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THE EFFECTIVENESS OF SEMANTIC MAPPING STRATEGY TO IMPROVE STUDENTS' VOCABULARY MASTERY

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Abstract

The purpose of this study was to investigate the effectiveness of semantic mapping strategy to improve students' vocabulary mastery. The research design of this study was a quasi experimental design. The population was the seventh grade students of SMP Negeri 4 Batang in the academic year of 2013/2014. The samples consisted of 72 students, which divided into two groups, they were experimental group and control group. In order to collect data about students' vocabulary mastery improvement and responses toward the implementation of semantic mapping strategy, the writer used vocabulary test and questionnaire. During the treatment, students in experimental group used semantic mapping strategy, while students in control group used wordlists strategy. In the pre test results, the mean score of the experimental group was 62,91 and the control group was 63,19. However, there was improvement in post test results. The analysis of the test result showed that the students' improvement of experimental group was higher than control group. In the post test, the mean score of the experimental group was 82,08 while the control group got 76,38. Based on statistical analysis by using t-test formula, indicated that the t-test was 3,29 and t-table was 1,99. It means that t-value was higher than t-table (3,29 >1,99). As a result, there is a significant difference in vocabulary achievement between the students who are taught by using semantic mapping strategy and those who are taught by using wordlists strategy. Based on the result of this study, the writer concluded that semantic mapping strategy is more effective to be implemented in teaching vocabulary to improve students' vocabulary mastery than wordlists strategy.

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INTRODUCTION

Vocabulary is one of the major components of a language learning which has to be mastered by the learners. Vocabulary itself is words in a specific language which have meaning in which label objects, actions and ideas that conveys information. It will be impossible to learn a language without having vocabulary mastery because learners cannot deliver a certain meaning to communicate with others in a particular language, such as English.

Laufer (1997:140) states that learning vocabulary is one of the most important elements without which neither comprehension nor production of language is possible. On the other word, it means that learning vocabulary cannot be separated from other language skills, such as listening, speaking, reading and writing. The more words the learners know, they will be more better to understand what they hear or read. And, the more words they have, they will be more accurate to express their ideas in spoken or written form .

As a foreign language, learning English vocabulary seems difficult for some Indonesian students to master as it is completely different from Indonesian language itself. They find difficulty to memorize new words and to enlarge their vocabulary knowledge. In fact, having low vocabulary proficiency will cause an obstacle for the students in learning English. While they have limited vocabulary in their minds, they are not able to use language accurately. It means that if the students are lack of vocabulary, it will circumscribe them to use language skillfully to express their ideas.

One of the reasons for the students' low vocabulary mastery and memorization can be influenced by teacher's strategy in teaching vocabulary. Some teachers might still use conventional strategy which cannot challenge the students to learn vocabulary independently such as wordlits strategy. They let the students depend more on the meaning of wordlists in textbook. As a result, the students cannot explore their vocabulary knowledge which they have known

before, and they accustomed to learn vocabulary passively.

Wordlists strategy as one of the conventional strategies in teaching vocabulary, is a strategy which delivers list of some difficult words and their meanings. Through this strategy, the teachers usually offer the meaning of the words only. They directly show the target words to the students, then ask them to read and memorize the vocabulary items. It is helpful for the students to remember new words but in a short time. Hence, this strategy less help the students to master the target vocabulary better.

The lack of vocabulary knowledge creates a barrier that discourages the students in learning English. Thus, it is a big challenge for the teachers to find effective and efficient strategy in teaching vocabulary so that they can help the students to memorize words better to improve their vocabulary achievement. Nevertheless, the aim of teaching vocabulary should provide the students with the ability to distinguish the meaning of words and to enhance the words mastering usage instead of knowing the meaning only. Therefore, the teachers should vary their strategy in teaching vocabulary and motivate the students to learn English vocabulary actively and independently.

One of the strategies that can be used to teach vocabulary is a semantic mapping. According to Graves (2008:56), semantic mapping is one of the most powerful approaches to teach vocabulary because it engages students in thinking about word relationships. This strategy increases students' active exploration of word relationships, therefore, it leads them to a deeper understanding of word meanings by developing their conceptual knowledge related to word. Hence, this strategy can help the students to memorize some new words easily and effectively.

