



## THE EFFECTS OF TFLAT PRONUNCIATION TRAINING IN MALL ON THE PRONUNCIATION ABILITY OF IRANIAN EFL LEARNERS

Effat Sufi<sup>1</sup>,

Hamed Babaie Shalmani<sup>1i</sup>

Department of English Language, College of Humanities,  
Rasht Branch, Islamic Azad University,  
Rasht, Iran

### Abstract:

The integration of technology into teaching and learning has contributed highly to the process teaching and learning as English language teachers and learners have recognized the place of technology in education and the way it can be effectively used to support various kinds of learning and teaching. The present research intended to find if teaching L2 pronunciation through mobile apps produce a statistically significant effect on the learning of pronunciation ability among Iranian intermediate EFL learners compared to teacher fronted instruction of pronunciation. In so doing, a sample of 30 intermediate EFL learners was selected based on their performance on QPT. The participants were randomly assigned to experimental group and control group of 15. A pretest piloted before with the reliability index of (0.86) was administered. Then, both groups received a 6-session treatment that were the use of the TFlat as a mobile courseware and the use of teacher-fronted instruction of pronunciation of units that included short vowels, long vowels, double vowel sounds, voiced consonants, voiceless consonants in experimental group and control group, respectively. A posttest was then administered to the groups. The results of the study indicated that the use of the TFlat courseware improved greatly the pronunciation ability of the students compared to the ability of the students in the control group in the same period the course of the study. The findings can be used specifically by EFL teachers who are interested in improving their students' pronunciation ability.

**Keywords:** technology, TFlat courseware, L2 pronunciation, EFL learners

### 1. Introduction

Over the recent decades, Technology-Enhanced Language Learning (TELL) has reigned supreme and been gaining in popularity compared to mainstream approaches to L2

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<sup>1</sup> Correspondence: email [babaie@iaurasht.ac.ir](mailto:babaie@iaurasht.ac.ir)

pedagogy. As one major technological milestone, mobile technology and related devices in mobile assisted language learning environments, however, represent an off-shoot of TELL that has received scant attention by myriad ELT enthusiasts seeking to promote quality education through linking technology with language pedagogy.

Pronunciation as a significant factor in communication can be a source of unintelligibility between interlocutors (Engelen, 2008). Several devices can contribute to the improvement of pronunciation skill, one of which seems to be mobile phones and their applications such as Tflat courseware. Engelen adds that they have been used as a popular tool for many years in order to make teaching accessible for students. They can also be used for some educational purposes and considered as a technical support for improving students' reading comprehension, listening comprehension, critical thinking, and pronunciation, in particular. Therefore, the use of mobile phones and their benefits in language teaching have been the subject of many research studies (Nalder & Elley, 2003). However, these studies (e.g., Turker, 2010; Whittingham, Huffman, Christensen, & McAllister, 2013) mostly focused on the use of mobile as a language tool for teaching reading skill, reading comprehension, or reading strategies, and very little research has looked at the influence of mobile phones on the improvement of learners' pronunciation skills.

While there is considerable enthusiasm for using mobile devices to support learning with their multimedia capabilities, portability, connectivity, and flexibility, there is a paucity of research evidence about whether such mobile technology can facilitate learning for students, specifically the ELL population. Moreover, with the increasing trend of institutions of education to adopt and make use of mobile technology, it is likely that these devices will become more prevalent on Iranian campuses. However, the influence of this trend remains to be seen.

The integration of such technologies into teaching and learning has been more gradual, as educators need to understand how they can be effectively used to support various kinds of learning (Kukulska-Hulme & Shield, 2008) and to develop effective methods and materials for MALL, a specialization of m-learning. Yet, with recent advancements, and in particular, the major breakthrough achieved in speech technology, more and more practitioners show a genuine interest in exploring its potential contributions to the acquisition of L2 phonology. Synthesized human voice assimilating native speakers' accent has made it possible for enthusiasts to develop text-to-speech engines that can hold great promise for training L2 pronunciation skills among language learners. Accurate pronunciation is the fundamental element of language communication to the extent that mispronunciation might impede communication. Since speaking a language needs an interactive ability to perceive and use language elements effectively, it is a difficult task, not least for foreign language learners (Richards & Renandya, 2002). In order to have communication that does not lead to misunderstandings, language learners should react in an appropriate way to what people say by using the correct features of the speaking.

