

The Effect of Using Internet-based Project Work toward Students' Vocabulary Mastery

Yulia Nugrahini, M.Pd.

English Department, Universitas Bhinneka PGRI

yn.max88@gmail.com

Abstract

In this age of globalization, an increasing number of individuals are studying foreign languages, particularly English, as a means of communication. Students noted several difficulties in learning English, particularly in learning vocabulary. Kids usually comprehend the professors' explanations, but it appears that most of the material will fade fast, particularly for junior high students who have several topics to study. Vocabulary is one of the linguistic components that students should acquire so that they may study the English subject effectively. Therefore, teachers need to design methods and strategies in teaching learning process. The research aims to investigate the use of Internet-based Project Work in supporting vocabulary learning. The results showed that the mean of total scores of students' vocabulary mastery before being taught using Internet-based Project Work was 72,51 compared to the score after being taught using Internet-based Project Work which was 83,16. Based on the results, alternative hypothesis (H_a) which states that there is significant different score of student's vocabulary mastery by using Internet-based Project Work is accepted, while the null hypothesis (H_0) that states there is no significant different score of student's vocabulary mastery is rejected. Finally, it can be concluded that Internet-based Project Work is an effective strategy in teaching English vocabulary to junior high school.

Keywords : *Internet-based Project Work, Teaching Vocabulary, Vocabulary mastery*

Introduction

Vocabulary is a set of lexemes, including single words, compound words and idioms (Richards and Schmidt 2010:629). Vocabulary is one important aspects in learning a foreign language. Without a proportional amount of vocabulary, anyone will get trouble in speaking, reading, listening, and writing, because when they do the four skills, vocabulary knowledge is required to help them express their thought, idea or opinion.

A language teacher should have the ability to select a suitable method when teaching the students in order to make the students motivated to learn more and achieve a good score. There are so many options that can be used to teach vocabulary. Internet-based Project Work is one of the techniques that can be used in teaching English. This learning technique makes the students understand the English subject actively, independently and fun. Internet-based Project Work makes students enjoy in learning vocabulary and they will get active in teaching learning process by browsing and looking for the vocabulary independently. By applying the Internet-based Project Work, the students' vocabulary will increase.

Previous studies have pointed out the huge benefit of the internet in language learning and language teaching. For example, Chun and Plass (2000) outline broad capabilities of the internet characteristics that have the potential to improve language acquisition. Those characteristics are the worldwide availability of authentic resources, communication capabilities through networking, multimedia capabilities, and the hypermedia structure.

According to Gu (2010), several strategies for learning vocabulary in secondary school included primarily reading textbooks, listening to the teacher, and taking notes, whereas university students reported a much larger repertoire with more opportunities for use, such as writing essays, listening to radios, and conversing with English teachers and native speakers. Some techniques of language acquisition remained very consistent. These included classroom responsibilities such as listening to the teacher and taking notes. Vocabulary memorizing was the most widely used approach outside of the classroom.

In this research, researcher uses Internet-based Project Work as a fun media and simple because the material or topic can be searched quickly and accurately. To determine the students' vocabulary mastery, the researcher use vocabulary assessment as follows : Multiple-Choice Question Formats, MCQ Item Writing Tips , Matching Formats, Matching Item Writing Tips, Sentence Completion or Gap Fill Items , Translation (Coombe, Folse, & Hubley, 2007). The researcher conducted research in class VIII-B because

it was recommended from English teacher. Researchers want to know the effect of using the Internet-based Project Work as a media of teaching vocabulary to the students.

Through internet-based project work, students are more active and interactive way to learn vocabulary. By using this technique, students will find it easier to find the source of the material or topic. After that the students were able to present the results obtained in the classroom using a laptop and LCD or directly.

Method

This research was conducted by using an experimental research design. Experimental research is a scientific investigation in which the researcher manipulates one or more independent variables, controls any other relevant variables, and observes the effect of the manipulation on the dependent variables (Ary, et al, 2002). In this study the researcher just takes one group and use pre-test and post-test to see the result of the treatment and the population were all of eight grade of SMPN 1 Durenan consisted of eight classes : they are class A, B, C, D, E, F, G and H. Each of class consists of 31-32 students'. The researcher choose VIII-B consisted 31 students as a sample of this research.