REVIEW OF RELATED LITERATURE

2.1 Definition of Semantic Mapping

Semantic mapping strategy allows the students to explore their knowledge of vocabulary by creating a map of word. It consists of a diagram which displays a single word or phrase,

placed in the centre as topic and another associated words are added in the form of branches. According to Graves (2008:56) semantic mapping is one of the most powerful approaches to teach vocabulary because it engages students in thinking about word relationships. The strategy promotes students' active exploration of word relationships to a deeper understanding of word meanings by developing their conceptual knowledge related to words. In addition, Winters (2001:87) asserts that semantic mapping represent a graphic teaching strategy which has been devised to help learners build the conceptual connections they need to decipher any word completely.

In short, semantic mapping is a strategy for representing word concepts graphically. It helps the students to develop their vocabulary through a deeper understanding conceptual knowledge by displaying words into categories to show how they are related to each other.

2.2 Advantages of Using Semantic Mapping

Semantic mapping is a visual display that demonstrates relationships between one word to another. There are seven advantages of using semantic mapping in teaching-learning process:

- 1. Representing ideas or views from a large group of participants or stakeholders in an easy-to-interpret format.
- 2. Helping students brainstorm and generate new ideas.
- 3. Encouraging students to discover new concepts and the propositions that connect them.
- 4. Allowing students to more clearly communicate ideas, thoughts and information.
- 5. Identifying complex relationships between issues, factors, and so on in a tangible or graphic format.
- 6. Participating focused, everybody can have his or her ideas represented.
- 7. Promoting active participation, therefore ensures that participants stay on task.

2.3 Definition of Vocabulary

Vocabulary is all the words in a language which has meaning that produced by human beings to express their mind. They use words in communication to convey meaning so that others can understand them. Hatch and Brown (1995:24) state that vocabulary is a list or set of words particular language or a list or set or words individual speakers of language might use.

According to Kamil and Hiebert (2005:3), generically, vocabulary is the knowledge of meanings of words. Besides, another definition of vocabulary is stated by McCarthy (1990:32). He states that vocabulary is defined as words in a specific language or freestanding items of language that have meaning.

Based on some theories, the writer defines that vocabulary is a word or list of words which have meanings and used by individual or group to communicate with others either in verbal or written communication.

2.4 Vocabulary Mastery

Vocabulary is an important element which has to be mastered in learning a language. Hornby (1995:207) stated that mastery means great knowledge about understanding of a particular thing. In addition, Fries (1945:22) stated:

We never separate from mastery of vocabulary, because whenever we think of language learning, we usually think of mastering the vocabulary or learning the word. The words one knows actually depend on the experience one has got, for example a child's experience is very limited in its range, and therefore, his vocabulary is limited too.

Hence, vocabulary mastery is someone's ability to understand or to use words in a language. If the learners want to learn a particular language, such as English, they should develop their vocabulary mastery first because it will influence every step of the process in learning language itself.

2.5 The Importance of Learning Vocabulary

Learning vocabulary becomes essential aspect in learning a language. The mastery of

vocabulary will determine the mastery of others language skills. It is impossible to use language skillfully when the students have limited vocabulary in their minds.

According to Laufer (1997:142), learning vocabulary is one of the most important elements without which neither comprehension nor production of language is possible. It would be impossible to learn a language without having vocabulary mastery because people need several words to convey the intended meaning to communicate with others.

Thus, learning vocabulary is a central component of language learning. Vocabulary itself is a core component of language proficiency and becomes the basis for how well the learners listen, speak, read, and write. Without having vocabulary mastery, it is difficult for learners to convey the information which they want to express. Meanwhile, with a good knowledge of vocabulary, learners may feel confident in communication either spoken or written.

2.6 The Strengths of Using Semantic Mapping in Teaching Vocabulary

There are some advantages in teaching vocabulary using semantic mapping:

- 1. Helping students to remember the words easily because it organized in some categories of word.
- 2. Decreasing students' boredom in learning vocabulary.
- 3. Helping students become active participants in the class because they can have their ideas represented.
- 4. Increasing the students' motivation to learn new vocabulary because of the

attractiveness of semantic mapping strategy in teaching vocabulary.