Despite widespread agreement about the importance of pronunciation teaching, in ESL courses, pronunciation is the aspect of language that receives least attention. Kelly (2000) regarded pronunciation as the 'Cinderella of language teaching' (p. 87). It has been an area of neglect compared to other language skills and sub-skills. According to Kelly, it is neglected because of its complexity, dearth of scientific foundation, insufficient teaching materials, absence of non-native teachers with formal expertise in pronunciation, and opposing ideas concerning the teaching of pronunciation, to name but a few. The very fact of neglecting pronunciation in language classrooms, as Kelly (2000) put it, arises from the teachers' doubt of how to teach it rather than their lack of interest in the topic.

Furthermore, compared to wireless-enabled computers of PDAs, mobile phones are still in their infancy for teaching and learning environments. PDAs are often used with mobile wireless services such as Short Message Service (SMS), (Mauve, Scheele, & Geyer, 2001; Seppälä & Alamäki, 2003), and Multimedia Message Service (MMS), (Seppälä & Alamäki, 2003). A few institutions of education have integrated mobile wireless phones into their teaching and learning environments.

While some teachers think that there is not enough time to teach pronunciation (Munro & Derwing, 2007), others believe that teaching pronunciation is not a pleasant activity, they do not know how to teach it, or their students are not so much interested in learning it (Stevick, Morley, & Robinett, as cited in Saka, 2015). Considering the lack of attention paid to pronunciation and the need for teaching it, Hismanoğlu (2005) maintains that because of the important role that sounds play in communication, teaching these sounds is also crucial in language teaching, and that language teachers should pay close attention to teaching them. Regarding the points mentioned above, further research on this notion seems to be warranted and necessary.

Additionally, to date, according to Levy and Kennedy (2005), mobile language learning research consists of little more than experimental studies involving discrete, easily manageable chunks of written materials such as dictionary entries, basic phrases, example sentences and flashcards, sometimes with a sound accompaniment. Thus, much of the potential of the mobile phone as a learning platform therefore remains to be investigated, although there is some evidence that pushing study opportunities at students can steer them toward learning.

The researchers believe that the pedagogical reasons to consider using mobile phones in the second language classroom are very significant. It is common knowledge that mobile phones as social tools facilitate authentic and relevant communication and collaboration among L2 learners. In addition, using mobile phones in the classroom gives students greater control over their own learning. Students control the medium, and teachers, by elaborating how best to use the medium, provide a blueprint for autonomous learning, especially during the wide range of daily social activities where mobile phones are most likely to be used.

In the present study, the research is going to use TFlat English pronunciation as an L2 pronunciation training application delivered on the platform of mobile devices.

This application consists of four units, and each unit is going to teach high and back vowels, show a, diphthongs, as well as consonants to students. Pedagogically, TFlat can be a great to both teachers in delivering the pronunciation skills via MALL, and English language learners who can use this courseware to improve their pronunciation, which is easily available to them. Thus, the present study attempted to find an empirically justified answer to the following questions:

**Q1:** Does training L2 pronunciation via teacher fronted instruction produce a statistically significant effect on the acquisition of pronunciation ability among Iranian intermediate EFL learners?

**Q2:** Does teaching L2 pronunciation through mobile apps produce a statistically significant effect on the learning of pronunciation ability among Iranian intermediate EFL learners?

**Q3:** Do the two modalities of instruction produce differential effects considered to be statistically significant on the development of L2 pronunciation ability of Iranian intermediate EFL learners?

## 2. Literature review

The importance of teaching and learning pronunciation in the field of ELT has fluctuated over time. There were periods in which pronunciation was accepted as a privileged part of skill instruction and as a basis of language learning. During other periods of times, it was considered less important than other language skills, such as grammar, and broadly neglected by teachers and learners (Lightbown & Spada, 2006; Richards & Rodgers, 2001).

