

# The Effectiveness of Peer Assessment in Improving Writing Skills of Students with Different Grammatical Competencies at SMA Negeri 3 Palangka Raya Kalimantan Tengah

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## ABSTRACT

This research aimed to explain the effectiveness of Peer Assessment in improving writing skills of students with different grammatical competencies at SMA Negeri 3 Palangka Raya. The researcher used pre-experimental research. This research consisted of one group pre-test and post-test design. Before students do the pre-test and post-test, they do the grammar test to know their grammatical competencies. Then, the pre-test and post-test scores were calculated in the achievement of student's writing skills using Peer Assessment. The sample of this research is tenth grade students consisting of 30 students. Result of this study is from the test ANOVA, which showed an effectiveness of Peer Assessment on the student's writing. The mean score of pre-tests is 63.26 and after the treatments is 72.17, it concluded that there is a rising score of students with low grammatical competencies. It raises 8.91 points. It means that students with low grammatical showed the improvement.

**Keywords:** Peer Assessment, Writing Ability, Descriptive Text, Grammar Levels

## INTRODUCTION

Education is an integral part of the life of the nation and state. One of which is English

language education. With education, it will produce the next generation who are expected to have a soul like the ideology adopted by a country. The quality of education also affects the quality of the human resources of a nation and state. English is an important skill which leads people to a higher level. As one of the international languages, English plays an important role almost in all aspects of life. Indonesia is a linguistically diverse country with more than seven hundred vernaculars along with their dialects spoken by geographically distributed ethnic groups. Indonesia has experienced a resurgence of interest in the English language teaching. In the education sector, English has become one of the subjects that are taught from elementary school until the university level. Writing has been considered the most difficult skill to master among the four language skills. As we all understand, the four main language skills: reading, listening, speaking, and writing, should be taught in the teaching and learning processes of English. Writing, as one of its productive skills, attempts to get learners to think about writing structure, grammar, word choice, language use, and mechanisms (Fauziah et al., 2019). These characteristics of language that construct appropriate writing product are often make problems for language learners in the Indonesian context. Writing

has also been considered as an act for solving problems. In this case, as a form of problem-solving, a writer is faced with two main tasks: a) generating ideas, and b) composing these ideas into a written text that meets the needs of the readers and efficiently communicates the authors' messages (Hamp & Lyons, 2006). Writing is a way to employ opinions and knowledge to develop a written text.

A good way of writing has been made by a researcher (Rothery, 1994). There are three main stages of the teaching-learning cycle: Deconstruction, Joint Construction, and Independent Construction. All three stages of pedagogy involve building a field and setting context (Rothery, 1994). That means, the students are familiar with and understand with the social purpose of the genre and the content of the texts they are reading and writing. Students are required to write different types of texts. Its aims to represent students' ideas, opinions and experiences in real life by creating different types of texts (Fitriati et al., 2018). Good writing comes from knowledge, experience, and hands-on practice. Writing is a skill that enables learners to plan and rethink the communication process (Celce Murcia, 2001). It means that to create good writing, the writers need to employ all their thought and knowledge. Along with the application of communication technologies in learning English as a foreign language (EFL), showing the performance of assessment in the assessment of receptive skills and academic knowledge in a natural way multidimensional. The limited time at school has been one of the obstacles, so there has been a way of evaluating between peers, which in addition to saving time, students are also more active in class.

Peer Assessment has been widely used in various teaching and learning contexts such as teacher education, computer science, language learning, and a variety of other disciplines (Li & Gao, 2015). Peer Assessment is one way to assess a friend's writing. Peer Assessment or partners' feedback requires students to provide

feedback or comment (or both) to their peers' writing product or performance, based on the requirement of the excellence criteria of it (Boud & Falchikov, 2007). Interactions among students are greatly increased in the implementation of Peer Assessment in the learning process, and it is an effective method for teachers to monitor their students' progress at regular intervals. In the classroom, communicative process happens when there is an interaction between teacher and students, teacher-and each student, or student-student, they interact with others by asking question, responding, sharing the information, and giving opinion. Based on the observation in SMA Negeri 3 Palangka Raya, especially on the tenth-grade students, they still confuse in writing skill. The teacher needs extra creativity in the teaching and learning process. This research will be implemented in SMA Negeri 3 Palangka Raya. The researcher wants to explain the effectiveness of Peer Assessment to improve writing skill with different grammatical.