RESEARCH METHOD

The present study conducted a quasiexperimental study as the research design. According to Creswell (2009: 154), quasiexperimental is a form of experimental research in which individuals are not randomly assigned to groups. In this study, non-equivalent control group design was used. A non-equivalent groups design includes an existing group of participants who receive a treatment and another existing group of participants to serve as a control group. The subject of this study was students of SMP Negeri 4 Batang in the academic year 2013/2014. The writer divided the subject of the study into two groups, VII A assigned to experimental group and VII B as control group. During the treatment, students in experimental group used semantic mapping strategy in teaching vocabulary, while students in control group used wordlists strategy.

In order to collect data about students' vocabulary mastery improvement between the two groups and to compare the effectiveness of two strategies in improving students' vocabulary mastery, the writer used vocabulary test as a main instrument. Besides, to get more additional information on the students' perceptions and interests of the implementation of semantic mapping strategy that could not be noted by the tests, questionnaire was used.

The research design of the study can be described as follows:

R	01	X	02
R	03	Y	04

in which,

R: respondents,

01 : pre-test for the experimental group02 : post-test for the experimental group

03 : pre-test for the control group04 : post-test for control group

X: treatment using semantic mapping strategy

Y: treatment using wordlists strategy (conventional strategy)

In this study, the writer divided the subject of the study into two groups, an experimental group and a control group. Before and after the experiment, both groups were given pre-test and post-test of vocabulary knowledge. Both groups took pre-test (01) and (03) to measure their early vocabulary mastery before getting experiment. During the experiment, the experimental group was taught by using semantic mapping strategy (X), while the wordlists (Y), as a conventional strategy was performed to the control group. After the experiment, the same post-tests (02) and (04) were administrated to investigate whether any significant differences in learning vocabulary between the two groups.

In addition, to support the primary data and to get more additional information on students' perceptions and interests of the implementation of semantic mapping strategy that could not be noted by the tests, the writer used questionnaire. It was carried out after the treatment for experimental group only.

The result of test was analyzed using t-test formula to make sure whether there was a significant difference between pre-test and post test between experimental and control groups or not and to know which strategy was more effective to improve students' vocabulary mastery. However, the standard deviation should be computed before counting the t-test. The formula of standard deviation is as follows:

$$S = \sqrt{\frac{(n_1 - 1)s_1^2 + (n_2 - 1)s_2^2}{n_1 + n_2 - 2}}$$

In which.

s = standard deviation of both groups

 n_1 = students amount of experimental group

 s_1 = standard deviation of experimental group

 n_2 = students amount of control group

 s_2 = standard deviation of control group

To find out the t-value of the significant difference between the two means of the pre-test and post-test, the formula is as follows:

$$t = \frac{\overline{X_1} - \overline{X_2}}{s\sqrt{\frac{1}{n_1} + \frac{1}{n_2}}}$$

In which.

t = t-value

s = standard deviation of both groups

 X_1 = mean of experimental group

 n_1 = students amount of experimental group

 X_2 = mean of control group

 n_2 = students amount of control group

RESULT AND ANALYSIS

4.1 Pre Test Findings

A pre-test was held at the beginning of the study. It had a purpose to know the early condition of the students' vocabulary mastery before getting treatments. It was conducted on Wednesday, February 19th 2014 for control group

and on Thursday, February 20th 2014 for experimental group. In the pre test, the students had to answer 20 multiple-choice items in 35 minutes. The result of pre-test in experimental and control group could be seen in the following tables:

Experimental Group Pre test Score		
Σ (the total score)	2265	
N	36	
Maximum Score	80	
Minimum Score	35	
Mean	62,91	

The table shows that the experimental group got total scores 2265 in doing pre test. Next, the mean score of this group was 62,91.

Different from the table above, the students' scores of the pre-test in the control group is presented in the following table.

Control Group Pre test Score		
Σ (the total score)	2275	
N	36	
Maximum Score	85	
Minimum Score	45	
Mean	63,19	

Based on the table above, it can be seen that the total scores of pre test in control group was 2275 and the mean score of the students' result in this group was 63,19. The result of pre

test in control group was slightly different from the experimental group. So, the writer concluded that two groups had equal level vocabulary mastery before getting the treatment.