Recent studies on pronunciation have showed that integration of the technology into the classrooms is beneficial for the pronunciation instruction (Levis, 2007; Lord, 2008; Saran & Seferoğlu, 2010; Seferoğlu, 2005). Mobile applications, which have been accepted one of the new technological arrivals to the classroom atmosphere, could be a good resource to teach and learn pronunciation. However, they have been mostly used to teach skills related to vocabulary and reading up to now rather than skills related to speaking.

One of the researchers' interests in the field of teaching pronunciation is the use of some specific techniques in pronunciation instruction. They focus on the relationship between teaching pronunciation, language learning strategies and speaking confidence (Varasarin, 2007). Varasarin emphasizes the importance of keeping students speaking in order to teach them pronunciation. Trofimovich and Gatbonton (2006) claim some implications for pronunciation instruction by addressing repetition and focus on form.

As one of the crucial components of language learning, technology has started to be utilized in teaching pronunciation to a significant extent. Especially, computers and computer based technologies contributed a lot to language learning- teaching. Golonka, Bowles, Frank, Richardson, and Freynik (2014) state that *“technology made a measurable impact in FL learning came from studies on computer-assisted pronunciation training, in*

*particular, automatic speech recognition (ASR)*" (p. 70). According to literature, a vast majority of language teachers and researchers have shown interest in exploring the potential of technology to teach pronunciation. Most of the studies, however, focus on suprasegmental features of pronunciation. Despite the attempts made by the researchers to document the effectiveness of technology in pronunciation teaching, there is little convincing in results from those studies about how to integrate technology successfully into the classroom. For example, Eskenazi (1999) investigated the effectiveness of a computer tool known as automatic speech recognition on teaching and correcting errors of suprasegmental features such as intonation. Eskenazi found that the tool had little effect on pronunciation learning. In another study by Stenson, Downing, Smith, and Smith (1992), the same suprasegmental feature (intonation) was taught through computers. Even though their results were not statistically significant, they revealed that the participants made progress in terms of their intonation. While limited, the studies conducted to see the effectiveness of technological implementations in teaching pronunciation show that technology can be beneficial and should be explored for teaching pronunciation.

Kukulka-Hulme and Shield (2008) note that MALL differs from computer-assisted language learning in its use of personal, portable devices that enable new ways of learning, emphasizing continuity or spontaneity of access and interaction across different contexts of use. Conceived in this way, mobile learning seems to belong more to learners than it does to teachers, although we know that most learners will struggle without a teacher's direction and guidance.

Widespread ownership of mobile phones and the increasing availability of other portable and wireless devices have been changing the landscape of technology-supported learning. Use of these technologies turns out to be well aligned with strategic educational goals such as improving student retention and achievement, supporting differentiation of learning needs, and reaching learners who would not otherwise have the opportunity to participate in education (Kukulka-Hulme, Evans, & Traxler, 2005). A great deal of effort has also been devoted to understanding how mobile technologies relate to both traditional and innovative ways of teaching and learning, showing the applicability of mobile learning across a wide spectrum of activity (Naismith Sharples, & Ting, 2004; Kukulka-Hulme & Traxler, 2007) as well as highlighting the most important emerging issues (Sharples, 2006).

Instructors have become progressively interested in the learning advantages that mobile technology can provide to students in and out of classrooms through various features for information access, communication, collaboration and creating digital products (Banister, 2010; Chen & Huang, 2010; Hwang & Chen, 2013; Lin, Wong, & Shao, 2012). With the rapid development of mobile technology and its growing popularity, as well as the potential advantages of mobile devices for ubiquitous learning, empirical research is much needed (Prensky, 2010; Traxler, 2011).

### 3. Method

For the purpose of selecting a homogeneous sample of intermediate participants in terms of their level of overall English language ability, a sample copy of the Solutions Placement Test (elementary to intermediate) was administered to 42 EFL students taking English courses in Soroush English language institute in Rasht, Iran. The purpose was to select the qualified candidates for the present study. Based on the mandate of the test, the allotted time was 50 minutes. This test was selected, because it is easy to administer and to score objectively. Based on the result, 30 students, who scored over 30 on the test, were identified as intermediate level students. Then, the researchers used SuperCool to randomly divide them into two experimental and control groups.