## **LITERATURE REVIEW**

### **Peer Assessment**

Peer Assessment is defined as the process in which students assess each other's work using performance criteria (Lan Li & Gao, 2015). In Peer Assessment, students do their own task first and then, with teachers' guidance and support, make an assessment and leave comments for their peers, from which students are then able to improve their work. Furthermore, peer interaction allows students to collaborate and provide each other with the necessary vocabulary to improve their sentences so that they can then perform better (Astuti & Barrat, 2021). The process of Peer Assessment allows students to provide and receive feedback on their work with minimal time investment by the instructor, making it an attractive tool for use in today's era of ever-increasing class sizes and faculty workloads.

## **Writing Ability**

Writing is a language skill that requires high-level mental skill such as producing a new product, questioning, evaluating, and analyzing synthesizing. Writing is the result of our desire to express our feelings, thoughts, dreams and ourselves. In the writing process, students should follow several steps to produce a good piece of writing, i.e., organizing their ideas by checking and reviewing, circumnavigating the text, and making necessary changes to create a good text (Yilmaz & Erkol, 2015). Individuals find the thoughts and ideas they want to express in their stories through the writing process. Good writing comes from knowledge, experience, and hands-on practice. It means that to create good writing, the writers need to employ all their thought and knowledge.

## **Descriptive Text**

Descriptive is text that tells in detail about all things of something clearly. Descriptive Text describes persons, things, and places with relevant details related to smells, appearances, sounds, shapes, and tastes (Kaharuddin et al., 2022). A good description is a word picture; the reader can imagine the object, place, or person in his or her mind.

## **Grammar Levels**

Grammar Levels is the ability to arrange words into a sentence or even a paragraph. It is the knowledge of the code of language like grammatical rules, vocabulary, pronunciations, spelling, etc (Celce Murcia, 1995). So that the reader can understand the content or purpose of the sentence. Grammar is the system of rules used to create sentences refers to the knowledge of parts of speech, tenses, phrases, clauses and syntactic structures used to create grammatically well-formed sentences in English (Richard, 2016). The significance of grammar to text comprehension is clear when lexical information is presented well but the necessary grammatical cues are not.

## **MATERIALS & METHODS**

### **Research Design**

This research used the quantitative. Quantitative research is a type of educational research in which the researcher decides what to study, asks a specific, narrow question, collects quantifiable data from participants, analyse these numbers using statistics, and conducts the inquiry in an unbiased, objective manner (Creswell, 2008). This research used a pre-experimental design. In addition, this research used a one-group pre-test post-test design that deals with the student's grammar competencies in improving writing skill.

### **Participant**

The researcher conducted the research in SMA Negeri 3 Palangka Raya, Kalimantan Tengah. The study population was the two-semester students in the 2022/2023 academic year consisting of one class. The subjects were the tenth grade, with consisted of 30 students.

### **Instruments**

The researcher used three distinct types of instruments to collect the data. The data is collected from preliminary research (observation), grammar test, pre-test and post-test. Before conducting the research, the researcher asked for permission from the principal and teachers at SMA Negeri 3 Palangka Raya, Kalimantan Tengah and then do preliminary research (observation). Before doing the pre-test, the students do a grammar test to know the grade either high or low. After that, in the pre-test students ask to make descriptive text. At the next meeting, the researcher gave a Peer Assessment treatment. The researcher used Topping theory (2018) formative assessment and then does post-test.

### **Data Analysis Techniques**

The researcher used data from pre-test and post-test from the beginning. It is important to know whether the teaching process was successful or not by using data analysis. ANOVA (Analysis of Variance) used in this

research analysis the data from pre-test and post-test. Analysis of Variance (ANOVA) was done by using SPSS for Windows version 22 to determine the results of this research. Means and standard deviations for the test score were calculated using descriptive statistics, and the degree of statistical significance was determined using inferential statistics (i.e., paired t-test and one-way ANOVA). If the significant value (p-value)  $\leq \alpha$  (5% or 0,05), the alternative hypothesis is rejected.