4.2 Implementation of the Experiment

In the present study, semantic mapping strategy was applied as a treatment to improve students' vocabulary mastery. The treatment form of this study was teaching-learning process using semantic mapping strategy in the classroom. The process of giving treatment to make sure that the semantic mapping strategy definitely gave effect to improve students' vocabulary achievement and to know whether semantic mapping strategy was more effective to teach vocabulary compared to wordlists strategy as conventional one.

After pre test was given, the treatment of teaching vocabulary by semantic mapping strategy was given to the students in experimental group. The treatment was conducted for 4 meetings. Each meeting needed 80 minutes and had different materials about vocabularies. There were four themes of vocabularies related to procedure text that the teacher gave to the students. Those were vocabulary about how to make a cup of tea, vocabulary about how to tie a

neck tie, vocabulary about how to make cheese noodle omelette, and vocabulary about how to plant a flower. The process of giving treatment in teaching vocabulary through semantic mapping strategy in experimental group as follows:

• First Treatment

In the first meeting, the students learnt new vocabulary about how to make a cup of tea through semantic mapping strategy. In the beginning of lesson, the teacher played a video about procedure text how to make a cup of tea to stimulate the students' vocabularies knowledge. Then, she wrote a phrase of how to make a cup of tea as a main topic on the center of board. Next, she invited the students to generate as many words as possible related to the topic. The students did brainstorming and classified the words into their categories. Next, they constructed a map of words and also elaborated on their map with the meanings those vocabularies. Individual assisgnment was given in the end of the lesson related to semantic mapping.

• Second Treatment

In the second meeting, the students learnt new vocabulary about how to tie a neck tie through semantic mapping strategy. Teacher asked the students to guess what was in the box. She showed a real thing of tie. She applied semantic mapping strategy to brainstrom their vocabulary related to the topic. The students did exercises related to the topic. Teacher asked one of the students to come forward and demostrated how to tie a neck tie in front of the class. Teacher asked the students to make a group and played a game related to semantic mapping by number head together.

• Third Treatment

In the third meeting, the students learnt new vocabulary about how to make cheese noodle omelette through semantic mapping strategy. The teacher showed a real cheese omelette to the students. She wrote the topic of how to make cheese noodle omelette on the board. The students did brainstorming and generate as many words as possible related to the topic. Next, they classified the words into their categories and constructed a map of words related procedure of how to make a cheese noodle omelette. Teacher showed some words related to cooking on the slides. In the end of the lesson, the teacher gave assignment related to the material in group and individually.

• Fourth Treatment

In the fourth meeting, the students learnt new vocabulary about how to plant a flower through semantic mapping strategy. Teacher showed the students some picture related to plant flower. Teacher asked the students to make a group and gave them assignment related to semantic mapping. The students did a group discussion to match pictures and rearrange correct sentences related to how to plant a flower by semantic mapping strategy. Next, the students

presented the results of group discussion in front of the class. In the end of lesson, they stuck their works related to semantic mapping on the sticky wall.

Different from the experimental group, in control group, the conventional strategy by using wordlists was conducted in teaching procedure text. The process of giving materials in control group was the same with experimental group. The treatment in control group was also conducted for four meetings which needed 80 minutes and each meeting had different materials of vocabularies related to procedure text. The themes of vocabularies were similiar to experimental group. In short, the process of conducting treatment between experimental group and control group was the same, the difference only appeared on teaching strategy. During the learning process, the experimental group was taught by using semantic mapping strategy while the control group by using wordlists strategy.

In the last activity of the experiment, the writer gave post test to both groups. In addition, questionaire was given to experimental group to know the students' interests and perceptions towards the implementation of semantic mapping strategy in teaching vocabulary.

