Assessment of Student Scores Based on Specific Variables in the Web-Assisted English Grammar Exercises

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Abstract

The general purpose of this study is to assess English language grammar post scores of the learners when they have done web supported exercises; the assessment has been done according to gender, attending English courses, out-of-school learning of English language and the use of other sources other than English textbooks. In order to achieve this aim, the research was carried out with a control and experimental group. Experimental and control groups were formed according to the neutrality rule by equalizing certain variables. In the study, "English Grammar Test" and "personal data collection tool", which are valid and reliable, were used as data collection tools. The experimental group followed the English exercise in a web-supported English learning environment. The data were analysed using statistical techniques. At the end of the study, there was a significant difference in favour of women among the subjects in the experimental group, while no significant differences in other factors were observed between the experimental and control groups. As the most important suggestion, mixed or separate learning environments related to and supporting grammar for speaking, writing, listening and reading skills should be developed or explored while learning English or other languages for learners in social media.

Keywords: Web-assisted Learning, English Language Learning, Grammar, gender, social media, out-of-school learning.

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1. Introduction

Education and technology are the two basic tools that people have appealed to in their efforts to dominate the natural and social environment (Ozberk & Ozberk, 2018). In other words, education and technology are affecting each other in the perfection, cultural and development of mankind; influencing nature and its environment and becoming a dominant and influential factor (Yılmaz, Karaoğlan Yılmaz & Öztürk, 2017). Technology, such as education, is also described in a more comprehensive and tangible way by Alkan (2011) as "Creating functional structures necessary to dominate the nature by the work of skills acquired through education. Education, science, technology and educational technology are the basic concepts in gaining scientificity, professionalization, and adopting and employing an understanding of educational technology in a contemporary sense. (Karaoğlan Yılmaz, Yılmaz, Durak, Keser, 2019; Keser, 2000).

Alkan (2011) draws attention that there is a three-way relationship between education and technology. These are listed as benefitting from technological opportunities in education, raising technical manpower and to raise individuals that would adopt to technological environment.

New technologies in education only include new (contemporary) technologies. The difference between old technology and new technology of education can be said as followed. If a technological tool has been used in education for many years, has been used with satisfaction and if it is deficient in answering new demands, then it is an old technology. Whereas, new technologies have the exact opposite features and undertake a new set of functions. Some technologies may be old for some individuals and societies while others could be new. According to Şimşek (1995), one of the criteria that should be discussed is the introduction and conditions of the usage of technology by people.

Each new technology has its own distinctive features such as the usage, advantages and drawbacks. Some technologies can be used alone or by combining two or more technologies (Arnavut & Özdamlı 2016). Today, computer networks are developing and spreading rapidly through new technologies (Aktaş & Çakır, 2017). Computer networks are connecting the education ministry, school and home computers, bringing new dimensions to learning-teaching processes to ensure faster communication.

A computer network is a data transfer or communication system created by connecting multiple computers. Internet is the most recognized and used computer network that is defined as ‘network of networks’. Within the past ten years, the Internet has become the largest network in the world. The Internet consists of the connection of many independent networks (Çağıltay, 1995). The development of the Internet attracts a great interest in the governments. Governments develop internet-related policies through their respective ministries and implement decisions (Milheim, 1997).

Things like summaries about each lesson, educational games, practice questions, bulletin board, sharing research and assignments on web sites are prepared to support the learning-teaching process. This way, students are able to do activities such as resolving and training on subjects that are processed by entering these informational environments (Çetinkaya, 2017; Driscoll 1998; Şen, 1999). In other words, web-assisted learning environments bring new approaches to the learning-teaching process of the lessons, providing new possibilities for enriching the learning-teaching environment (Bayazıt, Bayram & Kadinlkaya Cumaoglu, 2018). Many web-environment learning sites have been developed on the Internet, which is the world’s global network. These web sites offer educational events and network-based lessons on many topics in accordance with the level of each class (Hackbarth, 1997).

