Research Article
Mobile-Assisted Language Learning and Its Effects on Learners’ Speaking Development

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This comparative study was to determine the impact of mobile learning classes on English Foreign Language (EFL) learners’ speaking skill development and their motivation to participate in class discussions. The level of students’ satisfaction with this approach was also investigated. 60 students from Kish institute in Ilam, Iran, were assigned through purposive sampling to comparable groups. One group participated in face-to-face classes, and the other took part in mobile learning classes through WhatsApp. Parallel forms of a test were conducted as pretest and post-test for both groups to examine the impact of mobile learning, and a researcher-made questionnaire was distributed through WhatsApp. The obtained data of both groups were analyzed through SPSS 20. The findings revealed that the majority of students were satisfied with mobile learning classes, students in mobile learning classes outperformed the students in face-to-face classes, and that mobile learning classes had a significant role in increasing students’ motivation to participate in class discussions.

1. Introduction

Modern technology will dominate the world in the twenty-first century [1]. Information and Communication Technology (ICT) as an instance of modern technology refers to technologies that enable access to information through telecommunication [2]. Due to the advent of cognitive and sociolinguistic approaches to language teaching, as well as an emphasis on students’ participation in authentic, meaningful, and contextualized discourse, there was a full-scale transition in the use of technology in classrooms in the late 1980s and early 1990s [3].

According to Warschaur and Meskill [4], almost all language learning and teaching activities need to use a specific sort of technology. Therefore, ICT also has had impacts on the quality of teaching, learning, and research, particularly in learning English, and it may improve teaching and learning by providing dynamic, interactive, and relevant information.

Following the transmission of Coronaviruses which affected numerous systems and have a broad spectrum of natural hosts, almost all educational systems around the world have been interrupted for a while, and the scene was set for sudden changes. Accordingly, almost all Iranian universities, schools, and English institutes have embraced e-learning due to the recommendations of the World Health Organization to contain this virus. According to Aliakbari and Hassen [5], e-learning is a method of teaching and learning that delivers information to students using modern communication mechanisms such as computers, smart devices, and networks, as well as various multimedia, electronic libraries, and graphics.

One of the sub-branches of e-learning, which has recently received a considerable amount of attention, is mobile
learning (m-learning). Mobile learning is learning via mobile devices and wireless transmission. It is also defined as ICT-based education or training that is customized, scalable, versatile, personalized, self-organized, and cooperative education [6].

Mobile devices have generated a new field of study called Mobile-Assisted Language Learning (MALL) related to language learning and mobile technologies. MALL is a new learning strategy that improves language learning by utilizing handheld and portable gadgets such as smartphones, tablets, MP3/MP4 players, and personal digital assistants [7]. In fact, MALL has blurred the learning barriers between classroom and home, as well as computer and mobile devices [8] by providing a more personal and convenient environment for learners [9]. Language learners utilize MALL to access learning materials by connecting to wireless networks and communicating with learning websites via SMS, mobile e-mail, and learning applications.

Since learning a second language does not occur in isolation but rather in a situational and social environment, many learners and teachers have expressed their concerns regarding the effectiveness of the mobile learning approach on EFL learners’ performance, particularly in the context of speaking skill as one of the most critical, cognitive, and linguistic language skills, which is entirely dependent on interaction [10].

According to Baron [11], speaking is one of the most complicated and challenging skills that should be developed and improved as a means of communication. This essential skill facilitates worldwide communication and the personal advancement of people from all walks of life. Baker and Westrup [12] supported these claims, stating that having adequate proficiency in speaking skill can increase your chances of receiving higher education, finding a proper job, and getting a promotion.

As previously stated, the Coronavirus outbreak in 2019 has caused obstacles and changes in the educational system in almost all countries. Following the recommendations of the World Health Organization and public restrictions, nearly all schools, universities, and English classes were suspended. Because this virus was being mutated, and it was approximately impossible to combat it all at once, online learning which was not prevalent in Iranian educational system was inevitably employed. Among the remedial strategies proposed, due to its unique features such as portability, accessibility, and flexibility, mobile learning has attracted great deal of attention during this epidemic.

Despite the importance of speaking skill to many academics [13, 14], only limited studies were carried out to assess the impact of mobile learning on EFL learners’ speaking development, which sparked our interest in conducting the present study.