4.3 Post Test Findings

The post test was used to measure the students' vocabulary achievement after getting the treatment. The students were asked to answer 20 questions as similar as the pre-test but the positions of question numbers were reshuffled. The time allocation was also 35 minutes. The post test was given on Wednesday, March 13th 2014 for control group and on Thursday, March 14th 2014. The post test results of each group are shown by the tables below:

Control Group Post-test Score	
Σ (the total score)	2750
N	36
Maximum Score	95
Minimum Score	65
Mean	76,38

Based on the post test result, the control group got total score 2750. The mean score of this group was also increased, it was 76,38. So, the result showed that there was an improvement in

post test result than pre-test. The results of experimental group post test score can be seen as follows:

Experimental Group Post Test Scor	e
Σ (the total score)	2955
N	36
Maximum Score	95
Minimum Score	65
Mean	82,08

Based on the tables above, the total score of experimental group was 2955. This group got mean score 82,08. It meant the students' improvement of experimental group was more higher than control group. In rather simple observation, there was a significant difference in vocabualry mastery between students of experimental group and control group after getting the treatment by using semantic mapping strategy. Based on the post test results, it can be concluded that semantic mapping was more effective to improve students' vocabulary mastery than wordlists strategy.

4.4 Mean Scores Differences between Pre Test and Post Test of Experimental Group and Control Group

The significant difference of the experiment could be seen through the difference of means scores in two groups.

a. The mean score of pre test of experimental group

$$M_x = \frac{2265}{36} = 62,91$$

b. The mean score of pre test of control group $M_y = \frac{2275}{36}$ = 63.19

c. The mean score of post test of experimental group

$$M_x = \frac{2955}{36} = 82,08$$

d. The mean score of post test of control group

$$M_{y} = \frac{2750}{36} = 76,38$$

The following graph presented the mean scores result of pre test and post test between the two groups:

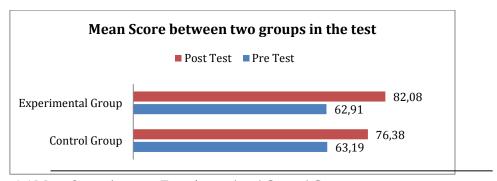


Figure 4.4 Mean Scores between Experimental and Control Group

The graph above showed that the mean score of the pre test in the experimental group was 62,91. Meanwhile, the mean score of the post test was 82,08. The percentage of the students' improvement of this group was 19,17%. Therefore, there was a significant improvement between the pre-test and the post-test scores achieved by the students of the experimental group.

On the other hand, the mean scores of control group also showed an improvement. It was 63,19 in the pre test and 76,38 in the post test. In this group, there was less improvement than

the experimental group. The improvement was only 13,19%. It means that the difference mean score on the experimental group was higher than in the control group. In short, the writer concluded that there was better improvement of the experimental group's achievement after they received the treatment by using semantic mapping strategy in teaching vocabulary to improve students' vocabulary mastery.

The clear comparison of mean scores between two groups can be seen in the following table:

Table 4.4 Mean Scores Comparison

Group	Pre-test	Post-test	Progress
Experimental	62,91	82,08	19,17%
Control	63,19	76,38	13,19%

The table above demonstrated that there were improvements in both groups. However, the progress of the experimental group which taught by semantic mapping strategy was higher than the control group which taught by wordlists strategy. To prove the significant improvement of both groups, the results need to be tested by using t-test.

4.5 T-Test Statistical Analysis

In order to prove the significance improvement of both groups, the writer used T-test formula to examine the hypotheses of this study. The result of the t-test becomes the quantitative proof whether there is a significant difference of the pre-test and post-test between two groups or not. The following is the result score of post test between both groups:

	Experimental Group	Control Group
Σ (the total score)	2955	2750
N	36	36
Mean	82,08	76,38
Variance (s²)	61,96	49,44
Standard deviation (s)	7,87	7,03

The computation of standard deviation of post test scores was as follows:

$$S = \sqrt{\frac{(36-1)61,96+(36-1)49,44}{36+36-2}}$$

$$= \sqrt{\frac{2018,6+1730,4}{70}}$$

$$= \sqrt{\frac{3899}{70}}$$

$$= \sqrt{55,7}$$

$$= 7,463$$

The computation of t_{value} by using t-test formula was as follows:

$$t_{value} = \frac{\bar{X}_1 - \bar{X}_2}{S\sqrt{\frac{1}{N_1} + \frac{1}{N_2}}}$$