Developments in new technologies reveal a new type of communication, fundamental to network-based communication (Sandu, & Gide, 2019). Many researchers are interested in taking advantage of
the education process from the web environment in the teaching of foreign languages; they try to answer what the benefits of these environments are for the students learning foreign languages. However, it may be an optimistic assessment to say that these researches are sufficient in qualitative and quantitative means (Toyoda & Harrison, 2002). According to Demirel (1993), one of the leading authorities in foreign language teaching in Turkey, in addition to these four skills in the teaching of foreign languages in middle schools, mainly grammar is being taught (Arabzoozani & Pahlavannejad, 2019).

Nowadays, even an ordinary person needs to know at least one foreign language –especially English– at the level required by the profession to be fully successful and needs adequate skills in computer technologies (Rahimi & Mouri 2016). In the teaching of English, which is of great importance among foreign languages, it can be of great benefit to employ the latest technology, the Web-environment, in support of the learning-teaching process based on scientific research findings. However, it can be said that the contribution of the Web environment to the learners at the centre of the learning-teaching process of English is a necessity to be considered as a scientific research subject in terms of the success of the learners.

1.1. Purpose of the Study

The general aim of this study is that when the grammar teaching exercises are supported with web,

1. Is there any significant difference according to gender?
2. Is there any significant difference according to the attendance to English courses?
3. Is there any significant difference according to the attendance of the out-of-class study?
4. Is there any significant difference in the usage of other sources other than the English text book?

at the English grammar final test scores.

1.2. Method

1.3. Research Model

This research, aimed at examining the impact of web assisted teaching on student achievement in English grammar teaching, has been conducted in an experimental method of experiment and control group.

The experiment and control group were created considering the rule of objectivity in order to do the research. When learning English grammar, the experiment group represents the group that takes web support and the control group is the group that doesn’t take the support. Table 1 shows the research models shape view and what the icons represent.

<table>
<thead>
<tr>
<th>Group</th>
<th>Random</th>
<th>Independent variable</th>
<th>Post-test</th>
</tr>
</thead>
<tbody>
<tr>
<td>GE</td>
<td>R</td>
<td>Web-supported Teaching (X)</td>
<td>O₁</td>
</tr>
<tr>
<td>GC</td>
<td>R</td>
<td>Traditional Teaching</td>
<td>O₂</td>
</tr>
</tbody>
</table>
Subject Group

The research subjects are high school first-class students who are studying at the Lapta Yavuzlar High School in the secondary Education Department of the Northern Cyprus Ministry of Education. The relevant school has 3 classes in the first class of high school. At this school, students are distributed annually by the School Management to three classes according to their secondary school diploma achievement status. There are 29 students in the class A of High School, 29 students in the class B and 30 students in the class C.

As a result of the draw, class B Experiment Group, class A control group, and class C was for the students from class A and B who do not want to participate in the research.

After the explanation about the study to the experimental Group (class B) and the control group (class A) and informed the students who do not wish to participate in such a work voluntarily that they are free to change their class and go to class C. After the announcement, all students in the experimental and control groups stated that they wanted to participate in such a study voluntarily.

The personal information form was applied to the students in order to determine whether the students have significant differences in terms of their specific characteristics, which might affect the results of the research, and if necessary, to re-group the experimental and control group students. The following is information about the experimental and control group students in terms of their main characteristics.

After determining the experimental and control group, only one male student in the control group was excluded from the study because he answered all the items in the English Grammar Test correctly. Since the student volunteered to participate in the study before being grouped, he was left in the control group, but his personal information, pre-test, post-test, his test information were not included in the statistical analysis.

Gender: Data on gender distributions of experimental and control group students participating in the study are given in table 2.