The tests of English pronunciation were administered to both experimental and control groups. The tests consisted of 30 items, in three 10-test items. The first ten pronunciation checked words of similar confusing pronunciation like 'food and good'. The second set consisted of ten 4-choice items on different sounds like Showa, diphthongs, short and long vowels in word. Finally, another set of 10 three-multiple choice items was used that checked the students' pronunciation ability on both vowels and consonants. The allotted time to respond the 30 items was 30 minutes.

The researchers used a mobile application called TFlat as the main material in the present study, which was used in the treatment section of the study. It is a pronunciation-training courseware delivered on the platform of mobile devices. That is, it provides the pronunciation of words so that learners can learn from the sound-equipped privilege of transcribed words. This mobile application includes four main parts through which (1) the students checked the pronunciation of words, (2) practiced pronouncing the words, (3) had the details of the sounds, and (4) recorded their voices.

Since the goal was to identify the effect of MALL-based pronunciation training via TFlat courseware on the pronunciation ability of the students, the experimental group who learned them through software in mobile phone, called the monolingual English-to-English TFlat courseware application was taught the pronunciation of new words in class including all six types of pronunciation units in the application that included short vowels, long vowels, double vowel sounds, voiced consonants, and voiceless consonants to students in the experimental group. Totally, the pronunciation of 24 English words was practiced using TFlat courseware.

In the control group, however, the students learned the pronunciation of target L2 sounds through the conventional method (teacher fronted instruction) with no use of mobile phone. The control group followed the same old procedure of teaching and learning pronunciation of the sounds as done in traditional classes: First, the researchers wrote L2 words containing the target L2 sounds on the board. The sound was highlighted in a different color. As the researchers pronounced the word, she also pointed to the colored sounds using a long rod. In each session, around 4 words containing the target L2 sounds were selected and practiced in the classroom. The

words were first articulated by the researchers and then practiced in chorus by the students.

The instruction lasted for 6 weeks, one session a week, and in each session, 4 target sounds were taught. At the end of the experiment, an English pronunciation posttest was administered to the two groups. The items would measure students' pronunciation of the target sounds through 24 English words. After the required data were collected, they were analyzed statistically.

In the present study, the content validity of the test was checked by the researchers and their colleagues to make sure that a representative sample of the content taught over the course of the study would be measured by the pretest and posttest of pronunciation. The face validity of the items was also checked to make sure that all items would be read very well and that they were not vague or would not cause a misunderstanding on the part of the learners.

The researchers administered the test to a similar group of students before the conduct of the main study to pilot the test instruments. Next, they employed KR-21 method of estimating reliability of the pronunciation test. The result of reliability estimate was 0.86 which is an acceptable reliability scale. It served to both ascertain the homogeneity of the participants in terms of their level of L2 pronunciation ability at the beginning of the study and to determine their prior familiarity, if any, with the target L2 sounds at the beginning of the experiment.

### 3.1 Data Analyses and Findings

A sample of Solutions Placement Test was administered to select uniform participants with regard to their general English language proficiency. Table 4.1 presents descriptive data for the participants with regard to their performance on Solutions Placement Test. The test administered to 46 EFL learners included structure and vocabulary with a maximum possible score of 50 points.

**Table 1:** Statistics for the scores of the Solutions Placement Test

<b>N</b>	<b>Valid</b>	<b>46</b>
	Missing	0
Mean		32.7500
Median		31.0000
Mode		29.00
Std. Deviation		5.11105
Variance		26.123
Skewness		1.497
Std. Error of Skewness		.309
Kurtosis		2.222
Std. Error of Kurtosis		.608
Range		25.00
Minimum		26.00
Maximum		51.00
Sum		1965.00

Thus, the cut-point of  $(32.75 \pm 5.11)$  was set, and 30 EFL learners whose proficiency scores were over 30 were considered intermediate EFL learner and were selected as the main participants of the present study. Based on the Solutions Placement Test, scores within the domain of 0-15 are considered elementary, 21-30, Pre intermediate), 30+, Intermediate.