A variable is a concept or a feature that can have varying values or scores (Ary et al, 2002). Variables can be categorized in a variety of ways. Independent variables (X) are factors that are caused by or have an effect on dependent variables. In this research, the vocabulary is studied utilizing Internet-based resources. Project Work as media is independent variable and to dependent variable (Y) is the response or the criterion variable that is presumed to be caused by or influenced by the independent treatment conditions and any other independent variables. In this study the dependent variable is the students' vocabulary mastery.

NO	Variables	Indicator	Instrument
----	-----------	-----------	------------

1	Vocabulary mastery (Y)	<ul style="list-style-type: none"> • Enrich vocabulary • Make a fluency of vocabulary 	<ul style="list-style-type: none"> • Multiple choices
2	Using Internet-based Project Work (X)	<ul style="list-style-type: none"> • Performance using Internet-based Project Work. 	<ul style="list-style-type: none"> • Internet-based Project Work

Arikunto (2010:193) explains that “Tool is a space of question or exercise and other tools that are used to measure the knowledge, skills, abilities or talent of the intelligentsia that is owned by an individual or group”. Ary et al (1985:189) sees a test is a set of stimuli presented to individual in order to elicit responses on the basis of which a numerical score can be assigned”. In getting the data, class VIII-B was become an experimental group.

In teaching learning of all process (the teacher gave pretest, using treatment (Internet-based project work) and gave posttest in vocabulary mastery) to the students in two meeting.

The teacher asked the students to take the written test is given, before and after treatment. Here is a description of the research activity conducted by researchers as a teacher:

1. Pre-test

The pretest was conducted on 19th May 2016. The first, the researcher came to the class and explained what they were going to do. After that, students were given a test in the form of a written test about the narrative text.

2. Treatment

The researcher chose to use Internet-based Project Work as the media for the treatment held on 20th May 2016 and performed in several steps. The first step is students listening to the explanation of the teacher of narrative text. The second step is teacher divides the students into several groups. The third step is students are asked to search for text on a narrative text on the internet. The last step is the teacher tells students presented alternately corresponding group number.

3. Post-test

Post-test conducted after the treatment. The researcher asked the same written test during the pre-test, it's just a matter of a given encrypted. Post-test is performed to determine whether there are differences in scores after given the treatment. The treatment was held on 20th May 2016.

In this research, the researchers used validity and reliability test to determine valid or invalid questions used:

1. Validity test

Brown (2001: 388) explains “Three types of validation are important in your role as a classroom teacher: content validity, face validity, and construct. In this research, the researcher used construct validity to validate the instrument of this research and the instrument validation will check by the English teacher.

Based on Sugiyono (2011: 255) the formula is as follow:

$$r_{xy} = \frac{n \sum x_i y_i - (\sum x_i) (\sum y_i)}{\sqrt{\{n \sum x_i^2 - (\sum x_i)^2\} \{n \sum y_i^2 - (\sum y_i)^2\}}}$$

Note:

r_{xy} = validity of each test item

n = the number of student / subject participating in the test

X = score of each item

Y = total score of all items

$\sum X$ = the sum of score of each item

$\sum Y$ = the sum of total score of items

$\sum XY$ = the sum of multiplied score between score of each item

and the total score of all items

$\sum X^2$ = the sum of square score of each item

$\sum Y^2$ = the sum of square total score of all items

The result of r_{xy} above is then consulted to r-table by the level of significance (α) 5%. If r_{xy} is higher than r-table, the instrument is valid. Further, the validity of each test item is indicated by the criteria that range from 0 to 1 in which:

0,00 – 0,19 very low validity

0,20 – 0,39	low validity
0,40 – 0,59	moderate validity
0,60 – 0,79	high validity
0,80 – 1,00	very high validity

2. Reliability test

Reliability is a necessary characteristic of any good test: for it to be valid at all, a test must first be reliable as a measuring instrument. Ary et al (2010: 239) explain that “The reliability of a test is expressed mathematically as the best estimate of what proportion of the total variance of scores on the test is true variance.” The following formula is according to Kuder Richardson (K-20).

$$r_{ii} = \left(\frac{n}{n-1} \right) \left(\frac{s^2 - \sum pq}{s^2} \right)$$

Where:

r_{ii} = reliability

n = the number of items in the test

s^2 = variance of all tests' score

p = the proportion of subject answer right ($p = \frac{NP}{N}$)

q = the propotion of subject answer wrong ($q = 1-p$)

Similar with validity interpretation, the result of r_{ii} above is also consulted to r-table by the level of significance (α) 5%. If r_{ii} is higher than r-table, the instrument is reliable (Arikunto, 2010: 231). The consistency of the scores is indicated by a reliability index that ranges 0 to 1, in which:

0,00 – 0,20	very low reliability
0,21 – 0,40	low reliability
0,41 – 0,60	moderate reliability
0,61 – 0,80	high reliability
0,81 – 1,00	very high reliability

In this study, the researcher used a quantitative data analysis technique using statistical method. This technique used to find the significant difference on the students' vocabulary mastery before and after being taught by using Internet-based Project Work (pre-test and post-test).