Meanwhile, by considering the differences between mobile learning and face-to-face classes’ environment in terms of delivering the instructional materials, giving feedback to students, and communicating with teachers and classmates, the impact of MALL on students’ motivation to participate in class discussions and their satisfaction with this approach required investigation. Therefore, this study seeks answer to the following questions:

(i) Q1: is there any significant difference between mobile learning classes and face-to-face classes in terms of speaking skill performance?
(ii) Q2: to what extent are EFL learners satisfied with mobile learning classes?
(iii) Q3: to what extent can mobile learning class motivate students’ engagement in class discussions?

2. Review of the Literature

2.1. Mobile-Assisted Language Learning. Kukulska-Hulme [15] defined MALL in three contexts, the last two of which were also mentioned in Kukulska-Hulme, Traxler, and Pettit [16]: the community as context (i.e., formal and informal education settings), a teacher-driven context “formally designed,” and a learner-driven context “user-generated.” There is a mode of participation (controlled or self-regulated), a model of use (teacher-directed or autonomous), and a model of involvement (via stated or proposed educational activity) through MALL in each of these contexts. MALL can be thought of as a step along the spectrum of teacher-driven to learner-driven learning. On this continuum, the characteristics of language learning, notably student participation in language learning activities and language use, are integrated into m-learning [17].

Sari and Nurcahyo [18] carried out a study to see if mobile learning could improve students’ learning motivation. In this pre-experimental study, 35 students were chosen by purposive sampling technique from State Senior High School in Banguntapan, Yogyakarta. Questionnaires were utilized to collect data before and after learning. The paired t-test and N-gain score were utilized in the data analysis to determine the effectiveness of mobile learning in enhancing students’ learning motivation. The conclusions indicated that mobile learning increased learning motivation.

Heflin, Shewmaker, and Nguyen [19] investigated students’ engagement, critical thinking, and attitudes toward collaborative learning in three different collaborative learning environments, both with and without mobile technology. According to the findings, mobile technology was connected with improved student views of collaborative learning as well as increased student disengagement in class. Furthermore, the tools used to construct written solutions were more directly related to the level of critical thinking of students than to the sort of collaborative learning environment. Students who produced paragraph responses on a mobile device demonstrated significantly
less critical thinking than those who used a computer keyboard or hand wrote responses. On the other hand, Kadirire [20] claimed that the development and production of new software tools and applications for various mobile devices would be a critical challenge of mobile learning. Stockwell [21] noted that many students were hesitant or unwilling to use mobile devices for educational or academic objectives.

Another impediment to mobile learning adoption in EFL contexts was a lack of collaboration and communication among students [22]. Although some experts considered mobile learning less expensive than other instructional strategies, several academics noted that using mobile devices was costly to students and institutions [21, 23]. According to Ally [23], the most significant concern surrounding the implementation of mobile learning was people’s attitudes toward mobile devices as learning tools. He argued that some people assumed mobile devices were distracting and should only be used for nonacademic purposes.

2.2. The Impact of MALL on Speaking Skill. Hadi and Emzir [24] explored the impacts of MALL on students speaking skill. This study was action research at Muhammadiah University of Jakarta’s English Department with 30 participants. Data were derived from the English Speaking Skill Test results. The findings revealed that the learning process employing Mobile-Assisted Language Learning caused students to become more engaged in discussions. Results also revealed that employing MALL from the preliminary cycle to the third cycle phase of the research process increased students’ English speaking skill significantly.

The study of Almadhady, Salam, and Baharum [25] was an attempt to understand Iraqi EFL learners’ perceptions of the use of MALL applications for the purpose of improving speaking skill. The participants were 51 EFL students enrolled in the bachelor’s program in the Department of English Language at Anbar University’s Faculty of Education for Humanities in Ramadi, Iraq. Respondents were drawn from various academic years, and data were gathered using structured interview questions. The adopted interview survey, on the other hand, was structured in the form of open questions rather than closed questions. The study’s findings revealed that the respondents had a favorable opinion and attitude toward using MALL applications to improve their speaking skill.

