A Correlational Study on the Students' Quranic Memorization and Their English Vocabulary Retention

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Abstract: This study aims to know whether there is a correlation between students' Quranic memorization and their English vocabulary retention. This study chose 28 of seventh graders at Islamic Junior High School Az-Zahra Lampung in 2018/2019 academic year as the sample by means of cluster random sampling technique. This study applied correlational research design. The documented data of Quranic memorization of learners and the English vocabulary preservation were collected from the test and then analyzed for hypothetical testing employing Pearson's Product Moment equation. The outcome of the hypothetical test shows that Sig. (value) was generated by the value of significance = $0.000 < \alpha = 0.05$. It means the acceptance of Ha and the rejection of H_0. Furthermore, based on the r value interpretation table, it is known that the observed r is a high correlation as the value of observed r is 0.622 in the $0.600 – 0.800$ level. It can therefore be inferred that there is a significant correlation between the Quranic memorization of learners and the acquisition of English vocabulary.

INTRODUCTION

Undoubtedly, vocabulary is a language element that is essential for students in the language acquisition process (Syarifudin, Marbun, & Novita, 2014; Alqahtani, 2015; Haibi, 2017). Vocabulary has become the central focus in learning language since students are unable to communicate their ideas or comprehend others without adequate vocabulary (Kaushanskaya, Blumenfeld, & Marian, 2011; Yanti, 2016; Susanto, 2017).

The understanding of vocabulary is primarily a memory concern. Memory can be traced as functional or networked neuronal nodes in the mind for information storage and retrieval (Baddeley, 2003; Mohamed, 2014; Amin & Malik, 2014; Jubera, 2016; Rasouli & Jafari, 2016). Memory allows us to recall details of all sorts of information along with awareness and personal remembrances. In brief, memory is an essential aspect of man's personality formation and development. Thus, memory is one of the most crucial cognitive functions in the life of a person.

In many aspects, memory or brain is similar to a muscle. For proper service and use, a muscle must be exercised and formed, so must the brain. The contrast is that a muscle can be over-trained and later become tissue-bound, whereas the brain cannot (Wang, 2009; Lorayne 2017; Hoque, 2018). Based on the theories, it is certain that the concept of a poor memory is unrecognizable; just one that has been trained or untrained.

There will be a greater capacity for the trained memory than the untrained one. This ensures that it should be constantly conditioned by human in order to achieve a good memory.

In accordance with the function of human's brain for retaining and retrieving information, human are equipped with the retention ability, which relates to the capacity to retain things in mind (Amin & Malik, 2014). Retention plays a significant role in processing encoded data and circumstances. Furthermore, those encrypted things will be beneficial, which could later be retrieved.

It can be proposed that retention is the ability to sustain knowledge in the mind for different intensities based on the type of recollection and stimuli, recall frequency, concentration rates, and feelings (Shabaneh & Farrah, 2019). Retention which is closely linked with memory is preserving something in one's mind. Due to the limited ability of human memory, it is important to assess the data to be stored and then preserved. Thus vocabulary retention can be defined as the repository of preserved data of the cumulative word count in a language.

Accordingly, as a Muslim, someone has a special way to do in order to exercise his or her mind. This can be done by a process to memorize the holy Qur'an. It is in line with today's condition in Indonesia that many Islamic schools prerequisite their students to memorize the Qur'an in a certain determined goal.

Several studies have proved that both the memorization of the Holy Qur'an and academic performance require improved memory bank and storage (Nawaz & Jahangir, 2015; Ibrahim, Jani, Alias, Yasin, & Zakariyah, 2015). Students tend to utilize memory in the case of acquiring vocabulary. The mind itself may be conditioned by constant memorization of the Holy Quran. This study was therefore undertaken to assess whether or not there was a correlation between the Quranic memorization by the students and their preservation of English vocabulary.

