TECHNOLOGY-ENHANCED TEACHING: A REVOLUTIONARY APPROACH TO TEACHING ENGLISH AS A FOREIGN LANGUAGE

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Abstract: The online course offerings have grown exponentially globally since the turn of the 21st century – be they as a primary mode of instruction or as a supplement to traditional face-to-face classroom instruction, and this phenomenon is most noticeable in higher education. More recently, the new technology has also been integrated into the English as a Foreign Language, henceforth called EFL, classrooms. This article argues that the notion of technology-enhanced language learning is not just an intriguing idea – it is a necessity, for it has a great potential to offer in facilitating the development of English language proficiency of EFL learners through computer-mediated communication. Additionally, it contends that the new technology can potentially address most, if not all, of the shortcomings inherent to the EFL classroom including, but not limited to, lack of exposure to the target language, lack of practice, and lack of learning resources. Theoretical implications of technology-enhanced language teaching and learning will also be explored.

Keywords: Technology Enhanced Language Teaching, TELL

Amongst the main goals of the English language teaching, particularly as far as the EFL classrooms are concerned, is enabling EFL learners to communicate in the target language in real-world situations (Oxford, 1990). In other words, EFL learners are expected to be proficient language users. However, in most cases, language learning environment does not always provide EFL learners

with real and natural settings critical to the development of English language proficiency.

Cziko (2005) identifies a number of limitations associated with EFL classrooms. These include limited exposure to the target language, limited opportunities to use the target language, exposure to inaccurate forms or expressions produced by both fellow students and the teacher, limited opportunities for authentic communication, and limited language ability and cultural knowledge of EFL teachers. Additionally, it is not uncommon for EFL learners to learn or acquire English language skills in a decontextualised way. At the end, only minimal learning can occur, if at all. Therefore, an alternative needs to be urgently sought for if we are to compensate for the aforementioned shortcomings.

This article argues that integrating technology¹ into the EFL classroom may help address the above limitations by providing EFL learners ample opportunities to be exposed to the target language in a more authentic and contextualized way and, at the same time, to afford them opportunities to use the target language for real life purposes (Wiburg & Butler-Pascoe, 2002). Additionally, it is argued that technology enhanced language learning (hereafter 'TELL') enables EFL learners to have access to authentic and abundant EFL materials on the Net and, most importantly, to 'meet' native English speakers from different parts of the globe. Needless to say, this experience may not be available in most conventional face-to-face classroom environments.

Simply put, if designed and implemented properly, TELL may serve as an amicable language learning environment which could provide solutions to most, if not all, of the predicaments facing conventional face-to-face EFL classroom environments mentioned earlier. It is becoming apparent throughout the discussion that TELL is quite a revolutionary approach in English language teaching, one that requires a fundamental shift in terms of the roles of the teacher, the students, and the institution. However, such endeavours are worth pursuing.

I will begin by touching on the impetus for TELL where the relevance of contemporary learning theories to TELL will also be examined. I will subse-

¹ Whereas the term 'technology' in the EFL classroom may include cassettes tapes, videos, TVs, etc., the term has been commonly used in the literature to refer to the Internet and all its facets. The latter definition is employed in this article.

quently discuss the potential benefits and drawbacks of this type of education in light of current empirical evidence in the field. Finally, I will provide an example of how technology can be integrated into the EFL classroom to overcome limitations identified earlier.

THE IMPETUS FOR TELL

The past decade has seen a monumental paradigmatic shift in foreign language teaching practices across the globe (Spodark, 2001). The impetus for this change is attributed primarily to three major factors. First, as mentioned earlier, there are inherent limitations associated with EFL teachers, learning resources, and learning environments, all of which are detrimental to student learning. Second, the advancement in computer technologies, especially the Internet and all its facets, significantly impinges on how foreign language skills are acquired and learned. Third, a shift in language learning theories places an increasingly strong emphasis on social interaction and a more open, rather than a highly guided learning environment. Two predominant theories prevail in the field – sociocultural constructivism and second language acquisition theories.

TELL lends itself to instruction based on the principles of constructivism and second language acquisition theories. As far as constructivism is concerned, use of synchronous and asynchronous communication enables social interaction, which is central to meaning construction. It is not surprising that TELL has been referred to as a vehicle for constructivist approaches in language classrooms (Felix, 2002). From the standpoint of the second language acquisition theory, social interaction using both communication modes enables EFL learners to experience comprehensible input (Krashen, 1985) and negative evidence (Long, 1996) and, at the same time, to experiment with their comprehensible output (Swain, 1995). Thus, use of the new technologies in the realm of EFL teaching and learning is grounded on, and is innately compatible with, contemporary learning theories.