After selecting homogenous participants and dividing them into two groups (control and experimental), and estimating the reliability of tests, the researchers gave the participants a pronunciation test to examine the possible initial differences between the two groups regarding their pronunciation ability. Table 2 shows the group statistics of the scores reached on the pretest of pronunciation test for both control and experimental groups.

**Table 2:** Group statistics for control and experimental groups' pretest of pronunciation

	Study Groups	N	Mean	Std. Deviation	Std. Error Mean
Pretest scores	Experimental Group	15	13.8000	4.34577	1.12207
	Control Group	15	13.0667	2.31352	.59735

For the pronunciation test administered at the beginning of the study, the mean scores for the experimental and control group were 13.80 and 13.06, respectively. The degree of scatteredness of the scores for the experimental group was slightly higher than that of the control group ( $SD_{\text{experimental group}} = 4.34$ ,  $SD_{\text{control group}} = 2.31$ ). Accordingly, the difference is quite negligible indicating that there was no difference in the performance of the groups on the pronunciation at the beginning of the study.

Regarding inferential statistics, Table 3 shows the results of an Independent Samples *t*-test used to make an analysis of the students' scores on the pretests. The independent-samples *t*-test was conducted to compare the performance on the pretest of pronunciation for the two groups. The Independent-Samples *t*-test presented the results of Levene's test for the equality of variances which tested whether the variances of scores for the two groups were the same for the pronunciation tests.

**Table 3:** The results of independent samples t-test on the scores of pretest of pronunciation

Levene's Test for Equality of Variances		t-test for Equality of Means								
		F	Sig.	t	df	Sig. (2-tailed)	Mean Diff.	Std. Error Diff.	95% Confidence Interval of the Difference	
									Lower	Upper
Pretest Scores	Equal variances assumed	.794	.381	.577	28	.569	.73	1.27	-1.87	3.33
	Equal variances not assumed			.577	21.3	.570	.73	1.27	-1.90	3.37



Based on Table 3, there was no significant difference between the mean scores of the two groups in pretest of two tests ( $p > 0.05$ ). That is; the control and experimental groups were almost at the same level of proficiency in terms of their pronunciation in the pretests administered at the beginning of the study. There was no significant difference in scores for the control ( $M = 13.06$ ,  $SD = 2.31$ ) and experimental group ( $M = 13.80$ ,  $SD = 4.34$ ;  $t(28) = .57$ ,  $p = .569$ , two-tailed). In other words, the two groups were approximately at the same level of proficiency in terms of their pronunciation ability at the beginning of the study.

Table 4 depicts the values of the means and standard deviation along with standard error of mean for the two groups on posttests of pronunciation.

**Table 4:** Group statistics for control and experimental groups' posttest of pronunciation

	Study Groups	N	Mean	Std. Deviation	Std. Error Mean
Posttest Scores	Experimental Group	15	26.4000	2.74643	.70912
	Control Group	15	23.2000	3.32093	.85746

Based on Table 4, the mean score of the experimental group (mean<sub>experimental group</sub> = 26.40) was (3.2 points) higher than that of the control group (mean<sub>control group</sub> = 23.2) in pronunciation test. Moreover, the standard deviation for the two groups was nearly different ( $SD_{\text{experimental group}} = 2.73$ ,  $SD_{\text{control group}} = 3.32$ ). The group means indicate that the group performance in the posttest is not the same showing the priority of the experimental group over the control one on their posttest of pronunciation.

Calculating the possible effect of treatment on the dependent variables of pronunciation of the students, an independent samples *t*-tests were run to show the results of the posttest of pronunciation. It was implemented to make a comparison between the experimental and control groups in terms of their performance after supplying the specific treatment for the experimental group (See Table 5).