In a similar vein, the impact of utilizing mobile learning on speaking skill has been investigated through an experimental study carried out by Morshedi Tonekaboni [26]. In this study, 46 elementary EFL male students were involved. The participants in the experimental group recorded their voices on their phones during class discussions and then assessed and commented on their mistakes in the next session as an out-of-class task. The control group, on the other hand, received no further treatment at all. The results showed that participants who had benefited from mobile learning performed much better on the speaking post-test than the control group. Having noticed the lack of consensus about the role that mobile can play in education, in the section that follows the methodology adopted for the current study is specified.

In another study, Tarighat and Khodabakhsh [27] sought to explore the feasibility of MALL and the students’ attitudes toward such phenomenon. This study included 17 English advanced-level students enrolled in an FCE preparation course. Every session, one participant volunteered to record a two-minute speech on the second task of the FCE speaking module and shared her recording with the entire class as well as the teacher via the WhatsApp group. Finally, the participants were asked about their opinions and perspectives on the approach used to assess their speaking proficiency. The findings revealed that learners had mixed emotions about MALL, and their main concerns were about fairness and a lack of true communication.

Rajendran and Yunus [28] attempted to fill the gap by giving a comprehensive analysis of relevant published studies conducted in MALL contexts to improve the speaking skill of ESL and EFL learners from 2016 to 2020. The review’s findings imply that using MALL promotes constructivism theory principles, fosters a stress-free atmosphere, encourages contextual learning, and is simple to use. According to further research, mobile devices’ general features and mobile applications could be employed as possible tools to assist learners in improving their speaking skill in MALL contexts.

Darmawati [29] conducted a study to investigate the impact of MALL on students’ speaking performance. This was a classroom action research study that was conducted in three cycles. According to the findings, Mobile-Assisted Language Learning could increase students’ speaking skill in terms of pronunciation, grammar, vocabulary, fluency, and comprehension. The more students practice speaking through MALL, the greater their speaking skill would be.

The focus of Vigneshwari and Phil [30] research is to improve their speaking skill and expand their vocabulary, pronunciation, grammar, and fluency level. It is an action research study that was carried out on TBAK II MA English students. Six students were chosen from six populations using basic random sampling. They were separated into three levels based on their speaking level: intermediate, advanced, and competent. Classroom observation and unstructured interviews were used to collect data. The researcher employed an experimental approach. This study’s design included a pretest, speaking exercises, and a post-test. To develop L2 learners, mobile applications such as podcasting tools and vocabulary development were used. The researcher evaluated the pupils’ development both in person and in a WhatsApp group. The study’s findings indicated that Mobile-Assisted
Language Learning could be one of the most beneficial approaches for assisting students in learning an integrated second language. Students have given positive feedback during the implementation of MALL procedure.

Zhou [31] conducted a comprehensive assessment of MALL research in the specific domain of speaking skill acquisition from 2017 to 2021 in terms of research designs, theories, and frameworks, as well as the characteristics of the included research and its new trends. The findings suggest that research of mobile technology use in language learning supports the assumption that mobile technology can improve learners’ speaking skill and other skills. However, the majority of the studies examined are quasiexperimental, small-scale, and conducted in higher education settings.

Gultom et al. [32] carried out a study to (1) assess students’ digital literacy, (2) determine students’ preference for MALL for acquiring the speaking skill, and (3) assess students’ confidence to speak after practicing with application. The participants were more than 120 first-year undergraduates from two distinct campuses in different provinces, namely, DKI Jakarta and Sulawesi Tenggara. The research was structured using a descriptive qualitative method to collect data through two categories: an online survey and direct observation of MALL practitioners and their achievement development. The findings revealed that students (1) demonstrated their level of digital literacy, (2) indicated their preference for MALL to learn speaking, and (3) identified their confidence to talk after practicing with application.

Ahmed et al. [33] explored the impact of the Duolingo and WhatsApp programs on the development of speaking accuracy and fluency among Iranian EFL learners. For this purpose, three groups of Iranian intermediate EFL learners were chosen as the participants. Following that, all groups performed the speaking pretest before receiving treatment. The Duolingo application was used to teach one group ten conversations from Family and Friends Book 5, while WhatsApp was used to teach the other group the same conversations. The third group, known as the control group (CG), was taught about the dialogues in a regular classroom setting. After teaching the discussions, all groups were given a speaking post-test to compare their performance after the treatment. The one-way ANOVA test was used to examine the data collected. The findings demonstrated that two experimental groups (EGs) outperformed the control group (CG) on the speaking post-test. Furthermore, the results revealed that the two EGs performed similarly on their speaking post-tests.