THE CASE FOR TELL

As mentioned earlier, lack of exposure to the target language, lack of opportunities to practice language skills learned, and, in some cases, lack of learning resources are amongst lingering concerns in the EFL classroom. This phenomenon is noticeable at all levels of education from primary to tertiary educa-

tion. Owing to these conditions, it is extremely difficult, if not impossible, for EFL learners to achieve good English language proficiency, albeit having learned the language for almost a decade or so. Despite this, EFL teachers perpetuate doing what they have always done simply because limited alternatives are available.

The advent of the Internet and the World Wide Web offers a turning point in English language teaching and learning, for the new technology appears to hold great potential (Fukushima, 2006; Zhao, 2003). Thus, TELL is especially germane to the discussion of foreign language teaching and learning. TELL has been promulgated by the adherents of this type of education, for current empirical evidence suggests that it offers quality learning. Amid the staggering growth of the new learning environment, research studies have been conducted quite extensively over the past decade to scrutinise how to make effective use of this new technology. In the mean time, TELL continues to grow at an almost exponential rate. This is particularly true as far as tertiary education is concerned. Clearly, the burgeoning and unprecedented growth of this type of education is bound to affect all areas of foreign language teaching and learning. It is not surprising that both researchers and language teachers across the globe have shown a concomitant interest in various aspects of online delivery.

Today, the Internet is not just confined to developed countries; it has also become ubiquitous in less-developed ones. Given the ubiquity of TELL, its true effectiveness should be comprehensively vetted and scrutinized, and research studies have responded to such a need (e.g. Alberth, 2009). Although there are anomalies in research findings, the overwhelming majority of these studies lead to the conclusion that TELL holds great potential for language teaching and learning. Some of these studies have also examined the potential benefits and drawbacks of the new learning environment.

Amongst the major benefits of the new technology is serving as a means to connect EFL learners with native speakers of the target language. In this case, the technology plays a pivotal role in creating opportunities for EFL learners to communicate with native English speakers through both synchronous and asynchronous communication. With synchronous communication, such as chat room features and asynchronous communication like bulletin boards, for example, EFL learners can conceivably engage in communication with native English speakers from different parts of the globe in a variety of authentic communicative settings. Through computer-mediated communication with native speakers, meaningful communication and real negotiation of meaning can take place. Also, during this process, EFL learners can engage in meaningful language practice, paving the way for language acquisition and language learning. Thus, TELL could potentially compensate for the decontextualised predicament of English language teaching and learning inherent in EFL classrooms.

Research evidence suggests that engaging EFL learners in authentic communication with native speakers constitutes an essential condition for successful foreign language learning. In fact, language acquisition occurs especially felicitously when the learner is engaged in a dynamic interaction with native speakers. Through social interaction with native interlocutors, EFL learners can be exposed to, learn, and use the target language to negotiate meaning for real life purposes in a more authentic way. The fact that the Internet enables EFL learners to interact with native English speakers using both synchronous and asynchronous communication suggests that the new technology offers amicable environments for language acquisition and language learning.

From the standpoint of second language acquisition theory, comprehensible input and negative evidence are critical to both language acquisition and language learning. However, meaningful comprehensible input and negative evidence will only be available if (a) learners engage in authentic communication with native or near-native speakers, and (b) sufficient time is provided for such interaction. Through social interaction with native speakers, EFL learners are exposed to new expressions used in an authentic situation for an authentic purpose. By interacting with native speakers in the process of negotiation of meaning, by observing and internalising these inputs, language learning can subsequently take place in an online environment. Additionally, online discussion using both synchronous and asynchronous communication enables EFL learners to experiment with their language to negotiate meaning, thus promoting comprehensible output (Swain, 1995). However, such opportunities are not always available in most, if not all, EFL classrooms. Moreover, in most cases, classrooms are the only place to practice the language skills learned. Unlike the 'brick and wall' classroom, TELL enables EFL learners to engage in social interaction regardless of time and space. In fact, empirical evidence suggests that TELL offers unique benefits not available in conventional face-to-face classrooms (Alberth, 2009) that will now be outlined below.

