

The Effects of Using Mind Mapping Techniques in English Vocabulary Learning for Grade Ten Students at local School

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عنوان الدراسة: فاعلية استخدام الخرائط الذهنية في تعليم مفردات اللغة الانجليزية لدى طلاب الصف العاشر

ملخص الدراسة

تسلط الدراسة الضوء على تعليم المفردات من خلال استخدام الخرائط الذهنية وتأثيرها على قدرة التذكر لدى طلاب الصف العاشر لاستعادة المفردات وعلى فهم معانيها. وتم جمع البيانات الكمية باستخدام البحث التجريبي باستخدام اختبار قبلي واختبار بعدي من خلال تطبيقهما على عينة قوامها ٥٢ طالبا في شعبتين من الصف العاشر من مدرسة قتيبة بن مسلم للتعليم الأساسي في محافظة الشرقية جنوب في سلطنة عمان. طبق على المجموعة التجريبية طريقة الخرائط الذهنية ولم يطبق في المجموعة الضابطة سوى طرق التدريس الاعتيادية. أشارت النتائج إلى أن أداء الطلاب في المجموعة التجريبية والضابطة كان متماثلا في التطبيق البعدي بعد استبعاد اختلاف مستوى الطلبة في تذكر المفردات قبل التطبيق. ودلت هذه النتائج على عدم تفوق طريقة التدريس بالخرائط الذهنية على الطريقة الاعتيادية في زيادة قدرة الطلبة على حفظ المفردات اللغوية في اللغة الانجليزية.

Abstract

This paper casts light on vocabulary teaching through mind mapping techniques in classrooms and its impact on the mnemonic ability of Grade Ten students to retrieve vocabulary items. As experimental research, quantitative data was collected using pretest and posttest design. In relation to participants, 52 students participated in this study representing two Grade Ten classes; an experimental group and control group. The results indicated that students in the experimental group performed similar to the control group after controlling their differences in the pretest. This result did not support the idea that mind mapping techniques can improve students' vocabulary retention.

Key words: Mind Mapping Techniques, Mind Maps, Vocabulary

I. INTRODUCTION

In response to the educational reform in Oman in 1998, Basic Education was tailored to include three cycles: cycle one (1-4), cycle two (5-10), and post basic education (11-12). The Basic Education system aims to enhance the quality of education with very advanced teaching and learning methods supported by updated curricula. This system places more emphasis on having meaningful inner communication between the student and the textbook and effective interaction among the students themselves to result in creative work. The practitioner acts as a learning facilitator monitoring their work, offering advice and praising their work output.

English language has become the international language to be worth incorporating in didactic curricula. As a key factor to thoroughly develop education in Oman and increase the number of English native speakers, there has been a pressing need to grow up a well-educated generation of schools, colleges, universities and vocational institutes, articulating English in a skillful manner. This is to establish a sustainable development in educational reform and all industrial fields. In effect, English in Basic Education System is taught in public and private schools from Grade One to Grade Twelve as a school subject alongside other subjects. Students of different Grades are normally given two textbooks in public schools, Classbook and Workbook. Large classes with limited contact hours are emphasized in order that EFL settings take place.

When it comes to vocabulary teaching, it is considered one of the major constituents to communicate ideas. It therefore seems to be that the more students take hold of vocabulary, the more the intake is likely to be efficacious. Lacking vocabulary items appears to be an issue for students when conducting causal conversations. "One of the most obvious linguistic factors affecting communicative effectiveness is vocabulary" (Jarvis & Stephens, 1994, p.2). Based on this, varying vocabulary techniques in teaching and learning practices has the ability to motivate students to use English effectively and efficiently. In the Omani context, the glossary of

terms and wordlists in school textbooks are given primacy to broaden students' vocabulary repertoire.