3. Methodology

3.1. Design. To fulfill the purpose of this quantitative study, two designs were employed. In the first place, a comparative study was adopted to address the first question; and in the second phase, a researcher-made questionnaire was determined to find the answer to the second and the third questions.

3.2. Participants. Since the current research was carried out during the outbreak of Coronavirus, participant selection was affected by the outbreak and the adoption of online teaching. Accordingly, purposive sampling was inevitably the most fit choice since mobile teaching was simply one of the diverse teaching systems proposed during the pandemic. Therefore, in this study the classes who utilized mobile learning were chosen as the population.

A total of 60 EFL learners in Kish institute in Ilam, Iran, including 31 males and 29 females whose age range was between 18 and 24 years were assigned into two groups. The two groups were homogeneous in terms of teacher, textbook, and age. In terms of gender, the face-to-face classes consisted of 16 females and 14 males, while the mobile learning classes consisted of 13 females and 17 males.

3.3. Instrument. As stated earlier, this study was conducted through two designs. For the comparative study, two Preliminary English Tests (PET) designed by Quintana [34] which were at the same difficulty level and suitable for preliminary students were administrated; one as the pretest to homogenize the experimental and the control group and the other as the post-test to measure the effect of the treatment on learners’ performance (Appendix A). PET test is targeted for intermediate level and provides a reliable assessment at the level above B1 (Level B2) and the level below (Level A2). This test is to indicate that learners are able to communicate in English in practical and everyday situations. Each pretest and post-test which takes about 10-12 minutes involves three parts: general introductions, discussion about a photograph, and discussion about a topic. Holding parallel forms of this test as pretest and post-test, the accessibility of well-defined criteria and measurement scales to reduce the possibility of biased and subjective results, as well as the possibility of holding this test easily in terms of cost and time lead to increase the reliability, validity, and practicality of the test Figures 1–4.

For the second design, a researcher-made questionnaire (Appendix B) was distributed among the mobile learning group to answer the second and third research questions. The 5-point Likert items questionnaire contains 15 items about the impact of mobile learning classes on students’ learning, their satisfaction with mobile learning classes, the quality of the teacher’s feedback in mobile learning classes compared to face-to-face classes, mobile capabilities for language learning, and the impact of mobile learning classes on learners’ participation and stress Figure 5.

To care for the validity of the instrument, in compiling this questionnaire, first, five open-ended questions were given to the teacher and a number of the learners in the mobile learning class, and based on their responses, the questionnaire was designed and validated through expert judgments. Additionally, the authors tried the statistical reliability index. The alpha value of 85% for the tests and 97% for the questionnaire indicated that the test and questionnaire had sufficient reliability index to conduct the research.

3.5. Procedure. To observe the ethical considerations, the aim of the research was clarified to the participants, and the institution manager's and participants' contest was obtained. Then, we placed the selected people in the mobile learning class and face-to-face class by odd and even scores. The participants then attended 25 90-minute sessions in which they were taught American English File 2 (third edition) for both groups; online classes were held in WhatsApp groups, and the instructions were delivered through PDF and voices. After performing the treatment in around three months, the groups were given a parallel version of the pretest and the post-test to evaluate the impact of the treatment on them.

It should be mentioned that both tests for the groups were recorded in Voice Recorder software and then assessed by three English language expert raters by employing Cambridge English Language Assessment criteria [36], and the results were analyzed by a statistical counselor.

To answer the second and third questions, a researcher-made questionnaire, including fifteen 5-point Likert item questions, was designed through Porsline and given to the mobile learning class via WhatsApp.

4. Results

4.1. Descriptive and Inferential Statistics of Pretest and Posttest. Table 1 reveals that the mean score of the mobile learning class speaking skill in the pretest stage by the three raters ($M = 3.10, 2.81, 2.88$) was lower than the mean score of the face-to-face class speaking skill in the pretest stage ($M = 3.11, 2.83, 2.90$), and the mean score of the mobile learning class speaking skill in the post-test stage ($M = 3.70, 3.86, 4.25$) after teaching via mobile was higher than the mean score of the face-to-face class speaking skill in the post-test stage ($M = 3.21, 3.00, 3.01$).