To begin with, certain students are typically averse to risk and might decide to not participate at all in the exchanges of ideas in a conventional face-toface classroom, and this is especially true for Asian students learning English

as a foreign language (Soo & Ngeow, 1998). These students do not want to be considered fools or 'slow learners' by other students and the teacher as a result of asking silly questions or making irrelevant points. Consequently, they would normally choose to keep quiet to be on the safe side, although they do, in fact, have serious problems understanding course materials. Research studies suggest that students who would be reticent to contribute in a face-to-face classroom are just as likely to participate in online discussion using both synchronous and asynchronous communication (Alberth, 2009; Sweeney, O'Donoghue, & Whitehead, 2004). In other words, in a conventional classroom, students normally participate with some trepidation and voicing opinions in this learning environment may be too cumbersome and daunting for some students. This does not appear to be the case in the TELL environment².

Freiermuth (2001) reported that learners participated more frequently in online than in face-to-face discussion and that they were more comfortable and less anxious in doing this. The author further argued that social interaction in a face-to-face classroom is generally constrained by 'cultural and social norms', which could be detrimental to student participation. These barriers to participation, however, seem to be minimal in an online learning environment (Jarrel, 2005). Therefore, student participation in this learning environment tends to be more evenly distributed compared to that in a conventional classroom. In other words, an online learning environment appears to have an "equalising effect" (Jepson, 2005) and be less threatening as far as student participation is concerned. The fact that students find online participation less threatening may be attributed to the perceived decrease in the effect of the abovementioned barriers in this virtual environment.

Additionally, unlike face-to-face classroom discussion where participation is constrained by turn-taking, in an online learning environment the entire class could simultaneously contribute to the discussion (Freiermuth, 2001). Similarly, discussion in a face-to-face classroom is, in most cases, focused on a given topic at a particular time. Even during a small group discussion, for example, students would normally discuss only one particular topic and they have to wait their turn to talk. In online discussion, however, students are able to discuss several topics where every student can voice their opinions simultaneously

² I am not contemplating that online session will wholly replace face-to-face contact with the teacher. Instead, I argue that such a delivery mode can be used as an accompaniment to face-to-face sessions to compensate for the limitations in conventional classroom as discussed previously.

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(Doughty & Long, 2003). In a forum, for example, students can flexibly choose which topic(s) of discussion they are interested in joining. They could even participate in a multiple-topic discussion. Thus, at least in this sense, an online learning environment is more democratic in terms of enabling the students to choose a discussion topic for themselves. This may be among the reasons why students feel more comfortable in participating in online discussion, as reported above. The growing popularity of online learning is arguably attributable partially to the fact that it offers flexibility.

In the EFL context, amongst the major benefits provided by the Internet is the abundant authentic EFL materials with a vast array of genres and discourse styles, all of which can serve as crucial sources of comprehensible input. Perhaps it is safe to assume that the Web is the biggest library in terms of the amount of information provided. Not only does it provide extremely rich information, but it also enables users to find such information in an instant by means of powerful search engines, thus saving a lot of searching time. Additionally, the abundant information on the Web enables students to choose the kind of information that best suits their own level of understanding. In this case, students need to evaluate information on the Web for themselves, rather than relying on the teacher to make a decision for them. This, on its own, is an important learning process, since it involves critical thinking and analysis.

Through computer-mediated communication, EFL learners can practice their listening, speaking, reading, grammar, and writing integratively in realworld situations. The Internet also requires that students be more independent in their learning, thus fostering autonomous learning. However, since not all students are self-regulated in their learning, scaffolding should be provided to these types of learners so that they could gradually take more responsibility for their own learning. Needless to say, this requires sound facilitating skills on the part of the teacher.

Furthermore, empirical evidence suggests that EFL learners are exuberant about and intrigued by their online experience and look forward to future online course offerings (Alberth, 2009). Thus, not only does TELL provide EFL learners with abundant authentic materials and access to native speakers, as well as opportunities to practice the language skills and to participate more conveniently, but it also serves to engender students' interest and motivation in learning. Needless to say, motivation is central to any learning activity and employing TELL could potentially 'kill two birds with one stone'.

In spite of the above potential, it is of utmost importance to point out that the true effectiveness of the new technology hinges on how it is utilized to support sound pedagogy that engenders positive learning experiences, rather than its mere existence (Alberth, 2009; Rovai, 2002). In fact, such factors as student characteristics, teacher characteristics, instructional design (pedagogy), provision of support to both students and the teacher, in addition to technological factors, are amongst critical success factors in this new learning environment (Alberth, 2011). Thus, we should not expect quality learning simply by providing sophisticated technology. In addition to the potential benefits discussed above, TELL also has some potential drawbacks, albeit most of them being preventable. Perhaps the most frequently reported impediment to the implementation of TELL concerns technical problems (Evans, Gibbons, Shah, & Griffin, 2004). These include, but are not limited to, compatibility of hardware and software, slow loading, and computers experiencing errors, all of which are detrimental to student learning and learning experience if not attended to immediately.

