E. Martín-Monje, I. Elorza & B. García Riaza (Eds.). (2016). *Technology-enhanced language learning for specialized domains: Practical applications and mobility*. London/New York: Routledge. ISBN 978-1-138-1204-3, xxi+285 pp.

## Reviewed by Silvia Molina Plaza (Universidad Politécnica de Madrid)

Educational technology is not new. Its initial development began at the early 1970s (Reiser, 2001, p. 59) and since then it has changed deeply. It nowadays involves e-learning, instructional technology, information and communication technology (ICT) in education, multimedia learning, technology-enhanced learning (TEL), computer-based instruction (CBI), computer-based training (CBT), computer-assisted instruction or computer-aided instruction (CAI), internet-based training (IBT), flexible learning, web-based training (WBT), etc. These technologies help teachers working with learners. As regards language learners, it is also obvious that ICT in its different forms is very much part of language learning throughout the world and its effects include several changes in methodologies, one of the most significant ones among them "the co-construction and sharing of knowledge, with the concept of 'collective intelligence' becoming central" (Arnó, 2014, p. 14). There has also been a gradual change in the degree of dependency of students on their teachers along their individual learning processes by fostering learner autonomy.

The work here reviewed begins with a foreword by Josefz Colpaert, editor of *Computer-Assisted Language Learning* (Taylor and Francis), in which he recognizes the publication of this book as focusing on "how to better serve specific needs of adult learners in specialized linguistic domains" (p. xvii), and an introduction by the editors (pp. 1–6), which offers a general overview of the key issues covered by the different chapters in the book. The editors present a collection of mostly empirical studies from different, but quite often complementary, theoretical and methodological perspectives, including a representative sampling of technological applications. The book is organized into six sections, each consisting of four or three articles, amounting to twenty contributions in all (pp. 9–276). An afterword and an index complete the volume (pp. 277–285).

The volume proper begins with an introduction by the editors. They trace the changes in the development and evolution of applications of Information and Communication Technologies to English Language Education. The issues treated range from most general aspects to the cutting-edge practical applications of different technologies in specific and learning contexts. As already mentioned, the book

is neatly divided into six sections: (1) General issues about learning languages with computers; (2) Languages and technology-enhanced assessment; (3) Mobile – assisted language learning; (4) Language Massive Open Online Courses; (5) Corpusbased approaches to specialized linguistic domains; and (6) Computer-assisted translated tools for language learning. There is a minor mistake in the ordering of papers in part three on page 4 when they are described in the introduction as it does not coincide with the index but this is a slight flaw in an otherwise rigorous analysis of practical applications for language learning in Specialized Domains.

Part I entitled "General issues about learning languages with computers" opens with a paper by Mark Pegrum, "Languages and literacies for digital lives" who reflects upon the globalized world of digital literacies, which are considered as crucial elements for students to effectively acquire operative communication skills nowadays. The merits of key literacies (language, information and connection-related plus redesign) are well explained but definite conclusions on their successful and practical implementation seem difficult to draw, though it is stated that effective language use is dependent on digital literacy skills (p. 19). In the second paper "Promoting intercultural competence in culture and language studies" by Margarita Vinagre, the author presents the convincing findings of a three-month wiki collaborative project between twenty undergraduate students of British Civilization and Culture at a Spanish University and ten undergraduate students of Spanish at a British University for a period of eight weeks. The activities fostered the development of intercultural competence in both groups. In the third paper, "Return on investment: The future of evidence-based research on ICT-enhanced business English", Antonio J. Jiménez-Muñoz looks at the necessary aspects to develop sound evidence-based research in Business English at tertiary level. The author hits the nail on the head when he suggests the adoption of a qualitative framework in combination with quantitative methods for language description and evaluation (p. 39). This part finishes with M. Ángeles Escobar's "L2 English learning and performance through online activities: a case study". The author presents a case study of L2 English acquisition by adult learners throughout a series of online activities using a task-oriented approach. The methodology is adequately explained but the quantitative results in the grammar section pose questions for the reader as Escobar does not delve deeper into the possible reasons for different outcomes: why prepositions and connectors are easier than verbs or error analysis (p. 54) and why students obtain better results when they participate in online tasks (p. 56).

Part 2, "Languages and technology-enhanced assessment", consists of four papers. The first paper, by Miguel Fernández Álvarez, is entitled "Language testing in the digital era". The author looks into the history and evolution of Computer-Assisted Language Testing (CALT) as a field and presents the advantages and

drawbacks associated with it. He also explores the future of technology-enhanced language testing. Although there are many references, little personal opinion is adduced. Next comes Vicente Beltrán's contribution "Synchronous computermediated communication in ILP research: a study based on the ESP context". The author focuses on the performance of the speech act of advice by means of interactive discourse completion tasks and tests and retrospective verbal reports, also known as IDCTS and RVRs in the area of Psychology. The conclusion (p. 82) is consonant with the aim of "examining participants' pragmatic knowledge in IDCTS ... and issues of task design by means of RVRs". The third paper by Elena Domínguez, Isabel de Armas and Ana Fernández-Pampillón entitled "the COdA scoring rubric: an attempt to facilitate assessment in the field of digital educational materials in higher education" looks into the COdA tool for the evaluation of digital educational materials at University level and the development process behind its scoring rubric. Part 2 is brought to a close by Antonio Pareja-Lora's "Enabling automatic, technology-enhanced assessment in language e-learning: using ontologies and linguistic annotation merge to improve accuracy". This contributor shows an annotation architecture and methodology with a prototype that he has built in order to reduce the rate of errors on Part of Speech Tagging. This is a very sound paper with a well-chosen example and a fair exposition of the benefits of the Onto Tagger prototype.