Mind mapping has become one of the most contemporary recommended teaching techniques not only in the field of education but also in the other fields. A number of its advocates have exhibited its effective role in teaching practices. It is claimed that mind mapping leads to creativity, that it portrays a central idea or image radiating from connected words and illustrative drawings to shape ways on thinking of some topics (Buzan, 1995; Murley, 2007; Siriphanic & Laohawiriyano, 2010; Al-Jarf, 2011). At the end of the 1960s, Tony Buzan introduced mind mapping to the world. Several educators, researchers, authors and psychologists have made the most of mind mapping since its advent. Buzan (2006) shows the marked impact of imagination on the human brain when it comes to processing pictures, images, colours and texts in mind maps. This helps trigger multiplying synergetic thinking and leads to creative thinking.

Using mind maps helps connect ideas, write reports, make decisions, and take notes (Li, Yang & Chen, 2010). In a broader sense, students are encouraged to use mind maps to solicit appropriate words and phrases coupled with images. This is suggested that this stimulates and boosts productivity of memory retention.

Learners need optimal vocabulary instruction to get adequate exposure to the lexicon and urge them to use English effectively. One of the helpful tools in teaching vocabulary items is the mind mapping technique, namely webbing (Learning Assistance Centre, 2009). It is said that mind mapping can be conducive to fostering learners' ability to communicate. It is necessary to be mindful of the fact that a mind map is a learning tool not a solution in its own right (Thomas & Speller, 2007)

1. Research Problem:

It has long been a matter of concern that EFL students learn the language for more than eleven years and show a poor repertoire of lexical items when they engage in casual conversations or produce written work. The researcher's decision to conduct the present research, (in the Sharqia South region of Oman) was intended to examine the

EFL students' (in)ability and to explore the extent to which mind maps were effective in fostering vocabulary retention and recall.

In this study, quantitative data collection was applied to collect data through holding an interview with three students from the experimental group and three students from the control group. The interview comprised six structured and unstructured questions (See Appendix A). The questions were designed by the researcher to solicit students' views on whether they had difficulty in recalling their textbook lexical items. The interview was conducted in the students' mother tongue.

With respect to the findings of the interview, although the respondents emphasized the importance of vocabulary items incorporated in their textbook, it appears that recalling words in diverse contexts is unattainable. It is believed that this concern results from lexis containing more than two syllables and rarity of its use. It is also claimed that learning and using words rely on memorizing, dictation, repetition strategies that are implemented in classrooms exclusively and that the inspirational source of familiarizing words is teachers. A closer look to the learners' needs is of paramount importance to implement a more efficient vocabulary teaching method in the field.

This study focuses on English language education in Oman's public schools especially at the basic level, Grade Ten. It stresses the importance of using mind maps to enhance students' mnemonic abilities to retain vocabulary items, and how such mind maps have impacted their learning. Mastering vocabulary items needs an effective technique which makes students more willing to learn. Previous studies, such as Fiktorius (2013), Long and Carlson (2011) and Toi (2009), claimed the effectiveness of using mind mapping techniques in the classroom for the sake of empowering students' mnemonic abilities to retain vocabulary items effortlessly. The connections of such words or phrases make sense to the student doing the map. As a result of the efficacy of mind mapping techniques, there is a pressing need to integrate it into Oman's curricula, not only to boost creative thinking, but also to help remember things.

2. Research Questions:

The purpose of this study is therefore to highlight the impact of mind map techniques on students of Grade Ten in Cycle Two in Qutaiba School in Oman and prevent them forgetting the learned words. It was hoped that the experimental group would then be able to anticipate potential challenges, and that this pedagogical technique could be transferred to the classroom with ease.

In response to the aforementioned challenge and to connect theory to practice, the following specific research question was investigated.

1. To what extent can mind mapping techniques help Grade Ten students at Qutaiba School retrieve vocabulary items from their English language textbook?

To answer this question, the following hypothesis is formulated and tested by data collected in this study:

H0: It is not effective to use mind mapping techniques in teaching vocabulary proficiency.

H1: It is effective to use mind mapping techniques in teaching vocabulary proficiency.

3. Significance of the Study:

In the light of the research question, this study tends to support the teaching practices in the following points:

- ١- The present research is believed to be the first of its kind in the Omani context.
- ٢- It would broaden students' repertoire of vocabulary, using English in context.
- ٣- It would help teachers vary vocabulary teaching techniques in the classroom.
- ٤- Stakeholders would benefit from its findings. They could be used for other research purposes, designing up-to-date tasks and understanding the students' ability to improve vocabulary exposure.
- ٥- It would provide training centres of the Ministry of Education with accurate information to identify teachers' needs for workshops and courses in terms of vocabulary teaching.