Table 2. Gender Breakdown of Experimental and Control Group Students

<table>
<thead>
<tr>
<th>Group</th>
<th>Gender</th>
<th>f</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Experimental</td>
<td>Male</td>
<td>14</td>
<td>48.3</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>15</td>
<td>51.7</td>
</tr>
<tr>
<td>Control</td>
<td>Male</td>
<td>13</td>
<td>46.4</td>
</tr>
<tr>
<td></td>
<td>Female</td>
<td>15</td>
<td>53.6</td>
</tr>
</tbody>
</table>
27 of the students were male and 30 were female. In table 2, students who are in the experimental and control group have almost the same number of male and female distributions. Based on these ratios, both groups are equivalent.

**Attendance to the English course:** The data on the attendance of the students to the school's English course are given in table 3.

<table>
<thead>
<tr>
<th>Group</th>
<th>Attendance to English Course</th>
<th>f</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Experimental</td>
<td>Yes</td>
<td>9</td>
<td>31</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>20</td>
<td>69</td>
</tr>
<tr>
<td>Control</td>
<td>Yes</td>
<td>11</td>
<td>39.3</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>17</td>
<td>60.7</td>
</tr>
</tbody>
</table>
20 students from the subjects attended the English course of the school. In the control group, 11 (39.3%) students attended the English course of the school, while 9 (31%) students attended the English course in the experimental group. When looking at the figures in both groups, the school's English course was attended by approximately the same number of students. It can be argued that students in both groups may affect the English grammar achievement averages by almost the same proportions.

Within the framework of the information obtained from the personal information form, experiments and control groups are formed in a homogeneous structure. In other words, gender and English course attendance in both groups influenced the success of English grammar by similar proportions. Based on this information, it can be argued that both groups correspond with each other in terms of certain characteristics.

**Data Collection Tools and Implementation**

The WEB site and the preparation of data collection tools were described in order to achieve the objectives of this research.

Website Preparation process: Prior to the implementation of the study, a Web site was prepared for experimental group students to practice their English grammar. A computer software expert helped while preparing the website. After that, educational science specialists and course teachers working in the field of educational technology gave their opinion about the prepared WEB site. A number of corrections and additions have been made to the Web site in line with opinions and suggestions from experts and teachers. It was then used by 3 high school students under the supervision of the relevant Web site researcher. When using the relevant web site students were observed by the researcher. Finally, the parts that students had difficulty were reviewed and the relevant Web site was made available for Web-assisted instructional application.

After a certain preparation process, the last variation of the "Learning English with WEB Support" site has the following features; User manual, information about the pilot school, English grammar goals and behaviours within the scope of the research, English grammar topics in the scope of research, English grammar exercises, chat room, discussion board, pen pal, English learning games, English-Turkish dictionary, related sites, electronic mail (e-mail), announcements, assignments and reviews.

English grammar test: This is the tool, which were used as the pre-test at the beginning of the experimental process, the post-test at the end of the implementation and monitoring test. The experimental and control groups' English grammar introduction, conclusion and retention behaviours were determined with this test. The same test tool was implemented in both groups. In addition, the same test tool was re-applied to both groups after five weeks of experimental procedure in determining persistence in learning. This information-gathering tool was developed by the researcher.

The preparation process of the English grammar test has evolved as follows. The validity of the vehicle was made based on the opinion of the Expert Group and the scope validity. Firstly, after determining the subjects that were applied during the experimental procedure together with the course teacher, the relevant goals and behaviours were written. Ministry of Education and Culture of the TRNC, the English teachers, the Near East University, Girne American University and the English teacher at Atatürk Teachers' Academy Linguist, English language teaching, education technology, program development and measurement and evaluation experts opinions were taken for the suitability of the objectives and behaviours. After determining the relevant objectives and behaviours, two questions were written for each behaviour. The written questions with the target and behaviour list were given to the relevant expert group to take their opinion again. After the criticism from the group, "English grammar Test" was made available for preliminary test.
The English Grammar Test was applied to a pre-study group of 177 students and reliability and item analysis were conducted.

The information about the item analysis study in standardizing the English Grammar Test was given below.

All items with a discriminatory power greater than .40 were included in the test.