**Table 5:** The results of independent samples *t*-test on the scores of posttest of pronunciation

Levene's Test for Equality of Variances		t-test for Equality of Means								
Posttest Scores		F	Sig.	t	df	Sig. (2-tailed)	Mean Diff.	Std. Error Diff.	95% Confidence Interval of the Difference	
									Lower	Upper
Posttest Scores	Equal variances assumed	.469	.499	2.87	28	.008	3.20	1.11	.920	5.47
	Equal variances not assumed			2.87	27.04	.008	3.20	1.11	.917	5.48

Table 5 shows that there was significant difference in scores for control ( $M = 23.20.60$ ,  $SD = 3.32$ ) and experimental group ( $M = 26.40$ ,  $SD = 2.74$ ;  $t(28) = 2.87$ ,  $p = .008$ , two-tailed). In

other words, the two groups were significantly different in terms of their pronunciation in the tests administered at the end of the study.

In order to investigate students' progress within groups, two paired samples t-tests were also run, which showed the students' progress in pretest and posttest presented in Table 6.

**Table 6:** Paired samples t-test statistics for pronunciation tests (pretest & posttest)

		Mean	N	Std. Deviation	Std. Error Mean
<b>Pair 1</b>	Control Group Posttest Scores	23.2000	15	3.32093	.85746
	Control Group Pretest Scores	13.0667	15	2.31352	.59735
<b>Pair 2</b>	Experimental Group Posttest Scores	26.4000	15	2.74643	.70912
	Experimental Group Pretest Scores	13.8000	15	4.34577	1.12207

The mean score of the control group for the pronunciation test improved from (M= 13.06) in pretest to (23.20) in posttest; that of the experimental group progressed from (M= 13.80) in pretest to (26.40) in posttest.

As shown in Table 6, based on the results of Paired Samples t-tests, both control and experimental groups proceeded in the posttests. However, this improvement was statistically significant simply for the experimental groups but not for the control group ( $P_{\text{experimental group}} < .05$ ,  $P_{\text{control group}} \geq .05$ ). In other words, the experimental groups made a noticeably higher progression as compared to the control groups in the posttest of both pronunciation.

## 5. Discussion

According to the findings, although the two groups were homogenous in terms of their pronunciation (as depicted by the results of the pretest) at the beginning of the study, the experimental groups who worked on tFlat mobile application pronunciation outperformed significantly the control groups.

The results showed that the employment of tFlat pronunciation mobile application affected the performance on the pronunciation of the experimental groups. Concerning the research questions stated above and the related hypotheses that generally said training L2 pronunciation via teacher fronted instruction does not produce a statistically significant effect on the acquisition of pronunciation ability among Iranian intermediate EFL learners was confirmed, and teaching L2 pronunciation through mobile apps does not produce a statistically significant effect on the learning of pronunciation ability among Iranian intermediate EFL learners, and the two modalities of instruction produce differential effects considered to be statistically significant on the development of L2 pronunciation ability of Iranian intermediate EFL learners were rejected implying that tFlat mobile application pronunciation has statistically significant effects on EFL learners' both pronunciation ability.

Learning a language usually includes the aim of being able to communicate and having good pronunciation is an effective factor for good communication (Celce-

Murcia, Brinton, & Goodwin, 1996). According to Hariri (2012), “since sounds play an important role in communication, foreign language teachers must attribute proper importance to teaching pronunciation in their classes” (p. 461). By emphasizing the effect of pronunciation on communication and the need to teach it, MALL can be a great contribution to this end.

As mobile technology becomes increasingly pervasive, we can expect to see more examples of language learning being integrated with everyday surroundings. Conceived in this way, mobile learning seems to belong more to learners than it does to teachers, and most learners struggle without a teacher’s direction and guidance to improve their English language learning through mobile and its related applications.

Accordingly, the present study investigated the effect of mobile technology on language learning achievements. In other words, the study sought to compare the effects of teaching L2 pronunciation as delivered via a traditional approach with those of that delivered via tFlat English pronunciation, a piece of courseware installed on mobile devices, in an attempt to ascertain whether pronunciation-training software can privilege EFL learners any better than extant mainstream methods. More specifically, the study investigated the impact of using a MALL application, delivered on mobile devices (e.g., tablets, cell phones, etc.) on the improvement of L2 pronunciation ability of Iranian intermediate EFL learners.

In line with general finding of the present study revealing the effect of technology on language learning and pronunciation in particular, the studies conducted so far to see the effectiveness of technological implementations in teaching pronunciation show that technology can be beneficial and should be explored for teaching pronunciation.