4. Terminology:

Mind mapping techniques have been adopted in teaching practices with the intention of empowering students and developing their potential vocabulary with the intention of using it in diverse contexts. A mind map, therefore, is worth a thousand words since it is believed to help evoke connections in students' brains and allow them to be more productive and creative. This mind map can be cultivated and implemented in collaborative teaching and learning practices.

Vocabulary items revolve around students' school textbooks, stressing the importance of all the main headings of their topics, radiating in a purposful and expressive way. Students can collect words and phrases in consultation with school textbooks, fellow students and teachers.

II. THEORETICAL BACKGROUND

It is vitally important to shed light on the importance of vocabulary in languages. Students require sufficient vocabulary items to have a say, understand others and express their feelings. When it comes to language use, a language user is supposed to think effectively and naturally to produce sufficient language according to context. This requires a powerful learning tool to empower a language user to capitalize on ideas. Mind maps can make a difference to a language user as they connect pictures to words in the brain. It seems important to clarify that situations tend to demand vocabulary items to engage in and convey explicit messages. Hence, vocabulary knowledge is considered the key to language use. On a regular basis, learners are subjected to causal conversations demanding them to understand, recall and respond logically. Lewis (1993) describes lexis as "the core or heart of language" (p.89). Wilkins (1972) has reported that "while without grammar very little can be conveyed, without vocabulary nothing can be conveyed" (pp. 111-112).

According to Buzan (1995), a mind map displays many colours with a central image and a radial diagram representing semantic or other relations between parts of the learned material in a hierarchical manner. This makes it stand out from a concept

map, which is a top-down diagram. Likewise, a conceptual diagram is often based on theory or a model exhibiting boxes in a connected framework. The visual metaphor uses shapes and elements of a familiar natural or a man-made artifact. It is believed that the mind mapping technique boosts student's brain power and memory retention. According to Buzan (1986), the memory techniques portray a system of memory codes that enable people to recall perfectly in a speedy way making connections to words, numbers and ideas with the equivalent shapes that occur in the mnemonics. A mind map is viewed as "an expression of multidirectional thinking, as well as a natural function of the human mind. It is also a powerful graphic technique which provides a universal key to unlock the potential of the brain" (Buzan & Buzan, 2000)

Toi (2009) has reported that mind maps have the ability to help learners recall vocabulary items more effectively than using wordlists. With reference to Murley (2007), she recommends using pens of multiple colours and varying thicknesses. Farrand et al. (2002), moreover, use a fact-recall test for medical students in a bid to enhance performance. The control group used the usual techniques such as keywords; whereas the experimental group used mind mapping techniques. However, the experimental group exhibited better performance than the control group.

Four distinguishing features make mind mapping techniques differ from other teaching techniques. Buzan (1995) emphasizes starting with an image centering the mind map since the brain invokes more images than words. Furthermore, this central image radiates ideas showing connected branches. This subsequently reflects a final hierarchical structure of the mind map portraying connected nodes. Eventually, each branch displays keywords or colourful images. In effect, the use of images is endorsed in the entire mind map (Budd, 2003).

It seems that providing word explanations and repetition in teaching practices does not enable some students to retain the words required for a situation (Pua, Li, Lui & Cheng, 2014). To prove this, Long and Carlson (2011) point out that engaging students in thinking maps manifests optimal solutions to understanding and is superior to traditional note-taking strategies. Fiktorius (2013) has also reported that mind mapping

techniques support learners in achieving more in the posttest. Most importantly, Heidari and Karimi (2015) state that their experimental group also showed a greater performance than the control group in relation to the posttest, corroborating the positive effectiveness of mind maps on boosting word retention. Concerning using mind maps in favor of reading comprehension of narrative texts, Indrayani (2014) confirms the positive effectiveness of mind mapping techniques in teaching reading.