$$t_{value} = \frac{82,08 - 76,38}{7,463\sqrt{\frac{1}{36} + \frac{1}{36}}}$$

$$t_{value} = \frac{5,7}{7,463\sqrt{0.027 + 0.027}}$$

$$t_{value} = \frac{5,7}{7,463\sqrt{0.054}}$$

$$t_{value} = \frac{5,7}{7,463x \ 0,232}$$

$$t_{value} = \frac{5,7}{1,731}$$

$$t_{value} = 3,292$$

For
$$\square = 5\%$$
 and df = 36 + 36 - 2 = 70, $t_{(0.95)(70)} = 1,994$



Based on the computation above, it showed that there was a significant difference on posttest result between experimental and control groups because t_{value} exceeds t_{table} (3,292 > 1,994). Therefore, there is a significant difference in vocabulary achievement between the students who are taught by using semantic mapping strategy and those who are taught by using wordlists strategy. It means, teaching vocabulary by using semantic mapping strategy is more effective to improve students` vocabulary mastery

of the seventh grade of SMP N 4 Batang in the academic year of 2013/2014 than wordlists strategy.

4.6 Discussion of Research Findings

4.6.1 Statistical Interpretation

The objective of this study was to investigate whether there was an effect of using semantic mapping strategy in teaching vocabulary to improve students' vocabulary mastery of the seventh grade students of SMP N 4 Batang in the academic year of 2013/2014 or not.

The mean scores difference between pre test and post test of the experimental and the control group were computed to know the improvement of students' vocabulary mastery before and after getting the treatment. Based on the result of pretest, the mean scores of the experimental group was 62,91 and control group was 63,19. From the pretest, it could be said that the basic vocabulary ability of the two groups was relatively the same before getting the treatment. From the scores, it can be concluded that the two groups were homogenous, because there was only slight difference in the pretest result between the experimental group and the control one.

After the students received the treatment, the mean scores of both groups were gradually increased. Meanwhile, the mean of post test score of the experimental group was higher than the control group. The experimental group got 82,08 and the control group got 76,38. The percentage of the students' improvement in experimental group was 19,17%. However, there was less improvement in control group, the percentage was only 13,19%. Based on the score, it indicates that after getting treatment, the experimental group achieved a better result than the control group.

Another result of the computation showed that the t-value obtained 3,29 and t-table was 1,994. It meant t-value > t-table (3,29 > 1,994). Therefore, it could be concluded that there was a significant difference between the students' vocabulary achievement between two groups after getting the treatment. Thus, the

hypothesis which stated that "there is a significant difference in vocabulary achievement between the students who are taught by using semantic mapping strategy and those who are taught by using wordlists strategy" was accepted.

4.6.2Analysis of the Experiment

Memorizing English vocabularies is not an easy task for students. They need a strategy to help them to memorize vocabulary easily and effectively. This study introduced semantic mapping strategy as an alternative strategy in learning, memorizing, and organizing vocabularies in interactive way.

The aim of using this strategy was to find out whether it could improve the students' vocabulary mastery or not. During the teaching learning process, the students became active and independent learners and they looked interested in learning vocabulary through semantic mapping strategy. Also, the students seemed to be enthusiastic to follow the lesson while the writer used semantic mapping strategy. This strategy motivated the students to increase their ability in memorizing vocabularies. Moreover, implementation of semantic mapping strategy in teaching vocabulary was more helpful to improve students' vocabulary mastery than wordlists strategy because of its visual form. The students were not only learning the meaning words but also they could draw a graphic in some categories of word and added some pictures, curved branches and colors, so it could help them to remember new words easily.

Although using semantic mapping strategy was proven effective in improving the students' vocabulary mastery, this strategy also faced some obstacles. First, the teacher needs more time to explain the vocabulary by using semantic mapping. Second, the teacher should rewrite the vocabulary trees on the blackboard and it will be more difficult when applied the semantic mapping by using pictures. It needs many copies and spends a lot of money. Last, the students sometimes got too excited during the activity in making semantic mapping so that they could not hear the explanation well. However, those obstacles were not serious problems. The writer

tried to handle the problems by doing some solutions. First, she prepared well the materials which will be delivered to the students and gave a time limitation in every activity during teaching-learning process. Second, she used power point slide to help her to show the pictures so that it could decrease the copy of papers. Next, to overcome the students' less attention while they were exciting in doing semantic mapping exercises, she gave clear explanation first before the students start to do the exercises. In the end, the teaching and learning process could still be done well until the experiment was completed.