The mental mechanism used in Quranic memorization is pointed to as the conceptual basis known as the memory-related Information Processing Approach (IPA) (Vercace, Vallet, Riou, Lesourd, Labeye, & Brunel, 2014; Acquah & Jnr, 2017). The working memory is intended for the storage and retrieval of the data and its transition to long-term memory. Meanwhile, memorizing the Quran is an effort to maintain the Quran content in the memorizer's mind (Mohamed, 2014; Ikwanuddin & Hashim, 2014).

The Quran itself is a text of divine guidance and advice to humanity, announced at various times during the existence of the prophet. This deals with issues linked to religious belief as well as other ones concerning life situations and occurrences that functions as main guidelines in the life of Muslims (Ibrahim, Jani, Alias, Yasin, & Zakariyah, 2015).

The Quran is the contrast of right and wrong, good and bad. It is also a reference to the happiness of life from the world until the afterlife for people. All Muslims say the Quran is final, and anyone who obeys the guidance in it will succeed in the world and the afterlife. Muslims also claim that they can profit from memorizing the Holy Quran, including in the education sector.

Briefly, through learning, knowing, or memorizing it, Muslims are struggling to learn the Quran. In addition, it can be said that memorizing the Holy Quran by heart is to encode, store and retrieve the Quranic text by learning and rehearsing it over and over again; a technique called as Hifz (Nawaz & Jahangir, 2015).

The memorizing system of the Quran stresses the attempt to maintain the Quran's integrity as it continues over centuries. Thus, the description points out that Quranic memorization is the attempt to encrypt, preserve, and recover the

Quran's substance in the mind by re-learning and re-reciting it.

Several researchers have proved the relationship between Quranic memorization and academic achievement. Ilmia (2016) discovers that there is a positive correlation between Quranic memorization of the learners and their learning performance at Islamic Elementary School as Salam Malang with a medium interpretation relationship.

Moreover, the impacts of Quranic memorization on academic achievement are also examined by Nawaz & Jahangir (2015). The analysis finds out that there is a notable divergence in students' academic achievement pre and post the memorization. In addition, the content analysis indicates positive effects on memorizers' educational and socio-cultural life.

The prior studies concentrate on the connection between the Quranic memorization of the learners and the overall academic performance. The gap of this study and the previous ones is that this research focuses on the investigation of correlation between the Quranic memorization and linguistic mastery, especially students' English vocabulary retention.

METHOD

This study implemented a correlation research design to decide how two or more variables contribute to each other and to evaluate the paths, magnitudes and shapes of the interactions found (Kumar, 2014; Bordens & Abbot, 2018). Two variables were correlated here. The Quranic memorization of the students was independent variable (X), and the English vocabulary retention of the students was dependent variable (Y).

This research determined the sample by using the technique of cluster random sampling (Sugiono, 2016). The chosen class as the research's sample was the seventh grade of Azzahra Islamic Junior High School of Bandar Lampung, consisting of 28 pupils.

This research applied two techniques of collecting data. They were archival data and vocabulary test. The archival evidence of the Quranic memorization of students was utilized in this research. This was one of the data obtained from the Quranic teacher.

In addition, the vocabulary test as the research instrument consisted of 25 valid and reliable test materials in the form of multiple choices related to word formation and meaning of noun, verb, and adjective referring to the syllabus. The test was designed to determine the capacity, understanding, or competence of students to retain English vocabulary. The experiment was given and the results were then evaluated for hypothetical test employing Pearson's Product Moment equation with SPSS (Statistical Package for Social Science).