The use of mind mapping techniques has fostered debate on whether it boosts students' performance and achievement. Jain (2015) has reported that the performance of mind mapping group appears to be better than the non mind mapping group in science subjects concerning concepts and idea brainstorming. In contrast with the current study, it seems that adapting mind maps for the classroom can be a tremendous advantage in connecting the left side of the brain to the right side of the brain. This provokes and externalizes lexical items or ideas whenever they are needed. Mind maps can also facilitate learning by building new knowledge onto previous knowledge. Obviously, students are committed to supporting their main topics with associative branches or ideas to create a mind map. It is also believed that they help organize thoughts and brainstorm ideas in a purposeful manner. The consensus view seems to be that mind mapping is a useful tool to develop comprehensive understanding of all the key concepts involved in a subject area (Gilbert, 2007). For instance, Polson (2004) has found that mind mapping techniques had the ability to raise students' attainment in History. Teachers' views rest on the assumption that mind maps foster students' motivation and involvement in their learning, and Pua, Li, Lui & Cheng (2014) have found that elementary students in Hong Kong seem to have capitalized on mind mapping techniques for simplifying knowledge acquisition and the retrieval process over long periods of time.

To keep abreast of the latest updates in a combination of education and technology in classrooms, it is essential to guide students to design their own mind maps using software programs. Al-Jarf (2011) used mind mapping software, the Free Mind 0.9.0 software, to enhance students' abilities concerning spelling rules, phonics

and the pronunciation of the vowel sounds. It is also worth indicating that such software can help in grouping, organizing and classifying words on the basis of sound-symbol associations. Due to this, she has reported that this software can improve both word and concept knowledge in addition to improving comprehension across grade levels for different types of learners including struggling ESL and learning disabled students.

III. METHODOLOGY

1. Research Design:

This experimental study attempts to describe the effectiveness of mind map techniques on students' mnemonic abilities to recall and attain vocabulary words that they have already learned in context. The study used an experimental design to achieve its purpose. The experimental group was intended to use mind mapping techniques instead of wordlists. By contrast, the control group was supposed to refer to the wordlists included in the students' textbook. Through the use of pretest and posttest, this study collected data from participants and thereby answered the research question that had been posed.

This research attempts to use mind mapping techniques in context, instead of the wordlists included in the students' textbook. It was therefore imperative to give students a seminar on the importance of mind maps, and how they improve recall and attention before introducing the technique. This took place before starting Unit eight of Theme three of the students' textbook. Students were also reminded to bring exercise books to the classroom. When the lesson was given, students would be instructed to draw their mind maps of vocabulary focusing on the connections between the vocabulary words. Each theme in the textbook consists of fifteen units. It was in the researcher's interest to allocate a period after completing each unit. The assigned period revolved around doing a mind map of vocabulary obtained from the previous unit. Students sat in the classroom in a conference shape. This helped them use the stationery effortlessly and observe the activities carried out by their peers. Students

gathered to revise and finalize their mind maps and compare them to others', but they would also be presented with a model mind map executed by the researcher at the end of the period. Since it was a paper-pen based mind map, students were provided with a large sheet of white blank paper and different colours.

With reference to the treatment, the experimental group understood the way used to describe word connections, the requisites for drawing a mind map and the utmost importance of boosting their mnemonic abilities to recall and retain vocabulary items. This was intended to serve as an introductory phase of the experiment. When it came to making a map of the learned units, the students were required to include words from the unit itself and consult the wordlists at the end of their textbook. Thirty target words (See Appendix D) were taken from the six units of Grade Ten Coursebook of the second semester (pages 26 to 30). Twelve periods, over two weeks, would be sufficient to terminate the treatment program. Those periods would be allocated for the six units (8, 9, 10, 11, 12 and 13) of Theme three. During these periods, the students would make their own mind maps, individually, relying on their creativity. The same six units were also applied to the control group using the recommended teaching methods incorporated in their textbook.

2. Participants:

The population of this study consisted of Grade Ten students in Basic Education in Qutaiba School, in the Sharqia South Governorate of Oman during the 2015/2016 school year. The total number of these students was 104.

The sample of this study consisted of 52 EFL students who were selected from the target population. The sample represented 50% of the whole population available in the school. Two groups of the students, 30 students for the experimental group and 22 students for the control group, represented the sample of the population; effectively two different classes.

