The IADIS International Conference on Cognition and Exploratory Learning in Digital Age was held in Madrid, Spain, October, 19-21.

The Conference was organized by the International Association for Development of the Information Society (IADIS) and endorsed by the Japanese Society for Information and Systems in Education (JSISE).

Endorsed by:

The CELDA 2012 aimed to address the main issues concerned with evolving learning processes and supporting pedagogies and applications in the digital age. There had been advances in both cognitive psychology and computing that have affected the educational arena. The convergence of these two disciplines is increasing at a fast pace and affecting academia and professional practice in many ways. Paradigms such as just-in-time learning, constructivism, student-centered learning and collaborative approaches have emerged and are being supported by technological advancements such as simulations, virtual reality and multi-agents systems. These developments have created both opportunities and areas of serious concerns. The conference intention was to cover both technological as well as pedagogical issues related to these developments.

The main tracks for submissions were: Acquisition of expertise, Assessing progress of learning in complex domains, Assessment of exploratory learning approaches, Assessment of exploratory technologies, Cognition in education, Collaborative learning, Educational psychology, Exploratory technologies (such as simulations, VR, i-TV and so on), Just-in-time and Learning-on-Demand, Learner Communities and Peer-Support, Learning Communities & Web Service Technologies, Pedagogical Issues Related with Learning Objects, Learning Paradigms in Academia, Learning Paradigms in Corporate Sector, Life-long Learning, Student-Centered Learning, Technology and mental models, Technology, learning and expertise and Virtual University.

The Conference received 98 submissions from more than 24 countries. Each submission was reviewed in a double-blind review process by at least two independent reviewers to ensure quality and maintain high standards. Out of the papers submitted, 29 were accepted as full papers for an acceptance rate of 30%; 17 were accepted as short papers and 3 were accepted as reflection papers.
Authors of the best published papers in the CELDA 2012 proceedings were invited to publish extended versions of their papers in:

- A book from Springer
  
  **Digital Systems for Open Access to Formal and Informal Learning**  
  Hardcover, ISBN 978-3-319-02263-5  
  eBook, ISBN 978-3-319-02264-2

- A special issue of Computers in Human Behavior  
  (an Elsevier journal, ISSN: 0747-5632)

In addition to the presentation of full papers, short papers and reflection papers, the conference also featured a keynote presentation.

**Keynote Presentation:**

"THE THREE LEARNING SCIENCES (BIOLOGICAL, ARTIFICIAL, HUMAN)"

by Professor Norbert M. Seel, Department of Educational Science, University of Freiburg, Germany


**Program Committee Members:**

Ah-choo Koo, Multimedia University, Malaysia  
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