Introduction to Online Learning

Understanding the Learning Management System

Objectives

- Explain the function of a learning management system.
- Describe the major components of a learning management system.
- Demonstrate appropriate responses in the discussion forums based on netiquette and level of interaction.
- Categorize learning management system communication tools in terms of asynchronous versus synchronous communication.
- Discuss the importance of additional reading assignments.
- Demonstrate the ability to upload a graded assignment to the course portal.
Introduction

This lesson covers the function and major components of a **learning management system (LMS)**. It addresses appropriate student responses and netiquette on an LMS discussion forum. It also discusses the difference between synchronous and asynchronous communication, which is prevalent in learning management systems. In addition, the lesson examines the importance of supplemental reading assignments. It concludes by demonstrating how to upload assignments to an LMS portal.

The Function of a Learning Management System

Most colleges and universities offer students face-to-face, online, or hybrid courses (i.e., part face-to-face and part online) to fulfill regional accreditation requirements. Allen and Seamon (2010) found the following in a 2009 study:

> Over 4.6 million students were taking at least one online course during the fall 2008 term; a 17 percent increase over the number reported the previous year. More than one in four college and university students now take at least one course online. (p. 1)

The National Center for Education Statistics (“Online education continues rapid growth,” 2010) reports that enrollment growth skyrocketed in the past several years and that “the number of students taking all of their classes online will increase to 3.55 million, while the number of students taking all of their courses in on-campus classrooms will drop to 5.14 million by 2014.”

To present a course online, a school needs a platform for housing, tracking, and communicating all of the day-to-day class operations. An LMS provides a format for the production of Web-based courses that enable students to access content and interact with other students and the instructor.

Learning management systems are often referred to as learning content management systems (LCMSs) or virtual learning environments (VLEs). These terms, however, differ in meaning. LCMS refers to software that serves to centrally manage all of the content of a school or organization. In other words, an LMS is the conduit for delivering courses and the LCMS is the repository of the content for each course a student takes online. A VLE is an information portal that contains a social space from which students construct their virtual space. The construction of a virtual space may include activities ranging from writing text to developing three-dimensional animation using heterogeneous technologies (Dillenbourg, Schneider, & Synteta, 2002).

Two of the main learning management systems in use today are **Blackboard™** and **Moodle™**. Other learning management systems include Pearson’s eCollege™, Cornell University’s CCNet™, Sakai™, and ATutor™. You should determine which platform your institution uses.
and then access tutorials for that platform over the Internet. Ultimately, an LMS provides online learners with a simulated classroom to explore and share relevant ideas and ask questions.

This simulated classroom is known as the **LMS course shell**. To access the LMS, visit your institution's Web site. Your institution should have a link to the LMS it uses on its home page. Given the variety and nature of copyrighted academic and institutional material contained within an LMS, only registered students may access the institution's LMS. You will need your institutional username and password to log into your institution's LMS. This login procedure verifies that you are a registered student in sound academic and financial standing with the institution. The following screen shot shows an example of an LMS course shell in Moodle™:

![Example of a Moodle™ home page with login](image)