3. Instrument

To pinpoint the effectiveness of mind mapping techniques in this current study, the researcher used an achievement test as an instrument. This was to gather data obtained from the pretest and posttest for the experimental and control group.

With respect to the pretest and posttest, it each was carefully constructed to display three parts of questions for the two classes. Part one involved a multiple-choice question of ten items weighing two points for each, whereas part two included a matching question about definition of five words weighing two points for each. The matching question shows two lists of linked phrases. Each item in one list is paired with a definition in the other list. Part three comprised a matching question about meaning of five words, weighing two points for each. Hence, the achievement test weighs forty points. The total score ranges from 0 to 40.

Based on the test used in this research, the matching question about word meaning offers a sentence with a key word with the hope of selecting the right synonym from the four options. All parts of the questions were derived from the Grade Ten students' textbook of the first school semester during 2015 - 2016. This was to determine whether students were able to recall vocabulary items that they had studied. The test placed extra emphasis on the lexical items identified by the textbook wordlists and the glossary of terms at the end of the textbook themes (See Appendix B). The pretest examined the students' ability to recall the lexical word. In alignment with the pretest, an equivalent posttest was held after the trial took place, showing similar types of questions with different lexical words. Therefore, the posttest was tailored to examine the students' ability to recall the lexical items learned during the treatment. With a view to internal consistency reliability, Cronbach's coefficient Alpha was used and it was (0.82) for the pretest, and (0.85) for the posttest (See Appendix C).

IV. RESULTS

This section presents the results of this current study in line with the research question based on data collected from the achievement test. To answer the research

question, it was essential to begin analyzing the pretest and posttest. Independent samples t-test in the SPSS software program was used to compare the means of pretest scores between the experimental and control group and presented in Table 1.

Results showed that the experimental group and control group differed significantly in their pretest of vocabulary as the value of t test was 2.58 with a p-value of 0.013. The average score of experimental group was 13.27 while the average score of experimental group was 7.55. This result indicated that the two groups were not equivalent before the experiment. Since students are distributed to classes at the beginning of the academic year and the experiment was carried out at the end of the academic year, there was no possibility to have control and have different students into the two groups of the study.

Table 1. Independent Samples t test for pretest of vocabulary between experimental and control groups.

Group	N	Mean	SD	t-value	df	p-value
Experimental	30	13.27	8.26	2.58	50	0.013
Control	22	7.55	7.40			

As a result of inequivalent groups, analysis of covariance is used in this study to control for the differences between experimental and control groups in their ability to recall vocabulary. Table 2 presents the descriptive statistics for the two groups in both pretest and posttest of vocabulary. It can be seen from Table 2 that the average scores for both experimental and control groups increased from pretest to posttest of vocabulary. To study the amount of effect of mind mapping technique on vocabulary as compared to the typical teaching method, the average scores of experimental group and control group in their posttest were examined after controlling for their differences using analysis of covariance. Table 3 presents the results of analysis of covariance for the difference.

Table 2. Descriptive statistics of pretest and posttest of vocabulary between experimental and control groups

Group	N	Prescore		Postscore	
		Mean	SD	Mean	SD
Experimental	30	13.27	8.26	16.93	11.11
Control	22	7.55	7.40	11.18	6.34

As presented in Table 3, results showed that the experimental group was not statistically significant different from the control group ($F=0.223$ & $P\text{-value}=0.639$). The differences on the average score of posttest of vocabulary for the experimental group (16.93) and control group (11.11) disappeared after controlling for their differences on pretest scores. This result indicated that the mind mapping technique performed similar to the typical teaching method followed with the control group. Based on this, the mind mapping techniques appear to be ineffective in boosting students' retention of vocabulary items from their textbook to the required degree.

