



## Investigating the Role of Informal CALL Games in Enhancing ESL Learners' Vocabulary Acquisition

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### Abstract

Learning Vocabulary in Sudan Basic Schools still depends on traditional teaching aids, such as flash cards. This state of affairs drives the students to anxiety and unmotivated attitudes towards learning English language. To solve this problem, this study sets CALL Games in an informal learning environment of vocabulary in order to enhance the students' acquisition.

Data were collected by pretest and posttest. Seventy pupils from Sinnar Sugar Company Basic school have been chosen as a sample of the study. The Experimental group performed better than the Control group as a result of the independent variable. The findings provide clear evidence for the effectiveness of CALL vocabulary games in an informal, interesting and competitive environment in developing vocabulary acquisition.

**Keywords:** *CALL, IT, Vocabulary Acquisition, SPINE, Informal Environment.*

### المستخلص :

يعتمد تعلم المفردات الانجليزية في مدراس الاساس في السودان على الوسائل التقليدية مثل البطاقات التوضيحية التي من شأنها تقلل من المحفز لتعلم اللغة الانجليزية. تبنت هذه الدراسة العاب الكمبيوتر المساعدة على التعلم في بيئة تنافسية مرحلة لتقوية اكتساب المفردات. تم جمع البيانات من خلال اختبار قبلي و بعدي . تم اختيار سبعين طالب من مدرسة سكر سنار الاساسية لهذه الدراسة. تفوقت المجموعة التجريبية في الاختبار على المجموعة الضابطة و يعزى ذلك الي المتغير المستقل. تظهر النتائج دليل واضح على فعالية البرنامج المقترح في اثناء اكتساب المفردات الانجليزية.

### Introduction

One of the most difficult aspects of learning a foreign language is the task of vocabulary building. Vocabulary learning plays a major role in English Language learners' success. Teaching English to young learners is not an easy task because English is not their mother tongue so they need to be motivated as well as setting clear objectives and aims. Raising students' performance in learning English is a key factor in foreign language teaching. Using Call in an informal learning environment incorporated with vocabulary games is an effective way to maximize vocabulary learning process. Six grade pupils are given the opportunity to build their vocabulary through both CALL games and informal environment in the course of using a technologically.

### **The Effects of CALL**

Numerous research studies have been conducted to determine the effect of CALL on students' performance, learning, and attitudes within the context of learning English as a second or a foreign Language. They have been conducted across all levels of education: elementary, secondary, post-secondary, and adult. Several reviews of these studies have been published in recent years. Most of the reviews used a sophisticated analysis technique referred to as meta-analysis, which allowed them to equate the results from many different studies and determine an average effect size across all the reviewed studies.

Kulik and Kulik (1991:87) combine data from an analysis of 199 comparative studies: 32 of these studies were conducted in elementary school, 42 in high school, 101 in institutions of higher education and 42 in adult education settings. The results of their meta-analyses showed that CALL when compared to conventional instruction, raised examination scores by 0.31 standard deviations, or from the 50th to 61th percentile. Also, these two authors found that 28 of the studies reported that CALL reduced instructional time by an average of 32 percent, and 17 studies indicated that students' attitudes toward instruction were raised 0.28 standard deviations. (Merrill et al. (1996:133). These results indicate that CALL can have positive effects but is not necessarily a complete cure for all the educational problems.

### **Effects of Computer on Students' Thinking:**

Educational researchers also state that computers can be used as trigger of students' critical thinking and learning style. There are different views about the impact of the deliberate (as opposed to accidental) exposure of young students to IT devices. The most important thing is to know, for example, about the effects of CALL games on students' thinking which has great effect on the overall learning process.

### **Using CALL Games in an Informal Learning Environment:**

Computer games have grown in popularity, and as they have achieved an unparalleled position in terms of youth culture and economic importance so its interest has grown rapidly.

Computer games are the most successful in schools in attracting interest and motivation of young people. This is a part of a wider crisis about contemporary schooling common to many societies where it appears as if commercial initiatives like the computer game industry are winning the competition for the hearts and minds of the young. This approach is to study games as an original medium for vocabulary acquisition. This is not to deny the relationships that do exist between learning in computer games and learning in other kinds of education. But it concentrates exploring how players learn to play games in informal settings and the nature of vocabulary learning.

Oblinger (2006) finds that:

*Students do not touch, see, or hear passively: they feel, look, and listen actively. Students may direct their attention to particular targets in the learning environment that they find more interesting, important, or unfamiliar than others. (p.62)*

### **Questions:**

1 .What is the effect of the informal CALL games on developing the participants' vocabulary acquisition?

## Methodology

### Participants and Setting

Seventy pupils from Sinnar Sugar Company Basic School have been chosen as a sample of the study. The sample was chosen randomly and the choice of sampling was not based on certain vocabulary level. Students' age range 11-12 years old. The experimental group (EG) consisted of 35 students; and the control group (CG) consisted of 35 students. Both groups had the same ability. Mean difference is (-0.92), even though the details about the subjects' social and educational backgrounds were not checked, it is believed the majority, if not all share the same background(they are students of employees in Sinnar Sugar factory), this belief was confirmed by the school headmaster Samia Mergani.