## RESULT

In the result, there are two parts, they were students' grammar test and data analysis. The classification of students' grammatical competencies was obtained into high and low levels of grammar. The data analysis was about statistical analysis of data collection. It was divided into two sub parts: pre-analysis and hypothesis testing. Pre-analysis was used to test normality and homogeneity of data collection and hypothesis testing.

### Students' Grammatical Competencies

The sample of research were classified into high and low grammatical competencies. The researcher used grammar test to know the students' grammatical competencies. A grammar test administered at the beginning. The test consisted of 25 multiple choice grammar items. The students were asked to do the test in 60 minutes. The researcher calculated their scores and found the median of the scores. Then the median score was used to classify the students whether they have high or low grammatical competencies. The median of the grammar score can be seen on the table below.

**Table 1 Students' Classification in Grammatical Competencies**

Grammatical Competencies	Students
High	7
Low	18
Total	25

Based on the result of the grammar test in the table above, it is found that 7 students

got the score more than 0.79 and 18 students got the scores less than 0.79.

## Pre-analysis Testing

### Test of Normality

The researcher tested the normality of data collection by using one sample Kolmogorov-Smirnov that compares the data distribution with standard normal distribution. The following tables showed the concise result of normality tests on pre-test and post-test.

**Table 2 Normality of Pre-Test**

Tests of Normality							
Pre-test	Grammar	Kolmogorov-Smirnov <sup>a</sup>			Shapiro-Wilk		
		Statistic	df	Sig.	Statistic	df	Sig.
		Low	.172	23	.075	.947	23
High	.186	7	.200 <sup>*</sup>	.883	7	.238	

According to the table above, it can be seen that the data of Kolmogorov-Smirnov in the pre-test are 0.075 for students with low grammatical competencies and 0.200 for students with high grammatical competencies. Since the sig. more than the level of significance 0.05, it can be concluded that the data of pre-test scores are normally distributed. The data of post-test score is able to be viewed by the following table:

**Table 3 Normality of Post-Test**

Tests of Normality							
Posttest	Grammar	Kolmogorov-Smirnov <sup>a</sup>			Shapiro-Wilk		
		Statistic	df	Sig.	Statistic	d	Sig.
		Low	.122	23	.200 <sup>*</sup>	.963	2
Hig	.272	7	.127	.926	7	.516	

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

From the table 3 showed that the significance value (sig value) in post-test is 0.200 for students with low grammatical competencies and 0.127 for students with high grammatical competencies. Since the

sig. more than the level of significance 0.05, it can be concluded that the data of post-test scores are normally distributed.

### Test of Homogeneity

The researcher used Levene test of homogeneity of variance to test whether the data was homogeneous or not. The following tables described the homogeneity tests on pre-test and post-test of variance.

**Table 4 Homogeneity of Pre-Test**

Test of Homogeneity of Variances			
Pretest			
Levene Statistic	df1	df2	Sig.
4.046	1	28	.054

Based on the table above, it can be seen that Levene Statistic score in pre-test is 4.046 with the significance value is 0.054. Since it is higher than 0.05, it can be concluded that the data of pre-test in this research is homogeneous.

**Table 5 Homogeneity of Post-Test**

Test of Homogeneity of Variances			
Posttest			
Levene Statistic	df1	df2	Sig.
2.465	1	28	.128

According to the table 5, it can be seen that Levene Statistic score of post-tests is 2.465 with the significance value is 0.128. Since it is higher than 0.05, the data of post-test in this research is homogeneous.

### Effectiveness of Peer Assessment in improving the writing skills of students with low grammar competencies

The following tables present the explanation of the first research hypothesis including paired sample statistics and paired samples test.