Part 3, "Mobile - assisted language learning", comprises three papers. The first paper by Joshua Underwood "Challenges and opportunities in enacting MALL designs for LSP" examines designs for Mobile-Assisted Language Learning (MALL), adequate for learning language for Specialized Domains and critically identifies challenges in delivering these MALL designs to better support vocabulary learning. The second paper "Designer learning: the teacher as designer of mobile-based classroom learning experiences" by Nick Hockly reports on a small-scale classroom-based action research project involving two different levels of international English as a Foreign Language students in the UK. A criticism that could be levelled at this paper is the low representativeness of the sample. The third paper "Mobile and massive language learning" by Timothy Read, Elena Bárcena and Agnes Kukulska-Hulme is devoted to mobile devices, which are especially potent tools for students in Language Massive Open Online Courses because they complement the learning experience as they provide basically three affordances: portable course clients, mobile sensor-enabled devices, and powerful small handheld computers.

Part 4, "Language massive open online courses", consists of three papers. The first is entitled "Academic writing in MOOC environments: challenges and rewards" by Maggie Sokolik. She describes the outcomes from an ongoing academic writing Massive Open Online Course (MOOC) taught through the University of California, Berkeley and edX.org, outlining suggestions for the teaching of writing. She summarizes very well the pressing challenges involved in Academic Writing within a MOOC environment, namely, methods of content delivery, limitations of discussion forums, methods of assessment, plagiarism, and attrition (p. 172) but she also ends up with a positive note highlighting its benefits, such as the possibility to build communities of discourse, the access to courses and colleagues not locally available (p. 174). The second paper by Fernando Rubio, Carolin Fuchs and Edward Dixon, "Language MOOCs: better by design", provides useful practical recommendations for designers and teachers on how to take advantage of the affordances of the massive online medium with plenty of references, arguing that language MOOCs would benefit from combining some of the features of the connectivist and instructivist approaches for language learning. The third paper co-authored by Elena Martín-Monje and Patricia Ventura "Enhancing specialized vocabulary through social learning in language MOOCs" provides a thorough overview of the possibilities that LMOOCs can offer for specialized language learning and the acquisition of specialized vocabulary. The authors place special emphasis on the use of social learning through Web 2.0 tools such as Facebook. They also give their personal opinion related to issues of technology-enhanced language learning and potential problems in the acquisition of specialized vocabulary. They present the second edition of "Professional English" LMOOC as empirical proof of the progress made in this field.

Part 5, "Corpus-based approaches to specialized linguistic domains", also contains three papers. The first is called "Corpus-based teaching in LSP" by Tony Berber Sardinha. He gives an excellent and well-documented overview on how corpus linguistics can be explored in the Language for Specialized Domains classroom, with examples from two corpora: commercial aviation maintenance manuals and research papers. The second paper by Mario Carranza, Transcription and annotation of non-native spoken corpora", is devoted to the process of transcribing and annotating spontaneous non-native spoken corpora for the empirical study of L2 pronunciation acquisition and the development of computer-assisted pronunciation training applications, one of the main stumbling blocks for Spanish learners of English. The third paper by María del Mar Sánchez and Francisco J. Vigier, "Using monolingual virtual corpora in public service legal translator training", presents the use of monolingual virtual corpora in public service legal translator training. The authors argue that corpus management tools can be used to help trainees acquire relevant expertise in this legal language domain but very few examples are adduced to prove this point more thoroughly.

Last but not least, Part 6, "Computer-assisted translated tools for language learning", has three papers. The first is called "Computer-assisted translation tools as tools for language learning" by María Fernández-Parra. She explores SDL Trados

Studio 2011 tools widely used in UK Universities and includes several examples of collocations on page 251 which can be used as additional language learning tools. The second paper, "Applying corpora-based translation studies to the classroom: languages for specific purposes acquisition", by Monserrat Bermúdez, focuses on the use of corpora in translation studies and this collection's final chapter, "VISP: a MALL-based app using audio description techniques to improve B1 EFL students' oral competence", co-authored by Ana Ibáñez and Anna Vermeulen, gives empirical evidence on how a MALL-based app can improve students' oral competence.

Overall, the book accomplishes with success the editors' initial goals. It provides an invaluable source of information on different facets of technology-enhanced language learning for specialized domains: assessment, mobile-assisted language learning (MALL), language massive open online courses (LMOOCs), corpus methodology and translation. All these aspects are considered with a clear pedagogical vocation shown in a myriad of practical examples. All in all, this book constitutes a very welcome addition to the extant literature in Technology-Enhanced Language Learning in the field of specialized domains for scholars interested in conducting research in the field. But it is of equal value for teachers and educators. The editors have done an excellent job out of selecting updated and well-structured range of papers and it is therefore highly recommendable to both research and teaching professionals.

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## Biographical notes

Silvia Molina Plaza obtained a position as tenured Senior Lecturer (Associate Professor) at the University of Castilla-La Mancha. She obtained another tenured Senior Lecturer position at the Technical University of Madrid, where she is currently teaching at the Department of Applied Linguistics to Science and Technology. Her research has focused on the translation from English into to Spanish, contrastive analysis (modality and collocations), Pragmatics and Discourse Analysis applied to ESP in numerous book chapters, articles, papers and has attended several national and international Conferences. She has been the leader of four regional and one national project related to contrastive phraseology, and has participated in seven R & D Projects.