4.6.3 Analysis of Questionnaire

After analysing the result of questionnaire, it showed that 95 % students were interested in learning vocabulary by using semantic mapping strategy and agreed that semantic mapping gave positive advantages to improve vocabulary mastery. 85 % students were motivated in learning English vocabulary by semantic mapping strategy. 80 % students suggested that semantic mapping strategy should be given to continue the English materials. 89 % students stated that semantic mapping strategy was effective to help the students to improve their vocabulary mastery.

Based on the result of questionnare, the writer concludes that the students make a good improvement and positive progress in vocabulary mastery after being taught by semantic mapping strategy. This strategy could help the students to improve their vocabulary mastery during teaching learning process.

CONCLUSION AND SUGGESTION

5.1 Conclusion

Based on the results of the data analysis and research findings, the writer concludes that there is a significant difference in vocabulary achievement between the students who are taught by using semantic mapping strategy and those who are taught by using wordlists strategy. The conclusion is drawn by analyzing the average scores of both experimental and control groups by using t-test formula, t-value ishigher than t-table

(3,29>1,994). The results show that the use of semantic mapping strategy is more effective than wordlists strategy to improve students' vocabulary mastery. Therefore, it answered the research problem how effective is the use of mapping strategy in semantic teaching vocabulary to improve students' vocabulary mastery compared to wordlists strategy

5.2 Suggestion

Based on the conclusions, suggestions are offered. Firstly, for English teachers, it is highly recommended for the teachers to use semantic mapping as an alternative strategy in teaching vocabulary because of its effectiveness to help the students to improve their vocabulary mastery. It aids the students to develop their vocabulary through a deeper understanding conceptual knowledge. Therefore, the teachers are expected to use semantic mapping strategy because it is effective to improve students' vocabulary mastery and it is promising to vocabulary teaching and learning process. Secondly, for the students, they are suggested to apply semantic mapping strategy in organizing and memorizing vocabulary. Thirdly, for future researcher, they can use this study as a reference to guide them to conduct similar research. Hopefully, the result of this study can help further researcher to find out new strategy about teaching vocabulary by using interesting strategies.

REFERENCES

- Arikunto, Suharsimi. 2006. *Prosedur Penelitian Suatu Pendekatan Praktik*. Jakarta: PT. Rineka Cipta.
- Barcroft, J. 2004. Second language vocabulary acquisition: A lexical input processing approach. Foreign Language Annals, 37, 2, 200-208.
- Bateman, T.S. and Zeithamai, c.P. 1990.

 Management: Function and Strategy.

 Homewood, Ill: Irwin.
- Brown, H. Douglas. 2004. *Language Assessment: Principles and Classroom Practices*. New York: Pearson Education.

- Creswell, John W. 2009. Research Design 3rd edition: Qualitative, Quantitative, and Mixed Methods Approaches. USA: SAGE Publications, Inc.
- Graves, M. 2008. Instruction on individual words:

 One size does not fit all. In A. E. Farstrup &
 S. J. Samuels (Eds.), What research has to
 say about vocabulary instruction (pp. 56–79).

 Newark, DE: International Reading
 Association.
- Hatch, E., & Brown, C. 1995. *Vocabulary,* semantics and language education.

 Cambridge: Cambridge University Press.
- Homby, As. 1995. Oxford Advanced Learner Dictionary. New York: Oxford University Press.
- Kamil, Michael L. and Elfrieda H. Hiebert. 2005. Teaching and Learning Vocabulary: Bringing Research to Practice. New Jersey: Lawrence Erlbaum Associates, Inc., Publishers.
- Laufer, B. 1997. What's in a word that makes it hard or easy: Some intralexical factors that affect the learning with words. In N. Schmitt & M, Michael (Eds.) (1997). Vocabulary: Description, acquisition and pedagogy (pp. 140-155). Cambridge: Cambridge University Press.
- Oxford, R. 2001. Research on language learning strategies: Purpose, Methods, Issues. Presentation. Hokkaido University.
- Seiler, Marcia Ford & et al. 2013. *Indicators of Efficiency and Effectiveness in Elementary and Secondary Education Spending*. Frankfort: Legislative Research Commission.
- Wintergrest, A. C. DeCapua, A., & Itzen, R. C. 2001. The construct validity of one learning instrument. System, 29, 385-403.