### Components of a Learning Management System

**Basic Characteristics**

Most learning management systems are designed with certain basic features, all of which a course instructor may or may not use in an LMS course shell. These features include lecture content, time management tools, communication tools, activities, assessment tools, and reports. Online courses are offered over the Internet and are presented within the framework of the institution's learning platform. The following table summarizes the basic features of an LMS:
<table>
<thead>
<tr>
<th>LMS Basic Features</th>
<th>Characteristics</th>
<th>Possible LMS Folder or Link</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lecture</td>
<td>Weekly units consisting of a lecture, assigned readings, assignments, and discussion topics</td>
<td>Course Content; Module #; Lesson #</td>
</tr>
<tr>
<td>Time Management</td>
<td>Calendar and student planner</td>
<td>Calendar; Student Resources</td>
</tr>
<tr>
<td>Communication</td>
<td>Announcements, which the instructor may post in a variety of ways, depending on the institution’s learning platform; chat; and e-mail</td>
<td>Announcements; Latest News; Chat; Discussion Board; Discussion Forum; Wimba; WimbaPRONTO</td>
</tr>
<tr>
<td>Activities</td>
<td>Assignment drop box provided for submitting assignments; discussion forums in which the instructor poses the discussion topics and joins in the discussion; surveys; wikis; glossaries; databases; subject pathfinders from campus librarians; Internet links to campus resources</td>
<td>Dropbox; Assignment Activities; Discussion Board; Discussion Forum; Survey; Wiki; eJournal; ePortfolio; Glossary; Campus Resources; Subject Pathfinder; Database</td>
</tr>
<tr>
<td>Assessment</td>
<td>Grade book available for students to check grades on assignments and class participation</td>
<td>Grades; Grade book; Assessment; Quiz; Exam</td>
</tr>
<tr>
<td>Reports</td>
<td>Ability for students to update their personal profiles; ability for instructors to build small, reusable learning objects; class roster with student e-mail addresses; transcript of final student grades</td>
<td>Profile; Reports; Roster; Statistics; SCORM</td>
</tr>
</tbody>
</table>

**Construction of a Basic LMS Course Shell**

In general, an LMS includes a home page, or course shell, consisting of a table of contents of everything included in the course (e.g., course syllabus, assignments, activities, and quizzes). The instructor can organize the home page into units, or lessons, with relevant course material posted. Course material may include readings, audio presentations, video presentations, course guidelines, a discussion area, an area for private correspondence with the instructor, a mailbox, and an area to submit assignments. The following screen shot serves as an example of a basic LMS course shell in Moodle™:
Example of the Moodle™ LMS course shell

The week before starting your online course, log into the LMS course shell to familiarize yourself with its contents.

Note: In some situations, an instructor may not make the course available until the first day of class because he or she is still arranging the content.

Many instructors organize their courses by weeks, which correspond to units, or lessons. Your instructor can post required online reading assignments for you to access or links within the course that take you directly to related material. Arranging course content in this manner provides a weekly organization to the course material, related discussions, and assignments. Many institutions now require first-time online students to complete a tutorial that introduces them to the features of the institution’s LMS. Check with your instructor to verify if your college or university has this policy.

Make sure you familiarize yourself with the LMS your institution uses a few days before your course launches. Remember, this will serve as your home base; therefore, you will want to feel comfortable navigating the system and make sure you can find the material your instructor has posted. If you have problems maneuvering within the LMS course shell, contact your instructor. Most institutions offer a toll-free LMS help desk support service that is available 24 hours a day, 7 days a week.

Netiquette and Discussion Forum Interaction

Just as instructors expect a certain level of etiquette and participation from students in a live classroom, instructors expect the same from students in an online classroom. These expectations include appropriate conduct with other students and appropriate conduct with the instructor. In addition, instructors require sufficient course-room participation (e.g., discussion board postings and synchronous meetings) from students for them to successfully complete their courses. Remember that in an online environment, you cannot use verbal cues (e.g., intonation) and physical cues (e.g., body language) when you send messages over the Internet.
This lack of cues makes it easy for students to misconstrue what other students mean in their messages.

**Netiquette**

Netiquette is a necessary component of all online classrooms because it provides a foundation for professional and respectful communication. As a rule of thumb, you should behave as diplomatically in the online environment as you would in a face-to-face interaction in a brick-and-mortar classroom. Some basics of netiquette pertain to how you format and type your discussion board responses. For example, writing in all capital letters conveys a certain level of hostility that is not appropriate for the classroom. Examine the difference between the previous sentence in this paragraph and the same sentence below typed in all capital letters:

*FOR EXAMPLE, WRITING IN ALL CAPITAL LETTERS CONVEYS A CERTAIN LEVEL OF HOSTILITY THAT IS NOT APPROPRIATE FOR THE CLASSROOM.*

Sentences that mix words typed in a standard way with words written in all capital letters also convey a level of hostility that is inappropriate for the classroom:

*For example, writing in ALL CAPITAL LETTERS seems to convey a certain level of HOSTILITY that is NOT APPROPRIATE for the classroom.*