If both items related to behaviour had a value of .40 as discriminatory power, the items with values above .30 were included in the scope of the test in order to represent the determined behaviours in the test (if the values were above .30 in both items having been selected).

Items with a discriminatory power value of less than .20 are not included in the test. Only items 23 (.26) and 54 (.15) were included in the scope of the test in accordance with the opinions of the English language teachers and English linguists in terms of the importance of the behaviour they represented, and improvements in these items.

As a result of item analysis, the number of items included in the test according to their degree of difficulty is as follows.

Easy level .70 - .81: 19 Items

Intermediate .45 - .69: 39 items

Difficult level .24 - .38: 2 items

According to Binbasioglu (1983), in the difficulty index between 0.00-0.39 are difficult questions, between 0.40-0.69 moderate difficulty questions, and between 0.70-1.00 are easy questions (p.76).

Since the discriminatory powers are good, the easy level items (total 19 items) included in the test were made difficult by revising the root or distractors without touching the extracts.

The average difficulty level of the 60 items included in the test was calculated as 0.62.

Based on these results, it can be said that the difficulty level of the majority of the items selected in the scope of the test was collected at a moderate level.

Some behaviours were represented as two and some were represented as one item in the test that was prepared based on the results of discriminative power and item difficulty analyses.

As a result of the pre-test, KR 20 the reliability calculation of the English Grammar Test information collection tool was calculated as .93. In accordance with the opinion of English Grammar Test statistics experts, the reliability calculation was made according to the two-part test methods. As a result of the analysis, the alpha value was calculated as .87 for the first half and .88 for the second half. For the whole test, it was calculated as 0.87 (Spearman-Brown). According to the results of the item analysis conducted on the items of the English Grammar Test, the 82 items covered by the instrument were eliminated on the basis of expert opinion, since the discriminating power and difficulty level of some items were below acceptable rates, and the number of items was reduced to 60.
Implementation

As the experimental group students who participated in the study had sufficient knowledge and skills about computer use, no preliminary activity was required for computer use. Because, the experimental group students took computer lessons during one school year during their secondary school education and they took 2 hours of computer lessons a week during the application.

A session was held with the experimental group subjects who participated in the study before the application. During the meetings, the instructor and researchers provided information to the experimental group about the study, introducing the web_English site, developing the ability to use the web_english site, expected student behaviours from them in the computer laboratory environment during the application, and getting help from the teacher.

In the course of the implementation process, English grammar exercises were conducted in the computer lab of the school with the experimental group and conducted in the classroom with the control group. Both groups had 6 hours of English lessons per week. 4 hours of this period included the knowledge and skills related to speaking, writing, reading, and listening, as well as learning grammar, and 2 hours of this period included exercises on grammar. While teaching grammar information to the experimental group students was done in the classroom environment, the exercises were done with Web support. The control group students did the same subjects and exercises in the classroom at the same time.

The students of the experimental group will be able to use the web-english website during a teaching term to discuss the topics related to English grammar; They have tried to reinforce what they have learned by solving exercise questions, playing games for practice, chatting for practice, and leaving messages on the discussion board for exercises.

The students in the control group were taught related English grammar in the classroom; they tried to reinforce what they learned by solving exercises on paper, playing games for practice, making discussions using grammar rules.

During the application, the researcher was present in each session. Firstly, the teacher tried to solve the problems encountered by the subjects while using the Web_english site, and the researcher tried to solve the technical problems that the teacher could not solve. Before the start of the application hours, all the computers in the computer laboratory were opened to the web-English web site so that the subjects could use them. Since there were 20 computers in the computer laboratory and 29 students in the experimental group, two students were placed alternately to nine computer in each session.

The web_english site was installed on the teacher's computer in order to use the Internet more efficiently during the application and to connect to related web sites faster. Since all computers were connected to the teacher's computer, it served as a server during the application. In addition, only 5 computers were actively connected to the Internet at certain dates to chat with the Internet users outside the group members, leave and read messages on the discussion board. The remaining computers were operated offline connected to the teacher's computer. The subjects performed the activities of chat with Internet users outside the group members, leaving and reading a message on the discussion board in a sufficient number of times.

