

## SPECIAL ISSUE

# The mobility of lifelong learners and IT

## Introduction

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With increasing globalization, businesses are looking for excellent graduates with international experience and for lifelong learners with appropriate work experience and state-of-the-art knowledge and skills (Mintzberg, 2004; Van der Wende, 2003). Many students are now studying abroad to acquire international experience and increase their attractiveness to international companies. In Europe, the number of students studying abroad at a higher education institute has increased by 57% over the last eight years, from 327,500 in 1998 to 515,400 in 2006 (Eurostat, undated). At the same time, increasing numbers of professionals are following (part-time) courses and programmes so that they can to keep up to date with new developments in their field (Eurostat, undated; Mintzberg, 2004). In other words, students and professionals alike are extending their learning experience and are becoming 'lifelong learners' (Field, 2000).

Lifelong learning creates greater diversity in the educational levels, professional backgrounds, experience and ages of learners (Field, 2000). Given this increased heterogeneity of enrolments in higher education, it is not surprising that the transitional problems for lifelong learners have become greater. Some institutes are tackling these problems through the provision of bridging, summer or preparatory courses to equip learners with the required knowledge, skills and competences before they begin a study programme. Other HEIs have different strategies for helping people to overcome the barriers to lifelong learning. As the

number of lifelong learners in higher education increases, a logical response is to address their divergent needs by offering education in an online or blended format. Information technology (IT) now includes powerful Web 2.0 tools that can benefit lifelong learners by supporting independent learning and enabling people to learn irrespective of time and location (Resta and Laferrière, 2007). In addition, IT offers powerful tools for learning in collaborative settings, in which learners work and learn together using Wikis, discussion forums or Web videoconferencing (Williams *et al.*, 2006). The interactivity of such online tools and the opportunity to work at one's own pace and time offer great potential for educational innovation.

However, while HEIs are increasingly using IT to support their courses and programmes for lifelong learners, there has been only limited research on effective methods and tools to support the mobility of lifelong learners. In this special issue of *Industry and Higher Education*, which is based on the best papers presented at the S-ICT conference on 19–20 November 2008 ([www.masterproject.info/](http://www.masterproject.info/)) at Maastricht University in The Netherlands, several front-runners in the use of innovative learning tools share their best practices and recent findings on how online tools and education can help people along their lifelong learning paths. The issue is divided into three parts, focusing respectively on preparatory teaching, effective IT tools and professional education.

Part 1 deals with mobility of students confronted with transitional barriers, preparatory education and IT.

More and more institutes are offering online or face-to-face preparatory courses for students who are insufficiently prepared for a Bachelor's or Master's programme. In the first article, therefore, Brants and Struyven provide an overview of the literature on effective online education and the role of the teacher/coach in the context of preparatory education. They identify five success factors: clear incentives and social support; a highly-structured curriculum; adequate staff training and professional development; multiple educational approaches; and the use of real-life applications. The next article, by Brouwer *et al.*, describes the diverging experiences of redesigning basic mathematics courses for students in business and science education. The business students were more positive about the online assessment tool, Maple TA, than were the science students, while the teachers from both business and science departments were pleased with the redesign of the courses.

Part 2 looks at higher education institutes that use innovative tools to enhance the mobility of students. First, Tempelaar, Rienties and Giesbers ascertain the kinds of students who prefer to use the innovative statistics-teaching tool ALEKS (which provides them with learning materials adapted to their own preferences). Students who use the e-learning tool frequently seem to be stepwise learners. In particular, women seem to use the IT tools more often. Then, Durkee *et al.* describe how IT sites frequently used by students, like *Facebook* and *Skype*, can enhance the learning experience in classrooms. By using the Community of Inquiry model (Garrison *et al.*, 2000), the authors find that *Facebook* allows teachers to establish cognitive and social presence. Furthermore, it is very important to take into account the role of the teacher and technical presence when using IT in classroom settings. In the subsequent article, Giesbers *et al.* assess whether learners who use rich synchronous online classroom tools (Web videoconferencing, chat and Whiteboard) are more satisfied with course design and the learning achieved than those who use simple asynchronous tools such as discussion forums. Contrary to expectations, users of the advanced synchronous tools were less satisfied with the online course than users of the more basic tools.

Part 3 deals with the role of IT in mobility of professionals. McLuckie *et al.* describe the learning experiences of professionals participating in a blended learning programme in Scotland and Austria. The participants are able to contact other professionals in an online community while remaining in their workplace. They use tools such as e-portfolios, *Wikis* and discussion forums to keep in contact with their peers and provide feedback on their learning experiences.

Pence and Wulf analyse the use of discussion forums in an MBA Business Ethics class to promote the assimilation of soft intercultural skills in a mixed population of students from low and high context cultures. Their results indicate that participants from low and high context cultures were interchanging experiences and that the method helped the acculturation of soft skills in face-to-face classes, although the authors observe a process of adaptation rather than convergence in the development of the skills. Finally, Rehm examines an e-learning training programme involving 174 managers from 81 offices of a large international organization. The article assesses the extent to which IT tools allow professionals to learn from each other in a Community of Learning despite the barriers of limited communication opportunities, time and cultural differences. In general, the professionals were pleased with the way the online learning environment allowed them to work and learn together. However, the actual workload and the time needed to complete all the required activities were underestimated, and Rehm identifies several factors that should be taken into account in the design of innovative online learning programmes.

We hope that readers will find this selection of papers informative and stimulating, and we would welcome feedback.

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