The finding could be attributed to a number of factors. The experimental and control groups were taught by one teacher setting forth similar vocabulary items. Perhaps the intermingling of the experimental and control group occurred and that transferred the mind mapping techniques to the control group resulting in learning the target words correspondingly. Another issue could be of the small number of target words used for the both achievement tests. It might be that the control group's performance was affected by a distinguishing vocabulary teaching method that enabled them to recall words efficiently. Creating a mind map demands sufficient time which an asset most of us lack. It is possible that students were mainly dependent on the recommended vocabulary techniques found in their textbook. Another potential issue is that simple associations and vague links between ideas in a mind map are considered constraints hindering progress. Using the three types of questions in the present study might be an issue. Perhaps students also were not accustomed to the three proposed questions in the current research since they do not occur in the official document of the Ministry of Education.

Table 3. Analysis of covariance of posttest of vocabulary between experimental and control groups

Source	Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared
Prescore	2206.172	1	2206.172	48.674	0.000	0.498
Group	10.098	1	10.098	0.223	0.639	0.005
Error	2220.968	49	45.326			

Thus, failing to reject the null hypothesis seems to be obvious since adopting the mind mapping techniques in teaching and learning practices was ineffective in maintaining high standards of recalling vocabulary items. Compared to the recommended vocabulary teaching methods adopted in Grade Ten textbook, it seems that mind mapping techniques can function and affect students' vocabulary retrieval in like manner.

V. DISCUSSION

To fulfill the purposes of this current study, it is of vital importance to answer the research question centering on the students' ability to retrieve vocabulary items from the school Grade Ten textbook. In this section, the discussion will point to whether Grade Ten students capitalized on the mind mapping techniques and to what extent it assisted them.

The main theoretical premise behind the present study is that mind mapping techniques cannot be generally effective in drawing students' attention to vocabulary items for the purpose of retention when needed in context. Mind mapping techniques cannot therefore be said to be of utmost importance in engaging students in diverse casual conversations because they cannot overcome traditional vocabulary techniques. A closer look at the data indicates that the experimental group showed progress in vocabulary retention to the same degree as the control group. The differential between

the experimental and control groups is that the former appears to make progress because they associate words and ideas that students occasionally encounter with images that they discover. These assumptions require students to have the ability to evoke prior knowledge. As was observed, students showed willingness to learn through mind mapping techniques. There is overwhelming evidence corroborating the notion that students who work in groups can contribute to increasing their learning capacity and enrich their repertoire of lexical items.

With reference to the researcher's observation of the present study, it was observed that students of mixed English levels can best perform in the classroom by consulting diligent students, sharing materials, showing respect to each other, with no restrictions limiting them from brainstorming ideas. It is also worth noting that including mind maps in Grade Ten textbooks can connect language practice to humor, interrelationships, creative skills, collaborative work, visual learning, learning by doing, outdoor activities and research. In line with the researcher's observation, medical researchers and educators have sought optimal solutions to facilitate information retrieval and critical thinking on the part of students.

As opposed to the above standpoints, Farrand et al. (2002) report that learners were less motivated and less keen on using mind maps despite it being memory enhancing technique. This aligns with the current study as it revealed the inability of mind mapping techniques to enhance students' retention of their textbook vocabulary. Thus, it is imperative that learners engaged in creating a mind map be fully acquainted with the topic. Eppler (2006) believes that mind maps are difficult to read and inconsistent with the flow of ideas. This suggests the ineligibility of mind maps to promote vocabulary retention. When it comes to grasping a topic before starting a mind map, learners typically manifest distinct potential. Based on this, choosing the right keywords and thoughts in a mind map helps learners recognize what to include and what to exclude.

It would appear that a constructivist approach reflects mind mapping techniques as it helps students explore and explain. The results of the current study show

inconsistency with international studies; but there is insufficient research with respect to mind mapping techniques in Oman. Simonova (2014) asserts that France, Finland, and the UK and many other countries have inserted mind mapping techniques in educational curricula. He develops the claim that mind mapping techniques support learning retention. On these grounds, D'Antoni et al. (2010) have found that mind mapping and note-taking demonstrate a similar impact in terms of short term retention, in contrast to the long term retention pertaining critical thinking that shows mind maps' superiority to note-taking, since critical thinking takes time to develop. This study contradicts findings from a study conducted by Batdi (2015). Santiago (2011) propounds the view that mind mapping is a powerful tool for brainstorming, note-taking and developing clinical scenarios.