Data Analysis and Discussion

The data obtained were analysed using the appropriate statistical techniques in line with the opinions of the statistical experts, and then the charts were created and explained and interpreted.
In the analysis of the data collected in order to answer the sub-objectives in the study, the independent samples t-test and the Analysis of Variance were used. Before using the relevant statistical analysis techniques, it was examined whether they met their own assumptions. The suitability of their use in the analysis of the collected data was tested.

RESULTS

The English grammar test scores of the experimental and control group subjects were assessed according to the variables such as gender, attendance to the English course organized by the school, extracurricular working status of the course, and the status of benefiting from other learning resources and tried to determine whether there is a statistically significant difference.

Comparison of The Scores Obtained from The English Grammar Test According to The Gender of The Subjects.

The t-test was used to determine whether there was a statistically significant difference between the scores obtained from the English grammar post-test of the experimental and control group subjects and their gender. In Table 4, the English grammar post-test scores of the experimental and control group subjects and the data related to their gender are given.

Table 4. Comparison of English Grammar Post-test Scores According to Gender of Subjects

<table>
<thead>
<tr>
<th>Group</th>
<th>C</th>
<th>N</th>
<th>M</th>
<th>Differe</th>
<th>S</th>
<th>Sd</th>
<th>t</th>
<th>P</th>
<th>Information</th>
</tr>
</thead>
<tbody>
<tr>
<td>Experimental</td>
<td>E</td>
<td>14</td>
<td>38.07</td>
<td>-8.92</td>
<td>10.54</td>
<td>7.24</td>
<td>27</td>
<td>-2.67</td>
<td>P&lt;.05 Difference</td>
</tr>
<tr>
<td></td>
<td>K</td>
<td>15</td>
<td>47.00</td>
<td></td>
<td>26</td>
<td>.16</td>
<td>.873</td>
<td></td>
<td>Significant</td>
</tr>
<tr>
<td>Control</td>
<td>E</td>
<td>13</td>
<td>35.38</td>
<td>-.68</td>
<td>11.33</td>
<td>11.01</td>
<td>26</td>
<td>-.16</td>
<td>P&gt;.05 Difference</td>
</tr>
<tr>
<td></td>
<td>K</td>
<td>15</td>
<td>36.06</td>
<td></td>
<td>11.01</td>
<td></td>
<td></td>
<td></td>
<td>Significant</td>
</tr>
</tbody>
</table>

As can be seen in Table 4, there was an average difference of -8.92 between the English grammar post-test scores of the male subjects (M=38.07, SD=10.54) and English grammar post-test scores of the female subjects (M=47.00, SD=7.24) in the experimental group receiving Web-supported English grammar teaching. There was a significant difference between male and female subjects in the experimental group in favour of female subjects (t = -2.67, p <.05).

Again, as shown in Table 4, there is a very small average difference between the English grammar post-test scores of the male subjects of the control group who have been traditionally taught English grammar (M=35.38, SD=11.33) and the English grammar post-test scores of the female subjects (M=36.06, SD=11.01) in the amount of -.68. There was no significant difference between male and female subjects in the control group (t = .16, p <.05).
The significant difference in favour of female students between the English grammar post-test mean scores of the experimental group subjects is quite thought provoking. The fact that this significant difference did not exist in the control group subjects led to the interpretation of this result from different perspectives.

According to a limited overview that only takes into account the results obtained, while female students were more successful in Web-supported English grammar teaching practices, it can be interpreted that students' gender did not have an effect on learning in traditional teaching practices. From a broader perspective, it can be thought that this difference between the experimental group subjects might have been caused by other variables. In fact, the fact that both groups did not show similar features may support this view. Evidently, the debate over whether gender has an impact on student achievement is likely to continue in the future as it is today.

**Comparison of the scores obtained from the English grammar post-test according to the subjects' attendance to the English course.**

The t-test was used to determine whether there was a statistically significant difference between the scores obtained from the English grammar post-test of the experimental and control group subjects and their attendance to the English course.