### Procedure

There were two groups, the experimental and the control group. The experimental group was taught through CALL games in an informal environment; and the control group received no treatment. Both groups were taught the same material based on the curriculum of "SPINE 1" at the same time. At the end of the treatment, the experimental group and the control group received a posttest, and the results of the two tests were compared to find the significant differences between the experimental group and the control group.

## Results

### Experimental and Control Group: pretests Results

**Table (1): Experimental and Control Group: pretests Results.**

Questions	Means of Control Group Pretest	Means of Experimental Group Pretest	Mean differences	P-Value
Q1	2.06	2.34	0.28	0.214
Q2	1.86	2.09	0.23	0.3
Q3	3.26	2.74	-0.52	0.182
Q4	1.51	1.11	-0.4	*0.012
Q5	2.37	2.17	-0.2	0.329
Q6	1.97	1.71	-0.26	0.186
Q7	2.06	2	-0.06	0.814
Total	15.09	14.17	-0.92	0.192

Close inspection of the data presented in the table above reveals the following:

- Pre data means of scores obtained by both groups indicate that both groups (control & experimental) were weak in English.
- The lowest pre data means of scores is in question no.4: Control (1.51).experimental in question no.4: (1.11).
- The highest pre data means of scores is in question no.3: control: (3.26).experimental: (2.74).
- The mean differences range between (-0.2) and (-0.52).
- Comparison of the pretests means of scores and mean differences shows that both the control and the experimental groups had similar scores in the pretests. The P value indicates that there is a difference between the two variables. Although the means showed a little differences, but sixth graders' vocabulary level wasn't that much different. This means that their learning background is the same.
- Therefore, it can be assumed that the experimental and control groups were homogeneous and equivalent before conducting the experiment, and that the change in

the students' vocabulary acquisition would be attributed to the effect of using the proposed teaching program.

### Experimental and Control Group: posttests Results

**Table (2): Experimental and Control Group: Posttest Results**

Questions	Means of Control Group Post test	Means of Experimental Group Post test	Mean Difference	p-value
Q1	2.83	4.51	1.68	0.000*
Q2	2.43	4.06	1.63	0.000*
Q3	4.91	8.49	3.58	0.000*
Q4	1.71	2.71	1	0.000*
Q5	2.74	5.31	2.57	0.000*
Q6	2.49	4.46	1.97	0.000*
Q7	2.77	4.23	1.46	0.000*
Total	19.88	33.77	30.94	0.000*

The table indicates the following:

- Post means of scores reveal a high level of learning in the experimental group.
- The lowest post means of scores in the control group are in question no.4. (1.71); the lowest post means of scores in the experimental group are in question no.4. (2.71).
- The highest post means of scores in the control group are in question no.3. (4.91); the highest post means of scores in the experimental group are in question no.3. (8.49).
- The mean difference in the post tests for control and experimental groups range between (1) and (3.58).
- The p-value shows a significant difference between the two post tests because a low significance value for the p- value typically less than (0.05).
- There were significant differences among the mean scores of students' vocabulary performance in the control and experimental groups in favour of the experimental group. This means that the students in the experimental group who were instructed to acquire vocabulary according to the proposed program were much better than those in the control group who were instructed to learn according to the traditional method.

### Discussion

The difference between the means of control group pretest and posttest showed a little difference. The control group showed difference but it was nothing compared with a remarkable significant difference in the experimental group.

To interpret the results, some important points should be mentioned. Students played relevant games to the syllabus of SPINE (1). Teaching according to the proposed method was mostly student-centered instruction. Most of the job was done by the students themselves. The teacher was merely a facilitator and supervisor. Vocabulary of each lesson from SPINE 1 were displayed graphically (pictures) in front of the students while they were playing games. Therefore, the researcher, who had a close look at the students' vocabulary acquisition during the different stages of the experiment, noticed a clear and real progress in the quality and quantity of their acquisition and production. Consequently, the researcher would attribute the higher mean of scores of the experimental group on the posttest to the proposed teaching and learning program. The findings of the study indicated that there were statistically significant differences between the experimental group and the control group. The mean score of the students of the experimental on the posttest was (33.77) which was higher than mean score of the control group (19.88). The results of this study can convince English teachers of the usefulness

and benefits of these vocabulary games in teaching SPINE 1. This suggests the need for effective guidance, support and training for teachers in integrating CALL games into vocabulary instruction through more hands-on and directly practical experience. . The afore-mentioned result is in line with the findings of Alemi (2010) which indicate that the uses of games have positive effect on vocabulary development of third grade junior high school students. The researcher tried to study the potential usefulness of games as a useful technique in the inclusion of more practical aspects of learning vocabulary into language classroom. It was also in harmony with the findings of Pelletreau (2006) which show that students' vocabulary are significantly higher in the proposed program when compared to the traditional teaching method. In conclusion, the findings of this study provide clear evidence for the effectiveness of CALL vocabulary games in an informal, interesting and competitive environment in developing vocabulary acquisition.

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