Typing in a standard fashion with mixed-case text is more professional than capitalizing all of the words or part of the words in an online interaction. Also, using two or more paragraphs instead of one long block of text will make your response easier and more compelling to read. Using paragraphs can help you organize your thoughts as well. The following table details the reasons for clear, concise, and compelling written responses:

<table>
<thead>
<tr>
<th>Type of Response</th>
<th>Explanation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clear</td>
<td>You want your readers to easily understand your response, so make sure you read it to yourself before you post it. Also, make sure you use proper English and spelling. It is difficult and time-consuming for others to try to translate acronyms and improper contractions.</td>
</tr>
<tr>
<td>Concise</td>
<td>Try not to respond with lengthy treatises. You want other students to actually read the thoughts in your responses, and verbosity does not encourage people to devote the time it takes to learn what you have to say. As you proofread your response, ask yourself if all of your topics are “doing work” in your response. Are they accomplishing something for the response, or are they irrelevant or superfluous? If they are not working, omit them.</td>
</tr>
<tr>
<td>Compelling</td>
<td>While you may agree with someone or have an impassioned critique to offer about a particular issue, make sure your response enumerates why you agree or disagree with</td>
</tr>
</tbody>
</table>
the other person or with the general idea. Provide relevant reasons to support your argument, or build upon what someone else has said. Include your unique perspective on the topic. Do not, however, rely solely on quotes; a discussion is a place for all students to share their informed ideas with their fellow students. You cannot accomplish this goal if your response includes only other people’s ideas and research. Instead, you should alternate your thoughts and comments with quotes or data from others.

Finally, good manners matter. Online classes pose a unique challenge to students because students feel freer to share their feelings when they are half a country away in separate buildings and not face-to-face in the same room on a daily basis. This sort of separation can allow for a unique bravado in students’ responses—to the point of brutal honesty, nasty debates, or argumentative behavior. You can much more easily offend someone through a computer than in a live classroom. As a rule of thumb, you should behave as diplomatically in the online environment as you would if you were face-to-face with someone in a physical classroom on a daily basis (Palloff & Pratt, 2003, pp. 169-171).

**Level of Interaction**

In terms of online interaction, every instructor has his or her own guidelines and expectations. Instructors will vary in how often they expect students to respond to discussion topics and how many responses they expect students to make to fellow students. Regardless of the standards, remember that these are minimum expectations. You can certainly respond to as many different students or postings as you like (just remember to use proper netiquette).

When you respond to a discussion topic, make sure you do so thoroughly, weaving your own thoughts in with quotes or data from outside sources to support your argument. When you respond to a fellow student, make sure you express why you do or do not agree with his or her response. Provide information regarding what you have found to be true in your experience and/or what other reputable resources say about the topic. You may ask the student for clarification before you formulate your response to ensure that you are interpreting the posting accurately. Ultimately, you want to actively engage in the discussion. You cannot simply respond with “I agree” or “me too”; rather, you must have a dialogue with your fellow students to elevate the level of learning that takes place for both you and your peers. Discussions offer students the opportunity to share ideas and reflect on others’ perspectives.

**Asynchronous and Synchronous Communication**

While all learning management systems’ discussion forums allow students to engage in asynchronous communication with one another and the instructor, most learning
management systems also allow students to use **synchronous communication** in the form of live chat.

Asynchronous communication is communication that students can complete when they find it convenient to do so within the timeframe the instructor has established. Students respond to the weekly discussion topics in the discussion area (also known as a discussion board, discussion forum, or course room), which parallels what students experience in a “live” classroom setting. The instructor poses the discussion topic and joins in the discussion. Discussions typically are asynchronous in that students can participate at any time and from any location with a posted response to a threaded discussion topic. E-mail serves as another form of asynchronous communication because students may view and respond to e-mail at any time, regardless of whether or not the instructor or other students are online. The following is an example of a discussion forum in Moodle™:

![Asynchronous communication example in a Moodle™ discussion forum](image)