In Table 5, the data on the English grammar post-test scores of the experimental and control group subjects and their attendance to the English course are given.

**Table 5. Comparison of the scores obtained from the English grammar post-test according to the subjects’ attendance to the English course.**

<table>
<thead>
<tr>
<th>Group</th>
<th>KD</th>
<th>N</th>
<th>M</th>
<th>Difference</th>
<th>SD</th>
<th>Sd</th>
<th>t</th>
<th>P</th>
<th>Explanation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Experimental</td>
<td>E</td>
<td>9</td>
<td>43.33</td>
<td>.93</td>
<td>9.66</td>
<td>27</td>
<td>.23</td>
<td>.307</td>
<td>P&gt;.05</td>
</tr>
<tr>
<td></td>
<td>H</td>
<td>20</td>
<td>42.40</td>
<td>10.26</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Insignificant</td>
</tr>
<tr>
<td>Control</td>
<td>E</td>
<td>14</td>
<td>37.00</td>
<td>2.50</td>
<td>11.58</td>
<td>26</td>
<td>.59</td>
<td>.556</td>
<td>P&gt;.05</td>
</tr>
<tr>
<td></td>
<td>H</td>
<td>14</td>
<td>34.50</td>
<td>10.57</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Insignificant</td>
</tr>
</tbody>
</table>

As can be seen in Table 5, there is an average difference of .93 between the English grammar post-test scores of the experimental group subjects who participated in the Web-supported English grammar teaching (M=43.33, SD=10.54) and the English grammar post-test scores of the experimental group subjects who did not attend the English course (M=42.40, SD=10.26). There was no significant
difference between the subjects in the experimental group and the subjects who did not attend the English course (t = .23, p > .05).

Again, as shown in Table 5, there is a very small average difference of 2.50 between the English grammar post-test scores of the control group subjects who have been traditionally taught English grammar (M=37.00, S=11.58) and who did not attend the English course (M=34.50, S=10.57). There was no significant difference between the subjects in the control group who participated in the English course and those who did not attend the English course (t = .59, p > .05).

Based on these results, there was no significant difference between the subjects attending the English course organized by the school and the rest of the subjects compared to the English grammar post-test, and the English grammar post-test achievement scores of the subjects were not affected by the English course organized by the school or were equally affected in both groups.

When we look at the results of experimental group subjects in terms of web-based teaching practice, the absence of a significant difference between the English grammar post-test means of the subjects who participated and did not participate in the English course shows that the post-test scores of the subjects were not affected by the English course.

Comparison of the scores obtained from the English grammar test according to the out-of-school learning status of the subjects.

One-Way Anova (ANOVA) was used to determine whether there was a statistically significant difference between the scores obtained from the English grammar post-test of the experimental and control group subjects and their extracurricular study according to their own assessment of the English course.

In Table 6, the English grammar post-test scores of the experimental and control group subjects and the data related to their out-of-school learning status are given separately.

<table>
<thead>
<tr>
<th>Group</th>
<th>Variance source</th>
<th>Mean</th>
<th>Sd</th>
<th>Medium</th>
<th>F</th>
<th>P</th>
<th>Explanation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Experimental</td>
<td>Between Groups</td>
<td>210.80</td>
<td>3</td>
<td>70.26</td>
<td>.69</td>
<td>P &gt; .05</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Within Groups</td>
<td>2545.41</td>
<td>25</td>
<td>101.81</td>
<td>.567</td>
<td></td>
<td>Difference</td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>2756.21</td>
<td>28</td>
<td></td>
<td></td>
<td></td>
<td>Insignificant</td>
</tr>
<tr>
<td></td>
<td>Between Groups</td>
<td>72.12</td>
<td>3</td>
<td>24.04</td>
<td>.18</td>
<td>P &gt; .05</td>
<td></td>
</tr>
</tbody>
</table>

Table 6. ANOVA Results of Out-of-school Learning Status of Subjects to English Course According to English Grammar Post-test
As can be seen in Table 6, there is no significant difference between the experimental group subjects' English grammar post-test scores regarding their out-of-school learning status according to their own specifications (F (3; 25) = .69, p> .05).