VI. RECOMMENDATIONS

In light of the study's findings, the following recommendations are now made :-

- ١- The Ministry of Education should incorporate vocabulary teaching methods in detail in the teacher's book. These should be crystal clear to the stakeholders.
- ٢- The Ministry of Education should assign a trainer teacher in schools to supervise teaching practices and put them into effect. As a result, school teachers would not have to attend in-service training programs at training centres and miss classes.
- ٣- Teachers should be more knowledgeable about teaching methods in all language skills in order to use the aligned teaching method according to the context.
- ٤- Teachers should utilize the school walls and be more interactive using posters, realia, pictures, signs for directions, labels and diversified teaching materials. It is important to keep the school environment educationally acceptable.

- ٥- Teachers should integrate the student's textbook with advanced technologies to incorporate the latest updates, for example, webbing is widely used.
- ٦- Duplicating the current study and increasing the number of participants of the sample size would result in different findings.
- ٧- The school administrators and teachers should meet guardians on a regular basis to inform them of the repertoire of vocabulary items the student is familiar with.

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Appendix (A)
(Student Interview)

What is your full name?

What grade are you in?

١. Do you like the lexical items in your English textbook of Grade Ten?
(Structured Q.)
٢. Can you recall them when it comes to context? (Structured Q.)
٣. Do you have difficulty recalling words? (Structured Q.)
٤. How do you usually learn (study) English words in class? (Unstructured Q.)
٥. What do you think has been making you fail to recall textbook vocabulary items easily? (Unstructured Q.)
٦. Would you like to have a new vocabulary technique to help you retain words effortlessly? (Structured Q.)

Appendix (B)
(Pretest)

Name : Class:.....

Date: Total Mark : _____
40

- The test has three parts of vocabulary to answer.

Vocabulary 1 (Items 1 – 10)

Directions: For each item, *shade in the bubble* (○) next to the correct meaning.

What is the meaning of this word?

Example:

- start (v)
 - leave
 - see
 - begin
 - read
- ١. unique (adj)
 - different
 - difficult
 - easy
 - angry
- ٢. forest (n)

- an institution for educating children
- a dry area of land
- an outdoor area in which plays are given
- a large area covered with trees

٣. threaten (v)

- to stop complaining
- to harm or destroy something
- to watch a football game
- to benefit from experience

٤. habitat (n)

- the place where someone lives
- the natural home of an animal or plant
- a people's native land
- a house of residence

٥. litter (n)

- tropical climate
- climate change
- a written, typed, or printed communication
- trash that is left lying in an open or public place

٦. currently (adv)

- finally
- at last
- not long ago
- at the present time

٧. recycle (v)

- to use something again for a different purpose
- to take part in a campaign
- to meet someone
- to avoid smoking a cigarette

Λ. furniture (n)

- a building for human habitation
- ideas for use in creating a book or other work
- large movable objects such as chairs and tables
- ideas for use in creating chairs and tables

᠑. save (v)

- to use less energy
- to use more energy
- to have something special
- to take a shower

᠑. stop (v)

- to fight for something
- to come to an end
- to reduce costs
- to reduce speed

Vocabulary 2 (Items 11 – 15)

Directions: Match each definition in the left column to the correct vocabulary word in the right column. Then, write the corresponding letter in the space provided. Be careful! There are **Two Extra** vocabulary words.

- | | |
|---|---------------------|
| ١١. ____ buses and trains that everyone can use | a. energy |
| ١٢. ____ damage caused to water, air, environment etc. | b. island |
| ١٣. ____ the power from something such as electricity or oil | c. turtle |
| ١٤. ____ an increase in the temperature of the air
and the ocean | d. beach |
| ١٥. ____ an animal with four legs and a hard shell | e. pollution |
| | f. global warming |
| | g. public transport |

Vocabulary 3 (Items 16 – 20)

Directions: Choose the correct matching meaning for the **bold** word in each sentence.