According to Ary (2006:195) formula for the dependent t-test is:

$$t = \frac{MD}{\sqrt{\frac{\sum D^2 - \frac{(\sum D)^2}{N}}{N(N-1)}}$$

Notes:

t = t-score

MD = average difference score

$\sum D^2$ = difference score squared, the summed

$(\sum D)^2$ = difference score summed then squared

N = Number of pairs

To find out the percentage of data, use

$$P = \frac{f}{N} \times 100\%$$

Notes:

P = percentage

F = frequency of the counted value

N = number of class

Results and Dicussions

In this research, the purpose of the researcher is to know the effect of using Internet-based Project Work toward the student's vocabulary mastery for eight grade students at SMPN 1 DURENAN. The researcher has mentioned the instrument that was used in this research was vocabulary test of narrative text. The researcher used (T-test for one sample : pretest and post-test)

In table 4.1 are the score's criteria for students. In table are explained if their score 90 – 100 is excelent (A+), 80 – 89 is very good (A),

70 – 79 is good (B), 60 – 69 is enough/fair (C), 50 – 59 is less (D), and if their score 0 – 49 is bad/low (E).

The result of pre-test and post-test from VIII-B class is presented in the following table:

Table 4.2 Score of post-test and pre-test

No	Student	Pre-test	Post-test
1	AES	68	80
2	AG	76	84
3	ANS	78	82
4	BAS	72	82
5	BYS	62	80
6	DENC	68	76
7	DS	74	78
8	DRP	66	80
9	DS	76	80
10	EW	76	84
11	EBE	76	82
12	FHS	58	80
13	FA	74	82
14	IR	74	94
15	IW	82	90
16	MSE	68	80
17	MRP	70	90
18	NR	68	78
19	NL	70	88
20	PINK	84	92
21	RP	72	78
22	REA	74	84
23	RHM	68	76
24	RM	72	88
25	S	68	76
26	TA	74	84
27	VR	84	92
28	WIN	80	94
29	YIP	76	82
30	YAP	62	78
31	YDN	78	84
		2248	2578

From the table 4.2, there are significant different score students' pre-test and post-test in experimental class. The researcher arranged the

frequency and the percentage of the students' score that can be seen as in the following table.

Table 4.3 Frequency of Students' Score

No	Score	F_x	F_y
1	90-100	0	6
2	80-89	4	18
3	70-79	17	7
4	60-69	9	0
5	50-59	1	0
6	0-49	0	0
		X₁=31	X₂=31

The percentage of the students pre-test and post-test' score can be seen in following table.

Table 4.4 Percentage of the Students' Pre-test

Grade	Score Criteria	F_x	%
A+	90-100	0	0
A	80-89	4	12.90
B	70-79	17	54.84
C	60-69	9	29.04
D	50-59	1	3.22
E	0-49	0	0
		N = 31	P = 100%

Table 4.5 Percentage of the Students' Post-test

Grade	Score Criteria	F_y	%
A+	90-100	6	19.36
A	80-89	18	58.06
B	70-79	7	22.58
C	60-69	0	0
D	50-59	0	0
E	0-49	0	0
		N = 31	P = 100%

$$P = \frac{F}{N} \times 100\%$$

N

The result of pre-test and post-test in the percentage and criteria is different. After using Internet-based Project Work in teaching and learning,

on the table 4.4 and 4.5 shows that A+ grade has increased (0% to be 19.36%), A grade has increased (12.90% to be 58.06%). B grade has equal percentage (54.84% to be 22.58%). C grade has decreased (29.04% to be 0%). D and E grade has also decreased (0% to be 0% and 0% to be 0%). In conclusion, it shows that after using Internet-based Project Work as media to teach vocabulary had increased than before using Internet-based Project Work as media.

The analysis of this study is made from the students' score of test. As explained in previous that the instrument used in this study is vocabulary test, including pre-test and post-test. The analysis is made to find out there is any difference in students' score before and after taught using Internet-based Project Work. It is also to find out the effect of Internet-based Project Work in building up the students' vocabulary mastery and to show Internet-based Project Work can give positive effect in increasing the students' vocabulary mastery.

