

Seamless Learning Experiences

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Abstract. This paper proposes a scientific workshop on seamless learning experiences to be held in conjunction with the 13th World Conference on Mobile and Contextual Learning (mLearn 2014) in Istanbul, Turkey. The workshop intends to provide a panel to present and discuss current research activities related to the topic. Furthermore the idea is to establish a common ground and foster joint collaborations for future research in this domain.

Keywords: seamless learning; learning experience; mobile and ubiquitous computing; research; design; evaluation; workshop.

1 Introduction

This paper proposes a scientific workshop on seamless learning experiences to be held in conjunction with the 13th World Conference on Mobile and Contextual Learning (mLearn 2014) in Istanbul, Turkey.

1.1 Background

Seamless learning was first defined as a learning style where a learner can learn in a variety of scenarios and in which they can switch from one scenario or context to another easily and quickly, with the personal device as a mediator [1]. Succeeding, Wong et al. [2] identified 10 gaps in seamless learning support:

1. Encompassing formal and informal learning;
2. Encompassing personalized and social learning;
3. Across time;
4. Across locations;
5. Ubiquitous knowledge access;
6. Encompassing physical and digital worlds;
7. Combined use of multiple device types;
8. Seamless switching between multiple learning tasks;
9. Knowledge synthesis;
10. Encompassing multiple pedagogical or learning activity models.

Lately, a learner-centric view of mobile seamless learning [3] suggests that a seamless learner should be able to explore, identify and seize boundless latent opportunities that his daily living spaces may offer to him (mediated by technology), rather than always being inhibited by externally-defined learning goals and resources. Hence, technology plays an important role supporting the learner in thi

1.2 Theme and objectives

The relevance of this topic in the field of technology-enhanced learning has increased in the last years resulting in special issues [4, 5], special tracks in key conferences [6] and relevant publications [7][8]. Recent research activities focused on addressing the 10 seams to enable seamless learning. In this context the workshop will provide a panel to present and discuss these activities. Furthermore the idea is to establish a common ground and foster joint collaborations for future research and publications on seamless learning.

2 Topics and contribution

The workshop encourages submissions reporting and/or demonstrating research activities that try to enable seamless learning experiences using current and emerging technologies. Possible research topics include but are not limited to:

- Mobile and ubiquitous learning support,
- Interaction/interface design and usability,
- Standards and interoperability,
- Innovative approaches to learning, and
- Instructional designs and orchestration

Within the scope of these topics, potential mobile and ubiquitous technologies to facilitate seamless learning experiences include but are not limited to:

- Wearable and sensor technologies
- Tangible and embodied interaction
- Augmented and mixed reality applications
- Ubiquitous and ambient learning technology
- Smart objects and Internet of Things

2.1 Participants

We expect participants with an educational or technical background working in the field of mobile and contextual learning. We will encourage researches, practitioners, developers, as well as other interested stakeholders to contribute and participate.

3 Organisation

3.1 Format and dissemination

Once accepted, we plan to send out a call for participation and contribution to several dissemination channels. Interested participants will be invited to submit abstracts of original work they would like to present during the workshop. The following types of contributions will be possible:

- Demonstration abstracts that describe concepts, prototypes and work in progress, even when in very early and not yet mature state.
- Research abstracts that state the position of the authors within the scope of the workshop and describe respective research activities.

During the first part of the workshop participants who submitted an abstract will get a chance to present their work. Thereby, we especially encourage the presentation of work by giving a live demonstration to provoke true hands-on interactions and discussions with the workshop audience. We intend to published the contributions online (e.g. in CEUR Workshop Proceedings) or if possible as part of the conference proceedings in an edited volume of the Communications in Computer and Information Science (CCIS) series with Springer.

The second part of the workshop then aims to foster discussion on potential uses of the presented prototypes for learning. This part will be organized in a JIGSAW session where different groups will reflect on potential seamless learning experiences that would cover the ten seams using seamless technology. As a result of this session, participants will be invited to extend the conclusions of the workshop in a joined publication.

3.2 Requirements

Depending on the number of submissions we expect to organize a half-day workshop, including the presentations as well as group discussions and other activities.

For the presentation we need at least one Internet-connected computer with attached projector. For the following discussions we need a stable Internet connection for all participants as well as a flipchart and/or whiteboard to take notes.

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