**Table 6 Paired Samples Statistics of Peer Assessment to Student with Low Grammatical Competencies**

Paired Samples Statistics					
		Mean	N	Std.	Std Error
Pair 1	Pretest	63.26	23	10.371	2.163
	Posttest	72.17	23	8.616	1.797

Table 6 shows that the mean score of pre-tests is 63.26 and after the treatment is 72.17. It can be concluded that there is a rising score of students with low grammatical competencies. It raises 8.91 points. It means that students with low grammatical showed the improvement.

**Table 7 Paired Sample Test of Peer Assessment to Students with Low Grammatical Competencies**

Paired Samples Test								
	Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)
				Lower	Upper			
				Paired Differences				
Pair 1 Pretest - Posttest	-8.913	3.965	.827	-10.628	-7.199	-10.781	22	.000

Based on the table above, it can be described that the significance value is 0.000. it less than 0.05. There is a significant difference between the score of pre-test and post-test for students with low grammatical competencies, Ha is accepted.

### Effectiveness of Peer Assessment in improving the writing skills of students with high grammar competencies

The following table would explain about the paired sample statistics and paired sample test.

**Table 8 Paired Samples Statistics of Peer Assessment to Students with High Grammatical Competencies**

Paired Samples Statistics					
		Mean	N	Std. Deviation	Std. Error
Pair 1	Pretest	68.29	7	5.880	2.222
	Posttest	77.86	7	5.429	2.052

According to table 8, it can be seen that the mean score of pre-tests is 68.29 and the post-test mean score is 77.86. It can be concluded that the score of students with high grammar increased. The explanation of paired samples test can be seen in table 9.

**Table 9 Paired Samples Test of Peer Assessment to Students with High Grammatical Competencies**

Paired Samples Test								
Pair 1 Pretest-Posttest	Paired Differences					t	df	Sig. (2-tailed)
	Mean	Std. Deviation	Std. Error Mean	95% Confident Interval of the Difference				
				Lower	Upper			
	-9.571	3.952	1.494	-13.227	-5.916	-6.408	6	.001

Based on the table, it can be described that the significance value is 0.001. It is less than 0.05. There is a significant difference between the score of pre-test and post-test for students with high grammatical competencies,  $H_0$  is accepted.

## DISCUSSION

The data were analysed in statistical analysis by using SPSS version 22.0. The data was delivered from the grammar test and pre-test post-test scores to know the effectiveness of Peer Assessment. As stated by (Brown, 1998) as cited in (Kolesnikova et al, 2020) Peer Assessment give students an important sense of responsibility for their fellow students' progress, but also forces them to concentrate on the skills during their own presentations.

Based on the result, there a significant effect of Peer Assessment on improving the writing skills of students with low grammatical competencies. The post-test score increased following the treatments, demonstrating that the Peer Assessment was effective to use in writing skills to students with low grammar competencies. The mean score of the post-test was 72.17 and the mean score of the pre-test was 63.26.

Students learn to evaluate their own work more effectively and identify areas for

improvement based on the feedback they receive from their peers (Yu and Hu, 2017). Peer Assessment also fosters a sense of community and collaboration in the classroom as students have the opportunity to learn from one another, share their perspectives and experiences, and build stronger relationships with of their peers.

Peer Assessment technique was effective to improve writing skills students with high grammatical competencies because there was improvement in the post-test score after given the treatment. The mean score of post-tests 77.86 and the mean pre-test score was 68.29. Finally, from the hypothesis has proven that Peer Assessment could help the students increasing students' writing skills for high and low grammatical competencies.

## CONCLUSION

The study aimed to answer the two research questions on the effectiveness of Peer Assessment with different grammatical competences to improve writing skill. First, Peer Assessment is effective to improve writing skills to students with low grammatical competence. The statistical analysis shows that the significant value is lower than the significant level. The score shows that the mean score of post-tests is higher than the mean score of pre-tests. The second, Peer Assessment technique is effective and has significant different when it is used to improve writing skills to students with high grammatical competencies. The mean score of post-tests is higher than the mean score of pre-tests. Moreover, the statistical analysis shows that the significance value is lower than the level of significance. So, Peer Assessment technique is effective and has significance when it is used to improve writing skill to students with high grammatical competencies.

### Declaration by Authors

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