Also, the mean score of the mobile learning class speaking skill in the pretest stage ($M = 2.93$) was lower than the mean score of the face-to-face class speaking skill in the pretest stage ($M = 2.95$), and the mean score of the mobile learning class speaking skill in the post-test stage after training via mobile ($M = 3.93$) was higher than the mean score of the face-to-face class speaking skill in the post-test stage ($M = 3.07$).

As a prerequisite for administering the inferential statistics and in order to ensure the normality of the data, Kolmogorov–Smirnov Test was administered the result of which is represented in Table 2. The $\text{Sig} > 0.05$ obtained confirmed that the data were normal.

The results of Table 3 reveal that the mean score of mobile learning and face-to-face classes speaking skill in the pretest stage in the degree of freedom of $DF = 85$ at a significant level ($\text{Sig} > 0.05$) is greater than the level of acceptance. That is, it can be stated that according to the results of the $t$-test of the two independent groups and the calculated $t$-test ($t = 0.170$), there is no significant difference in students' speaking skill score in the face-to-face and mobile learning groups in the pretest stage. The mean score of students' speaking skill in the face-to-face and mobile learning classes in the post-test stage with $DF = 85$ at a significant level ($\text{Sig} < 0.05$) is within the level of acceptance. That is, the calculated $t$-test of the two independents groups ($t = -7/541$) indicated that there is a significant difference between the score of the students speaking skill in the post-test, and the score of students in mobile learning classes in this stage was higher than the face-to-face classes.

4.2. Descriptive and Inferential Statistics of the Questionnaire. According to Table 4, the average of the respondents' opinions regarding the level of students' satisfaction with mobile learning and the rate of engagement to participate in mobile learning class ($3.42, m = 3.60$) is greater than the mean. This value is significant at the level of ($0.06, 0.039$) and at the level of confidence (0/95), so it can be claimed that the level of students' satisfaction with mobile learning and the rate of students' engagement to participate in mobile learning classes is higher than the average.

5. Discussion

Considering the fact that in the previous section, the accurate statistics in the form of tables were presented, in this section, only a brief elaboration of the obtained results will be provided.

In response to the first question, the findings of the $t$-test revealed that there was no significant difference between the score of mobile learning and face-to-face classes in the pretest, while there was a significant difference between the two groups' scores in the posttest. Considering that the two groups were almost equivalent in terms of age, gender, course length, textbook, and teacher, it is reasonable to claim that the significant difference can be attributed to mobile learning. Therefore, the study indicated that mobile learning classes were more effective than face-to-face classes in developing EFL learners' speaking skill.

This study's response to the first research question is in line with Bulent [37] findings on the development of students' achievement and metacognition as a result of mobile learning. Particularly, it is also in line with Ataifar, Sadighi, Bagheri, and Behjat [38] findings about the effect of this method on speaking skill. The first question's result, however, does not coincide with the findings of other studies such as Kuznekofof and Titsworth [39], which mobile learning was shown to be an ineffective learning approach. Nonetheless, such a disagreement does not diminish or exaggerate the impact of mobile learning in improving students' performance because each study has its own set of
Table 1: Distribution of the two groups’ mean scores in pretest and post-test.

<table>
<thead>
<tr>
<th>Group</th>
<th>Pretest rater 1</th>
<th>Post-test rater 1</th>
<th>Pretest rater 2</th>
<th>Post-test rater 2</th>
<th>Pretest rater 3</th>
<th>Post-test rater 3</th>
<th>Pretest total score</th>
<th>Post-test total score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Face-to-face class</td>
<td>3.1167</td>
<td>3.2167</td>
<td>2.8333</td>
<td>3.0000</td>
<td>2.9000</td>
<td>3.0167</td>
<td>2.9500</td>
<td>3.0778</td>
</tr>
<tr>
<td></td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
</tr>
<tr>
<td></td>
<td>0.61143</td>
<td>0.62537</td>
<td>0.46113</td>
<td>0.49130</td>
<td>0.42345</td>
<td>0.49971</td>
<td>0.39671</td>
<td>0.45640</td>
</tr>
<tr>
<td>Mobile learning class</td>
<td>3.1000</td>
<td>3.7000</td>
<td>2.8167</td>
<td>3.8667</td>
<td>2.8833</td>
<td>4.2500</td>
<td>2.9333</td>
<td>3.9389</td>
</tr>
<tr>
<td></td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
<td>30</td>
</tr>
<tr>
<td></td>
<td>0.63518</td>
<td>0.61026</td>
<td>0.46393</td>
<td>0.54033</td>
<td>0.33946</td>
<td>0.41000</td>
<td>0.35986</td>
<td>0.42769</td>
</tr>
<tr>
<td>Total</td>
<td>3.1083</td>
<td>3.4583</td>
<td>2.8250</td>
<td>3.4333</td>
<td>2.8917</td>
<td>3.6333</td>
<td>2.9417</td>
<td>3.5083</td>
</tr>
<tr>
<td></td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
<td>60</td>
</tr>
<tr>
<td></td>
<td>0.61817</td>
<td>0.65930</td>
<td>0.45867</td>
<td>0.67313</td>
<td>0.38058</td>
<td>0.76947</td>
<td>0.37560</td>
<td>0.61710</td>
</tr>
</tbody>
</table>