In the below is commentary about validity and reliability test has been calculated by the researchers. These are some step to validity test :

a. Step 1. Make helping table in form of the gain score from instrument test.

b. Step 2. Establish the scores of X, Y, X², Y², XY (validity test item). The data score of validity test Described in table 4.6.

Example of validity tests item no 1 by using product moment correlation:

$$r_{count} = \frac{N(\Sigma XY) - (\Sigma X)(\Sigma Y)}{\sqrt{\{N \cdot \Sigma X^2 - (\Sigma X)^2\} \{N \cdot \Sigma Y^2 - (\Sigma Y)^2\}}}$$

$$r_{count} = \frac{31(244) - (23)(313)}{\sqrt{\{31(23) - (23)^2\} \{31(3293) - (313)^2\}}}$$

$$r_{count} = \frac{7564 - 7199}{\sqrt{\{713 - 529\} \{102,083 - 97,969\}}}$$

$$r_{count} = \frac{365}{\sqrt{184 \times 4114}}$$

$$r_{count} = \frac{365}{\sqrt{756,976}} \rightarrow r_{count} = \frac{365}{870,043}$$

$$r_{count} = 0.42$$

So, for the test item no 1 the validity coefficient score is 0.42.

Scores from other test items that were calculated by using product moment correlation could get the score of validity, in table 4.7 described the result of validity coefficient.

After calculating by using product moment correlation (r_{count}), the scores counted by using formula (t_{count}) as follows:

Example of the calculation for t_{count} of number 1.

$$t_{count} = \frac{r\sqrt{n-2}}{\sqrt{1-r^2}} = \frac{0.42\sqrt{31-2}}{\sqrt{1-(0.42)^2}} = \frac{0.42\sqrt{29}}{\sqrt{1-0,2}} = \frac{0.42 \times 5,38}{\sqrt{0.8}} = \frac{2.260}{0.89} =$$

2.539

t distribution for $\alpha = 0,05$ or 5% and two sides test with degree of freedom (*derajat kebebasan*) ($dk = n-2 = 31-2 = 29$). So can get the $t_{table} = 2,45$. The rules of validation are: if $t_{count} > t_{table}$ means the test item is valid and, $t_{count} < t_{table}$ means the test item is not valid. So, $2.539 > 2.45$ means the item for number 1 is valid. The result of other items after calculated present in the table 4.8 and From the table 4.8, can be concluded that the entire instrument test can be used to test the experimental class learning achievement.

c. Step 3. Establish the score of reliability test items. In the table 4.9 explain about the coefficient of reliability test and the below is calculating the entire test item by using formula K – R 20:

$$r_{11} = \left(\frac{k}{k-1}\right) \left(\frac{S^2 - \sum pq}{S^2}\right)$$

$$r_{11} = \left(\frac{30}{30-1}\right) \left(\frac{3,191^2 - 3,11}{3,191^2}\right)$$

$$r_{11} = (1,034) \left(\frac{10,1824 - 3,11}{10,1824}\right)$$

$$r_{11} = (1,034) \left(\frac{7,0724}{10,1824}\right)$$

$$r_{11} = 1,034 \times 0,6945 \rightarrow r_{11} = \mathbf{0,71}$$

After calculating the reliability of the entire test item, the score of reliability is 0, 71. However, based on the criterion of reliability item (see

table 3.4) the reliability score of 0, 600 until 0, 800 is categorized in good reliable. So, it can be concluded that the entire test items are good reliable.

The result of data analysis is from students' score of pre-test and post-test as in the following table.

Table 4.10 The Statistical Result using T-test

No	Student	Pre-Test (x)	Post-Test(y)	d (y-x)	d ²
1	ALS	68	80	+12	144
2	A	76	84	+8	64
3	DSP	78	82	+4	16
4	DA	72	82	+10	100
5	DI	62	80	+18	324
6	DK	68	76	+8	64
7	DDS	74	78	+4	16
8	DK	66	80	+14	196
9	ENT	76	80	+4	16
10	EDE	76	84	+8	64
11	FAW	76	82	+6	36
12	HTL	58	80	+22	484
13	ICW	74	82	+8	64
14	INW	74	94	+20	400
15	LN	82	90	+8	64
16	MNP	68	80	+12	144
17	NAA	70	90	+20	400
18	NA	68	78	+10	100
19	NAP	70	88	+18	324
20	NNL	84	92	+8	64
21	NP	72	78	+6	36
22	NT	74	84	+10	100
23	RL	68	76	+8	64
24	RDPJ	72	88	+16	256
25	RPDA	68	76	+8	64
26	RMSA	74	84	+10	100
27	SDS	84	92	+8	64
28	SM	80	94	+14	196
29	TIR	76	82	+6	36
30	TFN	62	78	+16	256
31	VA	78	84	+6	36
	N=31	ΣX= 2248	ΣY= 2578	Σd= 330	Σd²= 4292