As can be seen in Table 6, there is no significant difference between the English grammar post-test scores of the control group subjects regarding their out-of-school learning according to their own statements (F (3; 24) = .18, p> .05).

These results can be interpreted that the scores obtained by the students in the Web-supported teaching application shows their study habits were not affected. In other words, out-of-school learning habits were not effective in the English grammar post-test achievement of the experimental and control group subjects.

**Comparison of The Scores Obtained from The English Grammar Test According to whether the Subjects Benefit from Other Learning Resources or not.**

The t-test was used to determine whether there was a statistically significant difference between the scores obtained from the English grammar post-test of the experimental and control group subjects and the use of other learning resources other than a textbook. In Table 7, the data related to the English grammar post-test scores of the experimental and control group subjects and their use of other learning resources other than the textbook were given.

<table>
<thead>
<tr>
<th>Group</th>
<th>KD</th>
<th>N</th>
<th>M</th>
<th>Difference</th>
<th>S</th>
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<td>10</td>
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<td>3.98</td>
<td>7.66</td>
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<td>.313</td>
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<td>6</td>
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<tr>
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As seen in table 7, there is an average difference of 3.98 between the English grammar post-test scores of the experimental group subjects taking the web assisted English grammar teaching and other learning resources other than the English text books (M=45.30, S=7.66) and the English grammar post-test scores of the experimental group subjects that did not benefit from other learning resources.
resources other than the English text book with scores of (M=41.31, S=12.92). There is no significant difference between the subjects in the experimental group that had benefitted from other resources other than the English textbook and those who haven’t (t=1.02, p 0.5).

As shown in table 7 again, there is an average difference of .53 between the English grammar post-test scores (M=36.16, S=12.92) of the control group subjects that were traditionally taking advantage of the English grammar teaching and other learning resources other than the English text book and the English grammar post-test scores of the control group subjects that did not benefit from other learning resources other than the English text book which are (M=35.63, S=10.70). There is no significant difference between the subjects in the control group who benefitted from other learning resources other than the English textbook and those that haven’t (t=.10, p>.05).

**Conclusion and Recommendation**

In this study, when the English grammar exercises were conducted with Web support, the results obtained based on the findings of the comparison of the English grammar post-test scores of the subjects according to different variables are as follows.

1. According to the English grammar post-test scores, there is no significant difference between male and female subjects in the control group.
2. According to the English grammar post-test scores, there is no significant difference between the subjects in the experimental group and the subjects who did not attend the English course.
3. According to the English grammar post-test scores, there is no significant difference between the subjects in the control group and the subjects who did not attend the English course.
4. There was no significant difference between the experimental group subjects' English grammar post-test scores regarding their out-of-school learning status according to their own statements.
5. There was no significant difference between the English grammar post-test scores of the control group subjects regarding their out-of-school learning status according to their own statements.
6. According to the English grammar post-test scores, there was no significant difference between the subjects in the experimental group who benefited and did not benefit from other learning resources other than the English text book.
7. According to the English grammar post-test scores, there was no significant difference between the subjects in the control group who benefited and did not benefit from other learning resources other than the English text book.

**Recommendations**

Research on the evaluation of websites providing English language teaching on the Internet should be continued. Research and application studies should be carried out in order to make English grammar teaching more effective in contemporary learning technologies environments. Again, mixed or separate learning environments for speaking, writing, listening and reading skills and grammar supporting these skills should be developed or explored, for the English language or other languages in social media.

**Acknowledgement**

This article was extracted and updated from the author's thesis titled "The effect of web-supported English Teaching on Student Achievement" which was done at Ankara University Institute of Educational Sciences in Educational Sciences Department in Ankara in 2002.

REFERENCES


