- ❖ Lesson should be appropriate for students of all ethnicities
- ❖ Lesson should be appropriate for students of any economic background
- ❖ Lessons should be gender-neutral
- ❖ Minimal knowledge of OERs with some prior experience in reading, synthesis, reframing, extension and writing practices will be helpful
- ❖ Varying attitudes and commitment of subject matter may be represented

LEARNING CONTEXT

- ❖ Time: 1 week, equivalent to 2 - 90 minute class periods
- ❖ Classroom:
 - This class is taught using WebCT Blackboard, but could be applied to F2F or other online learning environments
- ❖ Number of Students: variable

MATERIALS

- ❖ Teacher website
 - Assignment Packet
 - URL
- ❖ Open Educational Resources for Educators Version 1.0
- ❖ Word processing software

TECHNOLOGY

- ❖ Computer with Internet access
- ❖ Electronic Assignment
- ❖ Teacher website

INSTRUCTIONAL PLAN

Preparation:

- ✓ Verification of student's access to the internet outside of school

Homework: - See assignment for more details

- ✓ Student will respond through an electronic document by creating a response paper with options for completing the objectives
- ✓ Student will upload the assignment to the LMS (or submit through email)

Grading Criteria - See assignment for more details

- ✓ Assignment rubric
- ✓ Specific length and format
 - Relevant, Analytical, and Appropriately Reflective

INSTRUCTION AND ACTIVITIES

OER Basic Unit Vocabulary:

Auxiliary Storage	Kilobyte
Binary code	Megabyte
Bit	Non-rival good
Boot Processes	Open Educational Resource (OER)
Byte	Operating System
Communities of Practice	Output
Copyright	Processor
CD-ROM	RAM
CPU	Reuse
Creative Commons	Redistribute
Curriki	Remix
DVD	Revise
Fair Use	ROM
Flash Drive	Social Cognition
Gigabyte	Software
Hard drive	Terabyte
Hardware	UTIPS
Information processing cycle	UEN
Input	

Lesson Script

ANTICIPATORY SET & INTRODUCTION

Students enter their LMS to find a number of modules, separated into weeks of instruction. This lesson plan is aimed at a single week of instruction, and accompanies a discussion board dedicated to the topics related below. This topic of OERs is meant to come at the end of a 12-week course where classroom disruption has been highlighted, along with tools and strategies to enhance the educational experience from both teacher and student perspectives.

Introduction: (Teacher)

- ✓ *This week marks the second of the 4 week unit on Open Educational Resources (OERs).*
 - ✓ *Offer additional discussion areas, if possible, through either synchronous or asynchronous means. Lead-in:*
-
- This week marks the second of the 4 week unit on Open Educational Resources (OERs). The topics for this week include:
 - Further review of OERs: Composing and Adapting
 - Designing and creating your own OERs for sharing
 - Feel free to post anything encountered in your review of the readings from the Handbook, or the websites, found in the Instructional / Lesson Plan assignment details...
-

Consider using a video-based introduction to the unit, with the instructor describing an overview of the unit objectives and assignment.

LESSON

Step 1 - Task Definition

In the second of this 4-week unit, we are going to learn about composing, adapting, designing and creating your own OERs for sharing. You will be creating a lesson plan based on your exploration of web resources, the OER Handbook, and (possibly) an existing lesson plan of your choice. You will likely be working alone during this unit, however collaboration and sharing of information is encouraged within the guidelines of appropriate academic integrity.

Step 2 - Information Seeking and Review

This week marks the second week of the 4 week unit on Open Educational Resources (OERs). The topics for this week include:

- Further review of OERs: Composing and Adapting
- Designing and creating your own OERs for sharing

The instructional objectives for this week include:

- Exploring the technical considerations of OER use and creation
- Examining how existing resources can be reused / remixed into OERs
- Putting into practice the design and creation of an OER

Last week you covered readings and websites concerned with:

- Exploration of local and meaningful OERs in your state
- Introduction to licensing and OERs

You are now familiar with a couple of key websites associated with access and finding OERs for your use, including:

<http://www.curriki.org/xwiki/bin/view/Main/WebHome>
<http://www.schools.utah.gov/assessment/utips/>
<http://www.uen.org/>

This week you'll explore search tools dedicated to finding open resources for you and your students:

www.ocwfinder.org
www.oerrecommender.org
<http://www.ocwconsortium.org/>
<http://ia.usu.edu/>
[http:// envlm.usu.edu](http://envlm.usu.edu)

Step 3 – Critical Analysis

Having read and critically analyzed these materials, consider these questions:

1. Compare your regular search techniques with those tools suggested above. What do you like / dislike about the dedicated tools? What makes them work better or worse than using a traditional search process?
2. What is the purpose of the OCW Consortium? How does it work as a portal to potentially meaningful resources for students? For teachers?
3. How does Instructional Architect work? Review a few units on a topic you have personal or professional interest in...are the lessons well-crafted? What could you do in improving them?
4. There has been much discussion on how we can use technology to improve math-based lessons, and the library of virtual manipulatives is one resource that may assist in that effort. How do you see this repository as being different than the other kinds of open resources available to educators?

For the remaining portions of the assignment, look for and choose open resources using any number of search techniques or repositories up to this point.

Step 4 - Assignment

Directions:

Create an instructional unit that uses technology in a way (or ways) that would be beneficial to both teacher and student. Offer screenshots and/or examples as appropriate.

Describe the technology using specifics as needed.

Hint: How intricate does the lesson need to be? Support the unit by providing enough detail that you could “hand-off” the lesson to another instructor and the lesson could be implemented. What information would you need to provide a surrogate instructor?

Option 1: Create a new instructional unit or lesson plan that utilizes using enlvm.usu.edu , instructional architect, or any of the open resources explored to this point to help your students’ learning (in a unit of your choice). The plans should indicate the:

- audience (who is in the class? what are their characteristics?)
- instructional goals (what can the students expect to learn / practice?)
- timeline (provide benchmark milestone information, if necessary)
- procedure (provide adequate structure and directions during each step)
- technology involved.

In a separate paragraph, describe the major facets of technology within the plan and how/why you think the integration of technology will assist teacher and student.

OR

Option 2: Modify an existing instructional unit or lesson plan to one that utilizes using enlvm.usu.edu , instructional architect, or any of the open resources explored to this point to help your students' learning (in a unit of your choice). The plans should indicate the:

- audience (who is in the class? what are their characteristics?)
- instructional goals (what can the students expect to learn / practice?)
- timeline (provide benchmark milestone information, if necessary)
- procedure (provide adequate structure and directions during each step)
- technology involved.

In a separate paragraph, describe the major modifications from the previous lesson and how/why you think the integration of technology has assisted teacher and student, and improved the lesson (practice/review/application). Offer the existing lesson as an attachment (or appendix).

Step 5 – Evaluation: Format and Submission

Format:

Remember to include your name and the name of the class in the header. Please use Times font, 12 point, double-spaced. Use APA formatting for citations and references (and any tables or figures). The instructional / lesson plan document can be of varying length, but try to keep the main body (previous appendix) under 5 pages in length.

Save the document in either Word 2004 (.doc) or Rich Text file format (.rtf) so that comments can be made and returned to you in the file. To turn in, please upload by using the internal LMS processes through the assignment submission area by the date and time indicated in the class schedule.

Name the document <first initial><last name>-planOER2.<extension>

For example, if your name was Brett Shelton, your document should have the following format: bshelton-planOER2.doc