Table 2: Kolmogorov–Smirnov test of the research variable.

<table>
<thead>
<tr>
<th>N</th>
<th>Pretest</th>
<th>Post-test</th>
<th>Satisfaction</th>
<th>Engagement rate</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>Std. deviation</td>
<td>Mean</td>
<td>Std. deviation</td>
</tr>
<tr>
<td></td>
<td>2.9417</td>
<td>0.37560</td>
<td>3.5083</td>
<td>0.61710</td>
</tr>
<tr>
<td></td>
<td>3.6000</td>
<td>1.10172</td>
<td>3.4266</td>
<td>1.08586</td>
</tr>
<tr>
<td></td>
<td>Absolute</td>
<td>0.128</td>
<td>0.072</td>
<td>0.242</td>
</tr>
<tr>
<td></td>
<td>Positive</td>
<td>0.122</td>
<td>0.072</td>
<td>0.158</td>
</tr>
<tr>
<td></td>
<td>Negative</td>
<td>−0.128</td>
<td>−0.055</td>
<td>−0.242</td>
</tr>
<tr>
<td></td>
<td>Kolmogorov–Smirnov</td>
<td>0.994</td>
<td>0.558</td>
<td>1.324</td>
</tr>
<tr>
<td></td>
<td>Asymp. Sig. (2-tailed)</td>
<td>0.276</td>
<td>0.914</td>
<td>0.060</td>
</tr>
</tbody>
</table>

*Test distribution is normal.

Table 3: Investigating the differences between the two groups’ speaking skill scores. Independent samples test.

<table>
<thead>
<tr>
<th>Levene’s test for equality of variances</th>
<th>T-test for equality of means</th>
</tr>
</thead>
<tbody>
<tr>
<td>F</td>
<td>Sig.</td>
</tr>
<tr>
<td>---</td>
<td>------</td>
</tr>
<tr>
<td>Pretest</td>
<td>Equal variances assumed</td>
</tr>
<tr>
<td>Post-test</td>
<td>Equal variances not assumed</td>
</tr>
<tr>
<td>Post-test</td>
<td>Equal variances assumed</td>
</tr>
<tr>
<td>Post-test</td>
<td>Equal variances not assumed</td>
</tr>
</tbody>
</table>

Table 4: Descriptive and inferential statistics.

<p>| Distribution of the average level of students’ satisfaction and the rate of students’ engagement in mobile learning | Respondents’ opinions about the level of students’ satisfaction and the rate of students’ engagement to participate in mobile learning class discussions | 95% confidence interval of the difference |
|---|---|---|---|---|---|</p>
<table>
<thead>
<tr>
<th>N</th>
<th>Mean</th>
<th>Std. deviation</th>
<th>Std. error mean</th>
<th>T</th>
<th>df</th>
<th>Sig. (2-tailed)</th>
<th>Mean difference</th>
<th>Std. Error difference</th>
<th>95% confidence interval of the difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Satisfaction</td>
<td>30</td>
<td>3.6000</td>
<td>1.10172</td>
<td>0.20115</td>
<td>2.983</td>
<td>29</td>
<td>0.006</td>
<td>0.60000</td>
<td>0.1886</td>
</tr>
<tr>
<td>Engagement rate</td>
<td>30</td>
<td>3.4286</td>
<td>1.08586</td>
<td>0.19825</td>
<td>2.162</td>
<td>29</td>
<td>0.039</td>
<td>0.42857</td>
<td>0.0231</td>
</tr>
</tbody>
</table>
circumstances in terms of teachers, students, evaluation criteria, ways of assessment, etc.

