Five Keys from the Past to the Future of CALL

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ABSTRACT

Current trends in CALL such as mobile learning, gamification, and use of social media appear to represent major shifts in the digital language learning landscape. However, these and other applications of technology to mediate language learning may be informed by reflecting not only on the present but perhaps more importantly on relevant insights from past research and practice. This article draws on selected studies and the author’s experience to lay out five key lessons learned over more than three decades in CALL. These lessons involve understanding: 1) the cycle of technology adoption; 2) the dimensions of technology mediation in the language learning process; 3) the promise and limitations of CALL research; 4) the critical importance of teacher education and professional development in an age of continuous change; and 5) the need for learner training for effective technology use. Teachers, researchers, and developers alike are encouraged to reflect on these lessons as they create and seek to control the technologies, tasks, and activities of the future.

KEYWORDS

Affordances, CALL, Developers, Hype Cycle, Learner Training, Principles, Research, Teacher Education, Teachers, Technology Mediation

INTRODUCTION

Although computers have been used to support language learning since the 1960s, what we think of as CALL (computer-assisted language learning) began in the early 1980s with the proliferation of what were then called “microcomputers”, such as the Apple II, the IBM PC, and the BBC computer. It was at this time (1983-84) that the first professional organizations devoted to CALL were founded: CALICO (https://calico.org/), TESOL’s CALL Interest Section (https://www.call-is.org/WP/), and IATEFL’s MUESLI (Micro Users in ESL Institutions), the precursor of the Learning Technologies SIG (https://ltsig.iatefl.org/). The members of these early groups were typically language professors and instructors who were excited by the prospect of what these new machines could do for them and their students. A number of them were “teacher-programmers”, who devoted their spare time to creating and often programming exercises from scratch for their students and others to use. The author was one of those, writing his first Apple II programs to support reading and vocabulary development in 1983 and joining both CALICO and the TESOL CALL-IS the following year. Even then, the need to recognize both the affordances and limitations of technology was understood by some. Clifford (1987), for example, famously claimed “while computers will not replace teachers, teachers who use computers will eventually replace teachers who don’t” (p. 13).

Here we are decades later, and the computer we carry in our purse or pocket and call a smart phone is hundreds of times more powerful than the best of the early desktop ones. It is easy to imagine little or no connection between these modern devices and their predecessors. All too often, it seems,
developers, researchers, and teachers have looked only at the present “leading edge” of emerging technologies, expecting the future to be qualitatively different from the past. The remainder of this paper, based on the author’s keynote address given at the 2018 GLoCALL/ChinaCALL conference in Suzhou, China, aims to challenge that notion. Specifically, it discusses the following five key lessons learned about CALL since the 1980s that remain relevant today and likely will be tomorrow as well.

1) New technologies in CALL, like those in other fields, typically follow an adoption cycle where their value is greatly overestimated at first. This leads to a lot of time spent on speculation, research, and development before the affordances and constraints are sufficiently understood.

2) Technology does not do much by itself that is of value to learning languages. Rather, it serves as a mediator between learners and other actors or language resources, like texts or videos. This mediation works in limited but powerful ways in different domains that in many ways have not changed substantially in the past 25 years.

3) Almost 40 years of theory and research in CALL have brought us mixed results. Research must be interpreted, not just simply adopted—or dismissed—uncritically. Those working in CALL should understand not only the importance of research results but also their limitations.

4) Teachers need to be educated to develop their technological and pedagogical knowledge and skills. A crucial part of early training is preparation for a professional life involving constant technological change.

5) Learners similarly need training to use both familiar and new technology effectively in pursuit of their language learning objectives.

The remainder of this paper discusses these five keys in sequence, highlighting lessons learned for each.

THE CYCLE OF TECHNOLOGY ADOPTION

Whenever a new technology appears that looks like it may have some relevance for language teaching and learning, there is an immediate interest by teachers, researchers and developers. The potential for “revolutionizing” language learning is touted, along with predictions of how important it is to invest time and resources in said technology. Early examples included television and language labs as devices that would bring language to the masses. In the digital age, we have seen interactive laserdiscs, multimedia, computer-mediated communication, the Web, virtual worlds, and MOOCs all presented as solutions to the problem of language learning.

The notion is captured famously in the “Gartner Hype Cycle”, which states that emerging technologies tend to follow a predictable path over two to ten or more years. A technology is announced publicly and is then followed by a time of inflated expectations as to its value to revolutionize or disrupt a sector (such as education). These expectations reach a peak and, when unmet, lead the technology to fall into the “trough of disillusionment”, where interest in the prospects of the technology wanes. Often years are needed to explore, understand, and develop the technology so that it can reach a productive level (though typically way below the original hipped claims for it). For a relatively current example, see https://www.gartner.com/smarterwithgartner/5-trends-emerge-in-gartner-hype-cycle-for-emerging-technologies-2018/ for a report on the emerging technology trends in 2018 and their locations along the predicted paths.

There is a string of technologies for language learning over the past decades that have been hyped and then failed to live up to their promise. Some of these have disappeared entirely while others have gradually been found to be valuable when harnessed appropriately. A recent example is virtual worlds, in particular, Second Life (https://secondlife.com). At the 2007 CALICO Conference in San Marcos, there was just one talk that addressed the potential of Second Life. At the 2008 CALICO Conference
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