For countries that have embraced broadband networks, internet loading speed and connection reliability may not be an issue at all. For those that still rely heavily on dial-up connection, however, the speed of the internet connection should be seriously considered when designing TELL activities. With the potential for slow internet connection, opening large files (such as pictures, sounds, movies, etc.) is both frustrating and demotivating for some students. In this situation, use of texts instead of pictures, sounds and movies may be more reasonable, although text alone would obviously be less attractive. Nonetheless, unless the technology itself is reliable in the first place, integrating technology in the EFL classroom could result in uncertainties and frustrations for both teachers and students.

In addition, to be able to efficiently function in a TELL environment, EFL learners have to be technologically savvy. Research evidence indicates that familiarity with technology affects students' attitudes to technology enhanced learning (Holscherl & Strubel, 2000). Obviously, students who have sound computer literacy and have always been using computers in the past, or have been relying on computers in their daily life, are expected to develop a more positive attitude to technology compared to those who have never used computers in their life or who have always encountered a problem when using technology. It is important to realise that, for some students, particularly those who are techno-phobic, TELL just adds an extra burden to their learning. For

these students, clicking on the mouse could be a big deal, let alone using computers as the main tool for their learning. This type of student is most likely to report a less positive evaluation of online learning compared to those who are comfortable with computers. However, with intensive training, students' computer literacy should not become an issue.

Put simply, with a good plan, many, if not all, of the aforementioned problems could be avoided or minimised, thus making TELL environments more enjoyable for all parties. In the following section, I will discuss one example of how the Internet and all its facets can be integrated into the EFL classroom by means of tandem exchanges.

TANDEM LANGUAGE LEARNING

Tandem language learning involves students from different linguistic backgrounds and requires them to work together and help each other learn the target language. In other words, tandem language learning involves two groups of students learning each other's native languages (for example, native Indonesian speakers learning English are paired with native English speakers learning Indonesian). In this case, each learner plays two distinct roles concomitantly: native speaker expert and language learner. Successful tandem exchanges should observe two principles: the principle of reciprocity – tandem learners should share the same amount of time as they use the target language and should support each other equally without reservation – and the principles of autonomy – learners must take control of their own learning (Little & Ushioda, 1998).

Tandem exchanges can use email or be integrated into the learning management system (i.e. Blackboard, WebCT, Moodle, etc.) with the latter proving to be more effective and manageable (Appel & Mullen, 2002). By integrating tandem exchange into the course delivery system, the teachers from both groups of students can design specific communicative goals to accomplish and provide support to their students when needed. This, in turn, enables the teachers to link tandem exercises to unit objectives. Tandem exchanges can also be carried out using Nicenet.

Research evidence suggests that tandem language exchange exercises prove to be invaluable for foreign language learning. Ushioda (2000) reported that tandem exchange positively impacts on students' motivation and promotes autonomous learning. It also enables language learners to be exposed to native

speakers and use the target language focusing on both meaning and form. There is a plethora of research evidence which suggests that frequent involvement in purposeful communication with native speakers is critical to the development of oral proficiency (Little & Ushioda, 1998).

However, to maintain a successful exchange, both learners should be highly motivated and committed to helping each other learn. In this case, a balance in terms of the language use for communication should be maintained so that both students can benefit from such exchanges. With tandem exchanges, learners from both linguistics groups have the opportunity to be exposed to native speakers of the target language. From the standpoint of the second language acquisition theory, these exchanges are instrumental to receiving comprehensible input and negative evidence, as well as experimenting with comprehensible output. Thus, tandem language learning is an important strategy that EFL teachers may consider in order to compensate for lack of exposure to the target language and lack of practice in a conventional 'brick and wall' classroom environment.

CONCLUSIONS AND SUGGESTIONS

With the advancement in computer technology and with unavoidable and inherent limitations we currently have, we need to re-think of the way we teach and the way our students learn English as a foreign language. This paper has demonstrated that the new technology can be an invaluable learning tool in the EFL classroom. Not only does it provide excellent, authentic, and abundant learning resources, but it also serves as a means to connect EFL learners with native English speakers across the globe using both synchronous and asynchronous communication. I have argued throughout the article that classical shortcomings associated with EFL classrooms, such as lack of comprehensible input and output, lack of learning resources, and decontextualised teaching and learning, to name a few, can potentially be overcome by making effective use of the technology. There is no doubt that the new technology is here to stay and it will continue to play a pivotal role in the life of the knowledge society. With this in mind, it is worth re-stating that the notion of TELL is not just an intriguing idea - it is a necessity and it would, therefore, be remiss of us not to embrace it. However, at the end of the day, we, EFL teachers, can decide for ourselves whether or not to opt for technology in our teaching and make the utmost use of it or to continue to practise what we have been doing over past years. The choice is ours!