On the other hand, synchronous communication occurs at about the same time between the instructor and students. Live chat and collaborative tools such as Wimba™ serve as examples of synchronous communication. Synchronous communication allows the instructor to hold office hours and answer questions immediately as well as provides a venue for a small-group discussion. The following shows an example of synchronous communication in Moodle™:
The following table examines the advantages and disadvantages of asynchronous and synchronous communication:

<table>
<thead>
<tr>
<th>Student Use</th>
<th>Advantage</th>
<th>Disadvantage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asynchronous communication</td>
<td>Allows you to complete assignments at a convenient time for you and your schedule</td>
<td>Quite independent; requires strong, consistent, and self-motivational skills; responses to and from other students not in real time (i.e., they occur after the fact)</td>
</tr>
<tr>
<td>Synchronous communication</td>
<td>Allows you to interact in a live dialogue with your peers and/or your instructor</td>
<td>Schedule for synchronous communication not flexible and must conform to the timeframe the instructor has determined</td>
</tr>
</tbody>
</table>

**Additional Reading Assignments**

Instructors often include required or optional reading assignments from outside of the required textbook. These additional reading assignments are important as they allow for further illumination of a given topic that one could approach from a variety of perspectives. Thus, they enable students to develop a broad understanding of the issues and central ideas provided in the textbook about a specific topic. They also allow students to individualize their learning experiences through supplementary resources on topics that may particularly interest them. To this end, students have some control over their own scholarship and research. The following is an example of a reading assignment in Moodle:

```
No attempts have been made on this assignment

Read about scarcity and economics at the following Web site:
What is Scarcity?
http://www.tutor2u.net/economics/content/topics/introduction/scarcity.htm
In 100 to 150 words, describe how scarcity drives market economies to produce goods and services.

Read about comparative advantage at the following Web site:
Ricard's Insight
http://william-king.m.coe.edu/top/prm/tct/trade/trade1.htm
In 100 to 150 words, summarize the basic concept of comparative advantage as Ricardo identified it.

Read the related Web article:
Russia's Chance for a Free Market Future
http://www.fti.org/comment/ed0409i.asp
Briefly summarize the current state of the Russian economy and projections for the near future.
```

**Example of Moodle™ reading assignment**

**Uploading a Graded Assignment to the Course Portal**

Most learning management systems allow students to upload their completed course work onto their institution’s LMS. This feature prevents the instructor’s e-mail inbox from being inundated with student assignments in addition to the instructor’s regular correspondence. The LMS
The assignment-upload feature (also called a digital drop-box) houses the uploaded assignment typically by time and date. This time/date stamp proves useful when the instructor does not receive a student’s submission. The student can retrieve the assignment and possibly the time and date that he or she uploaded the assignment to the LMS.

The name for the upload feature varies among learning management systems. Common terms include *digital drop-box, assignments,* and *upload.* Moodle™, for example, allows students to upload assignments from an *Assignment* link. First, the student opens the assignment. At the bottom of the middle section of the screen, an *Upload a file* box displays. The student then clicks the *Browse* button and searches the computer hard drive or flash drive where the assignment has been saved. Finally, the student clicks *Upload this file.* Moodle™ also has an assignment feature that lets students write text online as part of their assignment. Your instructor will determine which feature your class will use based on the assignment. The following is an example of the assignment-upload feature in Moodle™:

![Example of the assignment upload feature in Moodle™](image)

**References**


Glossary

**Asynchronous communication**: Communication that is not completed concurrently.

**Blackboard™**: A learning management system that allows for access to discussion boards, course assignments, additional reading materials, easy communication with the instructor, and other features.

**Etiquette**: Code of behavior for a particular society that calls for adherence to certain social and societal norms governing proper and accepted behavior; expectations for polite interaction with others one-on-one and in larger social situations.

**Learning management system (LMS)**: The platform used for creating a virtual classroom environment so that students can access content and interact with other students and the instructor.

**LMS course shell**: Portal that serves as the center of a virtual classroom within a learning management system.

**Moodle™**: A learning management system that allows for access to discussion boards, course assignments, additional reading materials, easy communication with the instructor, and other features.

**Netiquette**: Standards for appropriate behavior and etiquette in an online environment.

**Synchronous communication**: Communication that occurs concurrently, much like an actual conversation.