To achieve an understanding of the relationship between Quranic memorization of the learners and the English vocabulary retention in hypothetical test, the following criteria were used as seen on Table 1 (Arikunto, 2016).
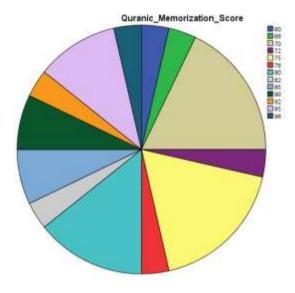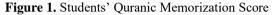
Table 1. r Value Interpretation

Category	Criteria
0.800 – 1.000	Very High Correlation
0.600 – 0.800	High Correlation
0.400 – 0.600	Medium Correlation
0.200 – 0.400	Low Correlation

RESULT AND DISCUSSION
The Quranic Memorization Test Result

The teacher carried out the Quranic memorization test. The test was given to recognize the Quranic memorization of the learners. Then, by using SPSS, the data were calculated. Figure 1 shows the score of the students tested Quranic memorization.

Figure 1. Students' Quranic Memorization Score

The outcome shows the scores of students' Quranic memorization test as follows: mean of 79.64, median of 79.00, mode of 70.00, variance of 97.42, standard deviation of 9.87, minimum score of 60, and maximum score of 98.

Result of Vocabulary Test

The tool of vocabulary memory test was made up of 25 objects. The researcher provided the test to know the vocabulary retention of the participants. In the meantime, the data were recorded employing SPSS. Figure 2 indicates the score of the students' vocabulary retention that was checked.
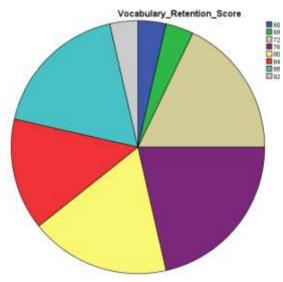

Figure 2. Students' Vocabulary Retention Score

The result indicates the scores of students' vocabulary test as follows: mean of 79.00, median of 80.00, mode of 76, variance of 54.07, standard deviation of 7.35, minimum score of 60, and maximum score of 92.

Data Normality Result

The test of normality was designed to assess whether or not the Quranic memorization test and vocabulary test data were normally distributed. Statistical analysis utilizing SPSS has been used for this research. Kolmogorov – Smirnov and Shapiro Wilk were the measurements of normality used.

The normality test hypotheses have been proposed as shown below.

Ha: the data were evenly distributed
H_0: the data is unequally distributed

The criteria for accepting or rejecting a normality test hypothesis were as follows:

Ha is accepted if sig. $> \alpha = 0.05$
H_0 is accepted if sig. $< \alpha = 0.05$

Table 2. Result of Normality Test

	Kolmogorov-Smirnov[a]			Shapiro-Wilk		
	Stat	Df	Sig	Stat	Df	Sig
Quranic Memori-zation	.145	28	.136	.947	28	.169
Vocabu-lary Re-tention	.123	28	.200*	.953	28	.233

*. This is a lower bound of the true significance
[a]. Lilliefors Significance Correction

Table 2 indicates that Sig of the Quranic memorization score is 0.169 in the Shapiro-Wilk table and 0.233 of vocabulary retention score, while $\alpha = 0.05$. Here Sig $> \alpha$ and therefore Ha is accepted. The assumption is that the data of Quranic memorization rating and vocabulary retention score are normally distributed.

Data Homogeneity Result

The homogeneity test was conducted after the outcome of the

normality test to determine whether the data variance was homogeneous or not. Statistical computation using SPSS has been employed in this research. Levene's Test was used in the homogeneity test.

The homogeneity test hypotheses have been formulated as follows:

Ha :   The variances of the data are homogenous.
H_0 :   The variances of the data are not homogenous.

The conditions for accepting or rejecting the homogeneity test hypothesis were as follows:

Ha is accepted if sig. > α = 0.05
H_0 is accepted if sig. < α = 0.05

Table 3. Result of Homogeneity Test

Levene Statistics	Df1	Df2	Sig.
2.468	1	54	.122

Given the outcomes in the Levene Statistics column's homogeneity test of variances, Sig 0.122 > α = 0.05 can be seen. It indicates the acceptance of Ha because of Sig > α = 0.05. It assumes that the data variances are homogeneous.