REFERENCES

- Alberth. (2009, December). *How effective are technology enhanced teaching techniques in the EFL classroom?* Paper presented at the 56th TEFLIN International Conference, Malang.
- Alberth (2011). Critical success factors in online language learning. *TEFLIN Journal*, *22*(1), 16-33.
- Appel, C., & Mullen, T. (2002). A new tool for teachers and researchers involved in e-mail tandem language learning. *ReCALL*, 14(2), 195-208.
- Cziko, G. A. (2005). Electronic tandem language learning (eTandem): A third approach to second language learning for the 21st century. *CALICO Journal*, *22(1)*, 25-39.
- Doughty, C. J., & Long, M. H. (2003). Optimal psycholinguistic environments for distance foreign language learning. *Language Learning & Technology*, 7(3), 50-80.
- Evans, C., Gibbons, N. J., Shah, K., & Griffin, D.K. (2004). Virtual learning in the biological sciences: Pitfalls of simply "putting notes on the web". *Computers & Education*, 43(1-2), 49-61.
- Felix, U. (2002). The web as a vehicle for constructivist approaches in language teaching. *ReCALL*, 14(1), 2-15.
- Freiermuth, M. R. (2001). Native speakers or non-native speakers: Who has the floor? Online and face-to-face interaction in culturally mixed small groups. *Computer Assisted Language Learning*, *14*(2), 169-199.
- Fukushima, T. (2006). A student-designed grammar quiz on the web: A constructive mode of grammar instruction. *Educational Media International*, 43(1), 75-85.
- Holscherl, C., & Strubel, G. (2000). Web search behaviour of Internet experts and newbies. *Computer Networks*, 33(1), 337-346.

- Jarrel, D. (2005). The motivational power of internet chat. *RELC Journal*, *36*(1), 59-72.
- Jepson, K. (2005). Conversation and negotiated interaction in text and voice chat rooms. *Language Learning and Technology*, *9*(3), 79-98.
- Krashen, S. D. (1985). *The input hypothesis: Issues and implications*. London: Longman.
- Little, D., & Ushioda, E. (1998). Designing, implementing and evaluating a project in tandem language learning via e-mail. *ReCALL*, *10*(1), 95-101.
- Long, M. H. (1996). The role of the linguistics environment in second language acquisition. In W Ritchie & T Bahtia (Eds.), *Handbook of Second Language Acquisition* (pp. 413-468). San Diego, CA: Academic Press.
- Oxford, R. (1990). Language learning strategies: What every teacher should know. Boston: Heinle & Heinle Publishers.
- Rovai, A. P. (2002). A preliminary look at the structural differences of higher education classroom communities in traditional and ALN Courses. *JALN*, 6(1), 41-56.
- Soo, K., & Ngeow, Y. (1998). Effective English as a second language (ESL) instruction with interactive multimedia: The MCALL project. *Journal of Educational Multimedia and Hypermedia*, 7, 71-89.
- Spodark, E. (2001). Integrating online techniques into undergraduate French language instruction. *The French Review*, 74(6), 1206-1217.
- Swain, M. (1995). Three functions of output in second language learning. In G. Cook & G. Seidhofer (Eds.), *Principles and practices in applied linguistics: Studies in honor of H.G. Widdowson* (pp. 125-144). Oxford: Oxford University Press.
- Sweeney, J., O'Donoghue, T., & Whitehead, C. (2004). Traditional face-to-face and web-based tutorials: A study of university students' perspectives on the roles of tutorial participants. *Teaching in Higher Education*, *9*(3), 311-323.
- Ushioda, E. (2000). Tandem language learning via e-mail: From motivation to autonomy. *ReCALL*, *12*(2), 121-128.

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- Wiburg, K., & Butler-Pascoe, M. E. (2002). *Technology and teaching English language learners*. Englewood Cliffs, New Jersey: Prentice Hall, Inc.
- Zhao, Y. (2003). Recent developments in technology and language learning: A literature review and meta-analysis. *CALICO Journal*, 21(1), 7-27.