In accordance with the second question, the result of the survey indicated that 12 out of 30 students stated that their learning increased through mobile learning classes, and they prefer mobile interaction to face-to-face interaction. In addition, half of the students were satisfied with the mobile classes and announced that they will attend these classes for the next semesters.

With regard to the third research question, although motivation is a mental process that cannot be directly observed, it can be inferred by its behavioral outcomes such as effort, desire, persistence, engagement, initiating and sustaining of activities, and so on. According to Kilis [40], motivation and engagement of learners vary depending on their learning style, so in addition to its flexibility and convenience, m-learning which incorporates extra activities for students to choose based on their learning style increases students’ motivation, engagement, and achievement. Also, considering the fact that speaking in a foreign language is an anxiety-producing experience for most learners, and students experience a great deal of anxiety when they participate in activities that require productive skills such as speaking; the results revealed that mobile learning has reduced learners’ stress and embarrassment, so their motivations to engage in class discussions were increased.

6. Conclusion

The findings of this study demonstrated that EFL learners who participated in mobile learning classes outperformed those who participated in face-to-face classes, and these classes had a beneficial impact on improving learners’ speaking skill. It can be concluded that the students’ progress in this skill was due to the privacy provided by mobile learning, which made it easier for the instructor to discover the individual’s weaknesses and strengths by listening to the voices several times attentively. Another major factor in students’ success with mobile learning was the number of opportunities for learners to access and utilize the vast amount of available material on the Internet for educational purposes and assignments.

Furthermore, based on the results of the questionnaire, it can be inferred that while face-to-face classes have maintained their popularity among learners and its positive impacts on encouraging learners to take the subjects more seriously cannot be overlooked, mobile learning classes have drawn more satisfaction than face-to-face classes. The reasons for this satisfaction could be justified by the nature of mobile learning and the fact that students can study the material whenever and wherever they want. This aspect of mobile learning is more beneficial in the case of language learning because it enables learners to extend their language learning outside the class time, especially when language practice time in class is limited. Despite the low and limited Internet speed, instructors can upload teaching materials electronically, assign roles, determine discussion, receive students’ assignments, and be able to provide immediate and more accurate feedback on their learners’ performances which can be considered as advantages. Thus, it can be stated that the use of technology in the educational environment and the flexibility and individualized settings offered by m-learning increased the motivation and engagement of learners.

The outcomes of this study may have thrown the light on some ambiguity and paved the way to some extent for teachers, EFL learners, and researchers. Additionally, they will make a significant contribution to beneficial educational reforms by assisting educators and teachers in recognizing the importance of mobile educational roles in enhancing speaking skill. Moreover, it can be understood from the upshots of the current study that learners have positive attitudes toward the use of technology and mobile for classes, and they are eager to use more attractive materials in addition to textbooks. Since it would be unfair to dismiss the effects of face-to-face classes and allow them to fade away, the outcomes of this study can be used to justify combining both online and face-to-face approaches.

As other studies, this research includes some constraints due to geographical considerations, research settings, and the characteristics of the statistical community. The main limitation was the statistical population, which was restricted to 60 intermediate level students from only one English institute in Ilam, Iran. As a result, the findings of this study may not be applicable to other students in different situations and levels. Furthermore, the limited number and age of participants may restrict the interpretability and generalizability of the study results.
Appendix

A. Pre-Test and Post-Test

The survey questionnaire is provided in Figures 1–4

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Paper 3  Speaking (10–12 minutes)

Part 1 Personal information (2–3 minutes)

Answer these questions:
- What’s your name?
- What’s your surname? How do you spell it?
- Where do you live?
- Do you work or are you a student?
- Do you enjoy studying English?
- Do you think that English will be useful to you in the future?
- What do you enjoy doing in your free time?

Part 2 Simulated situation (2–3 minutes)

You are choosing a present for your friend’s wedding.
Look at the picture on page 21.
Talk about what presents you can buy, then decide which one to get.

Part 3 Responding to a photograph (3 minutes)

Candidate A: look at Photo 1 on page 94, show it to Candidate B and talk about it.
Candidate B: look at Photo 2 on page 95, show it to Candidate A and talk about it.