Hypothetical Test Result

Referring to the prior discussion, the normality and the homogeneity tests were satisfied. Therefore, the data were then analyzed for hypothesis test by employing Pearson's Product Moment equitation with SPSS. The hypotheses were formulated here.

Ha :   There is a correlation between Students' Quranic memorization and their English vocabulary retention.
H_0 :   There is no correlation between Students' Quranic memorization and their English vocabulary retention.

The criteria of the test were as follows:

Ha is accepted if Sig. (p_{value}) < α = 0.05
H_0 is accepted if Sig. (p_{value}) > α = 0.05

Table 4. Hypothetical Test Result

		Quranic Memorization	Vocabulary Retention
Quranic Memorization	Pearson Correlation	1	.622**
	Sig. (2-tailed)		.000
	N	28	28
Vocabulary Retention	Pearson Correlation	622**	1
	Sig. (2-tailed)	.000	
	N	28	28

**Correlation is significant at the 0.01 level (2-tailed)

Denoting the result as can be seen on Table 4, it is known that the value of significance generates Sig. (p_{value}) = 0.000 < α = 0.05. It implies the acceptance of Ha and the rejection of H_0. It can therefore be inferred that there is a positive correlation between the learners' Quranic memorization and their English Vocabulary retention. The parameter that can be applied to level the interpretation of coefficient is Table 1. Based on the result taken from the table of r value interpretation, it can be understood that the r observed is high correlation as the value of 0.622 for r observed is in 0.600 – 0.800 level.

The present work is designed to determine the connection between Quranic memorization of students and their acquisition of English vocabulary. Research findings find out that there is a high correlation between the memorization of Quranic learners and their retention of vocabulary.

The final outcome reveals a slightly different mean score of Quranic

memorization test and vocabulary test. The Quranic memorization test score recorded the mean of 79.64 while the vocabulary test score was 79.00. Next, it can be noticed that the information are normal during analyzing the normality test score sample. The data homogeneity was evaluated after the test of normality, and it revealed that the data were homogeneous.

Due to normal data, the Pearson Product Moment test was used. Based on data analysis and hypothesis testing, the Pearson Product Moment test results in the dismissal of H_0 and the adoption of Ha. This may conclude that a positive correlation occurs between the learners' Quranic memorization and their vocabulary retention.

The discovery signifies that memorizing the Quran may make memorizing the vocabulary easier for the students. In previous research carried out by Nawaz & Jahangir (2015) and Ilmia (2016) on the impacts of memorizing Quran on academic performance, the results reveal a significant divergence in Huffaz's academic performance both pre and post memorization.

This outcome also confirms the theory that the memory is like a muscle. In order to provide a proper usage, a muscle must be exercised and developed, so memory must be. The difference is that while memory is unable, a muscle is able to be over-trained or becomes muscle-bound (Wang, 2009; Lorayne 2017; Hoque, 2018).

Briefly, it can be inferred that it is important to practice it constantly in order to gain a perfect memory. Through memorizing the holy Quran in every day, the students are constantly educated in their minds. Therefore, memorizing the other topic, such as vocabulary, became simpler.

Research findings indicates a positive correlation between the Quranic memorization of students and the retention of their vocabulary. It resembles that the dependent variable (Y) is affected by the independent variable (X).

Meanwhile, based on the r value analysis chart, it is understood that the observed r is high correlation as the observed r value is 0.622 at 0.600 – 0.800 points. Medium correlation between these variables indicated that there is no high or weak correlation between these two variables.

CONCLUSION

The outcomes of the data computation in the prior discussion shows the consequent acceptance of the alternative hypothesis (Ha) and the observed r indicates a high correlation in the medium interpretation. This research may therefore suggest that there has been a positive correlation between the Quranic memorization of students and the preservation of their English vocabulary.

It is worth noting that the more students memorize the Holy Quran, the more their English vocabulary can be retained and enriched by the students. Finally, the study highly recommends the use of memorizing technique for students in maintaining and increasing their English vocabulary mastery.

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