a. Finding the mean of x(Mx) and y(My)

$$M_x = \frac{\sum x}{N} = \frac{2248}{31} = 72,51$$

$$M_y = \frac{\sum y}{N} = \frac{2578}{31} = 83,16$$

b. Finding the mean "D"

$$MD = \frac{\sum D}{N} = \frac{330}{31} = 10,64$$

c. Finding T-score

$$\begin{aligned} t &= \frac{MD}{\sqrt{\frac{\sum D^2 - \frac{(\sum D)^2}{N}}{N(N-1)}}} \\ &= \frac{10,64}{\sqrt{\frac{4292 - \frac{(330)^2}{31}}{31(30)}}} \\ &= \frac{10,64}{\sqrt{\frac{4292 - 3512,90}{930}}} \\ &= \frac{10,64}{\sqrt{\frac{779,1}{930}}} \\ &= \frac{10,64}{\sqrt{0,837}} = \frac{10,64}{0,914} = 11,641 \end{aligned}$$

Hypothesis Testing

From the data analysis it could be identify that:

1. When the value of T-score > T-table in $d.f= 30$ with the significant level 0,05, the alternative hypotesis (Ha) is accepted and the Null Hypotesis (Ho) is rejected. It means that there is significant different score of vocabulary mastery to the eighth grade students before and after being taught using Internet-based Project Work.

2. When the value of T-score $>$ T-table in $d.f= 30$ with the significant level 0,05, the Null Hypothesis (H_0) is accepted and the alternative hypothesis (H_a) is rejected. It means that there is no significant different score of vocabulary mastery to the eighth grade students before and after being taught using Internet-based Project Work as media.

The mean of total vocabulary test score of 31 students before being taught by using Internet-based Project Work is (72.51). After getting treatment, the mean score of students' vocabulary is (83.16). It means that the students' score is improved.

Based on the statistical calculation using t-test, the researcher gives interpretation to t_{count} . First, she considered the $d.f.$ with the $d.f$ ($31-2=29$). She checked to the score of "t" at the significance level of 0,05. In fact, with the $d.f$ of (29) and the critical value at 0,05 significance t_{table} was (2.045).

By comparing the "t" that she got in calculation $t_{count} = (11.641)$ and the value of "t" on the $t_{table} = t_{0.05} = (2,045)$. It is known that t_{count} is bigger than $t_{table} = 11.641 > 2.045$

Because the t_{count} is bigger than t_{table} the null hypothesis (H_0) is rejected and the alternative hypothesis (H_a) is accepted. It meant that there is significance different score of the students vocabulary mastery of the eighth grade students of SMPN 1 DURENAN before and after being taught by using Internet-based Project Work as media.

The objective of this study is to know if there was an effect of using Internet-based Project Work toward students' vocabulary mastery of the eight grade students of SMPN 1 DURENAN in the academic year 2020/2021.

Based on research method in chapter III in this research, teaching and learning process is divided into three steps. First step is the researcher administrated pre-test by giving vocabulary test. It is used to know the students' earlier vocabulary before they get treatment.

The second is given treatment to the students. The treatment here is teaching vocabulary by using Internet-based Project Work . The material is about narrative text. After the students got treatment, they were more

enthusiastic to learn vocabulary. The last step was giving post-test to the students after they got treatment.

From the research finding, it is known that the t_{count} is bigger than t_{table} and the alternative hypothesis (H_a) is accepted, while the Null hypothesis (H_0) is rejected. It means that there is significance different score of the vocabulary achievement of the eighth grade students of SMPN 1 DURENAN in the academic year 2020/2021 before and after being taught using Internet-based Project Work.

Based on the result, it can be concluded that using internet-based project work is effective in teaching vocabulary at junior high school especially for the eight grade students of SMPN 1 Durenan. It can be seen in the treatment process, the students be more interested and felt enthusiast in learning vocabulary. The students become independent and responsible in learning language especially for vocabulary learning. It supported by asmani (2011:129) which states that Internet based learning is a website that used in presenting teaching learning materials. This ways help the learner to access learning sources that they need. He also explains that the learners use Internet-based Project Work for searching, exploring and sharing information efficiently and effectively. By using Internet-based Project Work, the learners get ideas and experience quickly. It develops their initiative and ability learning independently. It also supported by the statement of Benson (2001:140) that states the internet has also been used to facilitate self-access language learning as many centres have made learning resources available through the web.