Example:

- The villains didn't **harm** him.
- A. see B. read C. fail D. hurt
- ١- Salim has been **looking for** you.
- A. fighting for B. searching for C. reading for D. sending for
- ٢- We have come here to **take part** in a major game.
- A. participate B. fly C. write D. drive
- ٣- Dr. Ali has numerous animals to **care for**.
- A. look into B. look through C. look after D. look at
- ٤- I try to **avoid** supermarkets on Saturdays. They are always so busy.
- A. keep away from B. go to C. move D. sell
- ٥- My weight **reduces** when I stop eating sugar.
- A. increases B. becomes smaller C. grows D. expands

Appendix (C)



Sultanate of Oman
Ministry of Education
Qutaiba School for Basic Education
Grade Ten
(2015 – 2016)

Posttest

Name : Class:.....

Date: Total Mark : _____

40

- The test has three parts of vocabulary to answer.

Vocabulary 1 (Items 1 – 10)

Directions: For each item, ***shade in the bubble*** (○) next to the correct meaning.

What is the meaning of this word?

Example:

- start (v)
 - leave
 - see
 - begin
 - read

١٦. irrigate (v)

- to water
- to live
- to eat
- to show

١٧. forest (n)

- an institution for educating children
- a dry area of land
- an outdoor area in which plays are given
- a large area covered with trees

١٨. threaten (v)

- to stop complaining
- to harm or destroy something
- to watch a football game
- to benefit from experience

١٩. environment (n)

- something that you do, especially for enjoyment
- the air, land, and water where people, animals, and plants live
- the skill or activity of preparing food for people to eat
- the main meal of the day that people eat in the evening

٢٠. litter (n)

- tropical climate
- climate change
- a written, typed, or printed communication
- trash that is left lying in an open or public place

٢١. currently (adv)

- finally

- at last
- not long ago
- at the present time

၂၂. recycle (v)

- to use something again for a different purpose
- to take part in a campaign
- to meet someone
- to avoid smoking a cigarette

၂၃. earth (n)

- a building for human habitation
- the planet that we live in
- large movable objects such as chairs and tables
- ideas for use in creating chairs and tables

၂၄. award (n)

- a prize
- tropical climate
- weather conditions
- climate change

၂၅. stop (v)

- to fight for something
- to come to an end
- to reduce costs
- to reduce speed

Vocabulary 2 (Items 11 – 15)

Directions: Match each definition in the left column to the correct vocabulary word in the right column. Then, write the corresponding letter in the space provided. Be careful! There are **Two Extra** vocabulary words.

- | | |
|---|---------------------|
| ٢٦. ____ buses and trains that everyone can use | a. island |
| ٢٧. ____ damage caused to water, air, environment etc. | b. energy |
| ٢٨. ____ an area of land that has water around it | c. organization |
| ٢٩. ____ an area of sand or stones next to the sea | d. global warming |
| ٣٠. ____ a group of people who work together in a systematic way for a shared purpose | e. pollution |
| | f. beach |
| | g. public transport |

Vocabulary 3 (Items 16 – 20)

Directions: Choose the correct matching meaning for the **bold** word in each sentence.

Example:

- The villains didn't **harm** him.

B. see B. read C. fail D. hurt

- ١٦ - Our country tends to **preserve** old buildings .

B. destroy B. protect C. send D. receive

- ١٧ - We have come here to **take part** in a major game.

B. participate B. fly C. write D. drive

- ١٨ - Dr. Ali has numerous animals to **care for**.

B. look into B. look through C. look after D. look at

- ١٩ - We are doing a class **project** on the environment.

B. study B. tennis C. sport D. wood

- ٢٠ - My parents **encouraged** me to try new things.

B. increased B. supported C. grew D. liked

Appendix (E)

၁- unique	၃- forest	၄- threaten	၅- habitat	၆- litter
၇- currently	၈- recycle	၉- furniture	၁၀- save	၁၁- stop
၁၂- public transport	၁၃- pollution	၁၄- energy	၁၅- global warming	၁၆- turtle
၁၇- looking for	၁၈- take part	၁၉- care for	၂၀- avoid	၂၁- reduce
၂၂- irrigate	၂၃- environment	၂၄- earth	၂၅- award	၂၆- island
၂၇- beach	၂၈- organization	၂၉- preserve	၃၀- project	၃၁- encouraged