Part 4 General conversation based on the photographs (3 minutes)

Talk to each other about the kinds of transport you use. Talk about what you like and dislike about different forms of transport.

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Figure 1: Pre-test page 1.
Figure 2: Pre-test page 2.
Paper 3  Speaking (10–12 minutes)
Part 1 Personal information (2–3 minutes)
Answer these questions:
What's your name?
What's your surname? How do you spell it?
Where do you live?
Do you work or are you a student?
Do you enjoy studying English?
Do you think that English will be useful to you in the future?
What do you enjoy doing in your free time?

Part 2 Simulated situation (2–3 minutes)
You are planning a weekend at a camp-site.
Look at the picture on page 39.
Talk together about the different places to camp and then decide on the best one.

Part 3 Responding to a photograph
(3 minutes)
Candidate A: look at Photo 1 on page 96, show it to Candidate B and talk about it.
Candidate B: look at Photo 2 on page 97, show it to Candidate A and talk about it.

Part 4 General conversation based on the photographs (3 minutes)
Talk to each other about what you do at the weekend. Talk about your favourite kinds of entertainment.

Tip
Think about the right tense to use when talking about yourself, e.g., ‘I live/work/like/have’, “Yesterday I went”.

Tip
Look at the pictures before you start speaking and think of some things you can say.

Tip
Don’t worry if you don’t know the right word for something in the photo. If you need to talk about it, use a word with a similar meaning, or explain what you mean.

Tip
Listen carefully to the examiner’s instructions. Ask if you aren’t sure what to do.
B. The 5-Point Likert Items Questionnaire

This questionnaire was designed to investigate the level of EFL learners’ satisfaction with mobile learning classes and the impact of this approach on their motivation to engage class discussions (Figure 5). Please answer the questions carefully.

<table>
<thead>
<tr>
<th>Questions</th>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Neutral</th>
<th>Disagree</th>
<th>Strongly Disagree</th>
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<tbody>
<tr>
<td>1) I learned this skill better and more through mobile learning rather</td>
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<td>than face-to-face classes.</td>
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<td>2) Mobile has applications and efficient capabilities to enhance speaking</td>
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<td>skills.</td>
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<td>3) Low internet speed is one of the disadvantages of online speaking</td>
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<td>classes.</td>
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<td>4) For the next language courses, I will participate in mobile learning</td>
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<td>speaking classes.</td>
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<td>5) In the speaking mobile learning classes the teacher’s feedback was</td>
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<td>less than the face-to-face classes.</td>
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<td>6) Mobile learning classes motivated me to participate in class</td>
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<td>discussions rather than face-to-face classes.</td>
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<td>7) Mobile speaking classes provided more opportunities to interact with</td>
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<td>other learners.</td>
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<td>8) Face-to-face speaking classes gave me more motivation to follow the</td>
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<td>subjects more seriously.</td>
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<td>9) In mobile learning classes, I could replay my own and my</td>
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<td>classmates’ voices.</td>
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<td>10) I prefer to interact and participate in face-to-face classes</td>
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<td>rather than mobile learning classes.</td>
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<td>11) Thanks to mobile speaking classes and the possibility to replay my</td>
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<td>own and others’ voices, I could find my own strengths and</td>
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<td>weaknesses in speaking.</td>
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<td>12) Thanks to mobile speaking classes, the stressful barriers that</td>
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<td>have prevented me from participating in face-to-face class’s</td>
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<td>discussion (such as shyness, fear of being ridiculed, etc.) were</td>
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<td>decreased.</td>
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<td>13) In face-to-face speaking classes, the instructor examined learners’</td>
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<td>errors more carefully and patiently than in mobile learning classes.</td>
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<td>14) Mobile learning classes were more effective than face-to-face</td>
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<td>classes in terms of time and cost-saving.</td>
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<td>15) Generally, I’m satisfied with mobile learning classes.</td>
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</table>

**Figure 5:** Questionnaire.
Data Availability

Upon other researchers’ request, data can be shared with them.

Conflicts of Interest

The authors declare that they have no conflicts of interest.

References


[38] F. Ataeifar, F. Sadighi, M. S. Bagheri, and F. Behjat, “Iranian female students’ perceptions of the impact of mobile-assisted instruction on their English speaking skill,” *Cogent Education*, vol. 6, no. 1, Article ID 1662594, 2019.
