RATIONAL

Life-long learning, continuous learning, distance learning, eLearning and online learning are buzzwords that are now taking centre stage in the education arena of most countries and regions in the world today. This is especially true in ASEAN countries with the region’s untiring effort to deliver education to all, adhering to its education philosophy of “Education for All”, particularly in reaching out to the unreached citizens of Southeast Asia. (The Cha Am-Hua Hin Declaration on Strengthening Cooperation on Education to Achieve an ASEAN Caring and Sharing Community, 2009). The 21st Century has brought about richer and better opportunities for education to use Learning Management Systems that is now available on various platforms supporting students’ and adult learning anytime and anywhere; and with resources that are more engaging and rich in media support. This will certainly be an invaluable tool and an enabler for educationist and trainers alike to provide comprehensive learning contents for both learners, teachers and students to assist in the training, teaching and learning process. Industries can also use such platform to conduct continuous upgrading of staff through staff training self-paced learning contents.

The learning management system (LMS) is the infrastructure that delivers and manages instructional content, identifies and assesses individual and organizational learning or training goals, tracks the progress towards meeting those goals, and collects and presents data for supervising the learning process of an organization as a whole (Szabo & Flesher, 2002). A Learning Management System is therefore strategically used to deliver and manage e-learning as well as support an enhanced face-to-face instruction both for organisational training and institutional teaching and learning activities. Learning Management Systems are now available on a number of platforms. Cloud-based LMS, open source LMS and commercial LMS are now available widely for most types of educational and training support. However, the user interface, learning content support and learner management support features differ on the LMS offered on this multi platforms.

Theoretically, a LMS can enable highly interactive and personalized learner-centric online learning experiences, but as with any other technology, the positive or negative impact of the LMS depends on many factors grounded in online instruction, learning contents provided and the learner support feature that the LMS can offer. It is critical to identify how a LMS can be used to meet current learners’ needs, how it can facilitate learning and teaching and what type of learning contents supported by the LMS that is best suited to create an engaging learning experience for the learner. It is therefore the aim of this training programme to provide participants with a good grounding on the main considerations in implementing a sound LMS in their respective institutions with the development of appropriate learning contents as well as acquire the relevant skills to administer and manage students’ access on their LMS.
OBJECTIVES

The main objective of this course is to equip participants with relevant knowledge, skills and attitudes to use learning managements systems effectively for teaching and learning in the 21st century.

At the end of the course, participants should be able to:
1. Differentiate the types and features of LMS on different platform of implementation (multi-platform);
2. Identify the levels of ICT integration in the learning environment of institution in SEAMEO member countries represented in the course.
3. Identify and distinguish the different types of learning content that can be hosted on a LMS and the tools that can be used to manage such contents;
4. Apply appropriate pedagogical approaches in formulating learning contents to be hosted on the LMS.
5. Apply latest ICT tools and applications to develop learning contents for the LMS; and
6. Manage and administer a course on a selected LMS platform.

CONTENTS

1. Introduction to Learning Management Systems (LMS)
   Topics to be covered in this section would include the definition of learning management systems, the history and influence of learning management systems, the various available LMS today with their respective unique features that is available on cloud services, open source implementations and proprietary commercial LMS. Participant need to formulate their own decision criteria later, on which type of LMS will suit their need, best.

   Participants will present country reports focusing on the Status of ICT penetration in education in their respective country, status of LMS application in their respective organisation, major issues, challenges, and future directions in the use of Learning Management Systems in delivering courses in their organisations.

3. Technology underlying LMS and operational requirements
   Topics in this section will focus on the Operating Platform, Operating System requirements, LMS implementation requirements and the procedure for implementing and operating a LMS using open source software and cloud based services on the Internet.

4. Learning Content Formats and ICT tools for content development
   Formats currently being supported by available LMS running on the Internet will be sampled and participants in this session will need to familiarise themselves with the common formats used in delivering text based notes, graphical illustrations, audio and video lectures. The anatomy of each content type will be studied and appropriate software will be identified for their development in the project that they will be engaged in this course.

5. Supporting Pedagogy and Content Development Strategy
   Developing learning contents requires participant to appreciate the learning styles of the 21st century students and the pedagogy that need to be applied in developing multimedia contents that provides a rich and an engaging learning experience to learners. Sessions under this topic will review the learning styles of learners; the approach in integrating Technology, Pedagogy and Content Knowledge (TPACK)
in teaching and learning; the related pedagogical theories; and the multimedia developing strategies that need to be considered in preparing learning contents for LMS.

6. **LMS familiarisation using Open Source LMS and Cloud based LMS services.**
Participants will be exposed to the main features of LMS that is common on most LMS and additional focus will be made on features that will be available on Open Source LMS that are usually most commonly used by institutions around the world.

7. **LMS Content Development Project**
Participants are required to work in groups to prepare a sample course for hosting on a LMS. The richness of content supported by sound pedagogical approach to create an engaging learning experience for learners will be the focus of this project.

**EXPECTED OUTPUT**

At the end of the course, participants should be able to
1. discuss the operational requirements for implementing learning management systems using Open Source Software and Cloud Based services in the context of teaching and learning
2. apply practical technological and pedagogical skills in developing learning content to be integrated into learning management systems for teaching and learning
3. host a sample course on either a cloud based LMS or an Open Source LMS.

**TARGET PARTICIPANTS**

The target participants will be education practitioners or practitioners from various TVET and General education institutions.

**DELIVERY METHOD**

The training will be delivered using various approaches or techniques of deliveries that include short lectures, demonstrations, discussions, hands-on activities, small project and presentations from participants.

**COURSE REQUIREMENTS**

1. Scholarship participants are required to submit a country paper describing the following information:
   a) Description of current educational setting, trends and issues or problems in his/her country.
   b) Status of ICT penetration in education in their respective country
   c) status of LMS application in their respective organisation
   d) Major issues, challenges, and future directions in the use of Learning Management Systems in delivering courses in their organisations (if already using, otherwise discuss possible challenges in initiating such activity in their organisation)
2. All participants should also bring along a Notebook computer each that runs the WINDOWS operating system with at least the following configuration:
   a) WINDOWS 7/8/10 (minimum is 7)
   b) Minimum 1 GB RAM on board.
   c) Participants must also bring along a set of Audio Headphones with microphones to be connected to the computer (see picture)
   d) Teachers/ Instructor are required to bring along sample lesson contents in their area of teaching for reference in preparing the learning resources.

3. They are also requested to bring one (1) pair of sportswear in case of outdoor activity and one (1) pair of national dress of their own country to be used during the fellowship dinner and cultural night.

4. Maximum age of 50, for women is not currently pregnant, physically and medically fit to travel, and must comply with other requirements stipulated in the Training Nomination Form.

REFERENCES