The findings of the present study is supported by Eskenazi (1999) who investigated the effectiveness of an automatic speech recognition tool on teaching and correcting errors of suprasegmental features such as intonation. Eskenazi found that the tool had little effect on pronunciation learning. The study done by Stenson, Downing, Smith, and Smith (1992), is also in the same line. They explored the suprasegmental feature (intonation), and even though their results were not statistically significant, they revealed that the participants made progress in terms of their intonation.

Regarding the impact of mobile phones on language learning, the study conducted by Thornton and Houser (2005), certify the findings of the present study. The authors showed that according to pre- and post-tests, learners demonstrated linguistic gains by receiving mini lessons via mobile, and that more than 70% of learners preferred to receive instructions over mobiles compared with books or desktop computers.

In another study that is in line with finding of the current study, Song and Fox (2008) tracked advanced learners of English to see how they were using a mobile device to support and extend their learning in self-directed ways. They found that the students who volunteered to take part were happy to give a great deal of time to the project and pursue their own goals. These were highly motivated learners, who were willing to

define their own language needs and to select resources, tools and communication methods.

The current study shows how the mobile device helped students improve their pronunciation. As such, Michelsen's (2008) study, implied the design of a mobile application which is learner-centered, self-directed and based around a virtual community of practice, enabling second language learners to revise on the go for the challenging language learning issues.

In contrast, there are some researchers who warn educators on using technology driven courseware and applications. For example, Colpaert (2004) emphasizes the importance of developing the language learning environment before deciding on the role of mobile technologies and further emphasizes focusing on the learner ahead of the technology. Salaberry (2001) also argues against "*technology-driven pedagogy*," suggesting that despite their revolutionary status, it is not clear that any modern technology (e.g., television, radio, the PC) has offered the same pedagogical benefits as traditional second language instruction. Beatty (2003) offers a further caveat that "*teachers need to be concerned about investing time and money in unproven technology*" (p. 72).

On the technology side, most studies show that learners have a positive attitude towards the use of mobile technologies for the second and foreign language acquisition, but there are differences. For example, Huang, Huang, Huang, and Lin (2012) show that the designed system (ubiquitous English vocabulary learning system, UEVL) was readily accepted by the students in the sample but while active students were concerned about the perceived usefulness of the system, passive ones were more concerned about the perceived ease of use of the system.

The impact of mobile technology on language learning has often been measured by individuals' perceptions. This exemplifies what Orlikowski & Iacono (2001) call the proxy view of technology. Effectiveness studies (e.g., Chang & Hsu, 2011; Cheng & Huang, 2010) focus on how this technology is viewed by individual users where the perceptive, cognitive, and attitudinal responses to technology become the critical variable in explaining mobile technology. Hence, technology itself plays a role in teaching and learning methods that evolve co-constructed system in a sociotechnical system.

## 6. Conclusion

Without question, mobile technology has been seen as a valuable technology resource for students in education, especially in serving those students who may not have adequate technology access after school. It is a great challenge for teachers helping EFL students succeed in regular classrooms presents unique challenges. These students often enter schools with varied levels of English language proficiency and may require additional support for academic success.

Teachers can make use of mobile technologies and the related applications that are now readily available to every single student to overcome the limitation of

educational flexibility so that they help improve efficiency and effectiveness in teaching and learning.

The phenomenal growth of digital mobile communication has given the telephone considerable prominence. Thus, the English language teachers need to be aware of the potential impact of mobile telephony on education. They also need to show signs of interest in the role of mobile technologies in language learning. Recent interest in the potential for mobile phones to support learning and teaching has been driven by the fact that mobile phones are relatively cheap and increasingly powerful (Chinnery, 2006; Kukulska-Hulme & Traxler, 2005). As such, teachers' inclination toward using the technology is required.

The education administration should also consider the pedagogical reasons of using mobile phones in the second language classroom very significant. It is generally accepted that mobile phones as social tools facilitate authentic and relevant communication and collaboration among L2 learners since they give students greater control over their own learning.

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