Based on the explanation above the teacher must not only focus on presenting materials for the students but the most important one must be considered that is how to presents the materials. In this research, the researchers using Internet- based project work as a way in teaching vocabulary. In this media the students study vocabulary independently by searching on the internet, it makes them more responsible in their study. This media is done to make the use of Internet-based Project Work in

teaching learning process as usual as using books so the students be aware with technology.

Conclusion

Result of research finding, the researcher concludes that as follow:

1. The student's achievement before taught by using Internet-based Project Work is good because the mean of the total score of 31 students is (72.51).

2. The student's achievement after taught by Internet-based Project Work is very good because the mean of the total score of 31 students is (83.16).

3. Based on the statistical using analysis T – test with the significant level 0,05 and the d.f= 29 showsthe value of table “t” = (2.045). While, t_{count} is (11.319). Because the t_{count} is higher than t_{table} the alternative hypothesis (H_a) that states there is significant difference score of the students vocabulary achievement by using Internet-based Project Work is accepted, while the null hypothesis (H_o) that states there is no significant difference score of the students' vocabulary achievement by using Internet-based Project Work is rejected. So, there is any significant difference score of the students vocabulary achievement before and after taught by using Internet-based Project Work.

From the result above implies that the Internet-based project work technique as media is effective used in teaching vocabulary to the eight grade students of SMPN 1 DURENAN.

Some suggestion are addressed to the students, teachers and future writer, as follows:

1. For the Students : By Internet-based Project Work as media, the students improve their achievement in vocabulary. The students are suggested to follow up the vocabulary by using it in their study. The students would be active and independent in classroom because Internet-based Project Work helps the students to be active in learning English. It is hoped that the students can increase and improve their ability. The students

not only understand the word from the books but also the students uses the technology in learning. So, the use of technology in teaching learning becomes as common as use the books.

2. For the Teacher : In order to succeed in teaching English, Internet-based Project Work should be used for teaching learning English, especially vocabulary. The teacher can be more creative in applying that technique to the students and use it in teaching vocabulary so that the students will be spirit and interested in learning English.

3. Finally, For the Next Researcher : this research is not perfect yet, it is suggested for the future researcher to conduct further research on the similar area by improving the methodology or use it as reference to conduct a futher research related to Internet-based Project Work in different area of teaching. This study is very important because it will give some knowledge to the researcher and to know the benefits of using Internet-based Project Work in teaching English

References

- Arikunto, Suharsimi. 2010. *Dasar-dasar Evaluasi Pendidikan*. Jakarta: Bumi Aksara
- Ary, Donald et al. 1985. *Introduction to Research in Education*. USA: CBS College Publishing.
- Ary, Donald. 2002. *Introduction to research in education. Sixth edition*. New York :Thomson learning
- Ary, D. Jacobs, L., C., Sorensenn, C., & Razavieh, A. 2006. . *Introduction to research in education*.Canada: Thomson Wadsworth
- Ary, Donald et al. 2010. *Introduction to Research in Education*. USA: Wadrworth, Cengage Learning.
- Brown, H. Douglas. 2001. *Teaching by Principles an Interactive Approach to Language Pedagogy*. San Francisco State University: Addison Wesley Longman.
- Chun, D. M., & Plass, J. L. (2000). Networked multimedia environments for second language acquisition. *Network-based language teaching: Concepts and practice*, 151-170.
- Coombe, C., Folse, K., & Hubley, N. 2007. *A practical guide to assessing English language learners*. Ann Arbor, MI: University of Michigan Press.

- Gu, Y. (2010). Learning strategies for vocabulary development. *Reflections on English Language Teaching*, 9(2), 105-118.
- Richards, J. C., & Schmidt, R. (2010). *Longman dictionary of language teaching and applied linguistics (4th ed.)*. London: Longman (Pearson Education).
- Sugiyono. 2011. *Metode Penelitian kuantitatif Kualitatif dan R&D*. Bandung: Alfabeta.
- Tim dosen STKIP PGRI Tulungagung, 2015. *Pedoman Penyusunan Skripsi*. Tulungagung : UPPM STKIP PGRI Tulungagung