

# The Effect of Using Herringbone Technique on the Eleventh Grade Students' Reading Comprehension Achievement at SMAN 1 Pesanggaran

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**Abstract:** This research is to know the effect of using Herringbone's Technique on the eleventh grade students' reading comprehension achievement at SMAN 1 Pesanggaran. The research design was experimental. The experimental class was taught by using Herringbone Technique while the control class was taught by using Reading Aloud Technique. The research area was chosen by using purposive method. The research respondents were selected by using cluster random sampling by lottery. The research data were collected by test, and the result showed that the t-test value was 2.44 ( $>1.995$ ) with the significant level of 5%. The t-test value 2.44 was higher than the t-table value (1.995). This means that the null hypothesis ( $H_0$ ) was rejected while the alternative hypothesis ( $H_1$ ) was accepted. In conclusion, there was a significant effect of using Herringbone Technique on the eleventh grade students' reading comprehension achievement at SMAN 1 Pesanggaran.

**Keywords:** Experimental Research, Herringbone Technique, Reading Aloud Technique, Reading Comprehension Achievement

Language plays an important role as a means of communication in our lives. There are so many languages in the world and one of them is English. English is used as an international language whether it is in oral form or in written form. English is also considered as the first international language which is used in many fields such as politics, technology, economy, formal conferences, industry, commerce, tourism, journalism and education (Udaini:2011). It means that English has some special places in every important aspect of communication and has been recognized by people in the world. This is in line with Crystal (2003:2) that "English is a global language". However every country treats status of English differently. Some

countries consider English as their first language such as New Zealand, and some others consider it as their foreign language (EFL) for example Indonesia.

English is taught in Indonesia as a compulsory subject at High School Levels and it is considered as a foreign language. English has been introduced to the students since elementary level, at least at the fourth grade. This is in line with Institutional Level Curriculum (2006) stating that English subject is directed to develop language skills so that the graduates are able to communicate in English at a certain level of literacy. English itself has four language skills, covering listening, speaking, writing and reading. English subject is intended to develop students' ability in communicating and mastering English language skills. The point in here is English as an important subject that needs to be mastered by the students in order to communicate orally and written in English.

Reading is one of the important skills to be mastered in learning English and it is considered as the basic skill to recognize the small part of language e.g. words, phrases and sentences. It is also an important gateway to personal development, and to social, economic and civic life (Holden, 2004:18). He also states that readers must be able to navigate or direct different sources of knowledge, know where to go looking for what they need, and able to analyze, interpret and synthesize. That is why in EFL class, the purpose of reading is to get the main point or the main idea from the texts or author's intention and also to know how to mark certain information. In order to achieve that purpose, a teacher in Indonesia should choose an appropriate technique which can help EFL students comprehend the English reading texts easier.

Dealing with students' reading comprehension skill, a teacher should use some techniques and certain methods to achieve the reading comprehension skill. One of the techniques that can be used in teaching reading is by using Graphic Organizer which is called Herringbone Technique (Wood: 1996). Graphic Organizers are important and effective educational tools for organizing content and ideas, and facilitating learners' comprehension of newly acquired information (McKnight, 2010:1). Herringbone technique itself is a technique which can represent the visual information and concept of teaching and learning process. That is why Herringbone Technique is proposed to help students comprehend written form/text. McKnight (2010:50) states that Herringbone Technique is used to establish supporting details for main idea. In addition, Herringbone Technique helps students to understand the connection of supporting details and main idea. It can be said that Herringbone Technique can also help students in finding general and specific information of a text.

Based on the informal interview with the eleventh grade English teacher at SMAN 1 Pesanggaran, the researcher found some informations. The teacher used a reading aloud technique in reading comprehension class. Papalia in Rivers (1987:75) defines reading aloud technique as a technique in which the teacher or student reads orally the text. In addition, he explains that the text may be read orally by the teacher while the students follow the text silently, read silently by the students, or read orally by the students after a silent reading, or after an oral reading by the teacher. The purpose of reading aloud is to know how good the students do in understanding the whole text while listening to their friend and how good they pronounce the words within the text. In this school, the English teacher usually asks the students to read the text after a silent reading. Meanwhile, in the teaching and learning process, the teacher explained the material and gave the students some

exercises individually or in a group. The teacher also stated that he never applied Herringbone Technique before in reading comprehension in the school. Based on the reason above, the researcher conducted an experimental research entitled The Effect of Using Herringbone Technique on the Eleventh Grade Students' Reading Comprehension Achievement at SMA Negeri 1 Pesanggaran.

### **Research Method**

This research was a quasi experimental research using Randomized-Group Post-test Only Design. The objective of this research was to know whether or not there was a significant effect of using Herringbone Technique on the eleventh grade students' reading comprehension achievement at SMAN 1 Pesanggaran.

The area of this research was SMAN 1 Pesanggaran. This school was chosen purposively because the use of Herringbone Technique had never been applied in the teaching learning process of this school before. (Lodico, Dean, and Voegtle: 2006). The population of this research was the eleventh grade of science classes at SMAN 1 Pesanggaran. The research respondents of this research were chosen by considering the results of students' previous score on reading test. Then, the scores were analyzed by using ANOVA to know whether or not the population was homogeneous. The result showed that the population was homogeneous, the two classes were chosen by using cluster random sampling by lottery. The experimental class was given a treatment that was taught reading comprehension by using Herringbone Technique while the control class was taught by using Reading Aloud Technique that usually used by the English teacher.

The main data of the research were collected from students' scores of reading test while supporting data were collected by an interview and documentation. The main

data were analyzed statistically by using t-test formula to find the significant difference between the experimental and control class. The activities of the research used the following procedures. Firstly, the researcher conducting a preliminary study by interviewing the English teacher of the eleventh grade students to get the students' previous score and supporting data. The researcher analyzed the previous score to know the homogeneity of the population or respondents. Then, the researcher selected the experimental and control class, after that the researcher conducted a teaching learning process and gave treatment to the experimental class using Herringbone Technique. The researcher also administered a try out test to the class who did not belong to the experimental and control class to know the reliability of the test. The result of reliability analysis showed that from 30 test items given, the researcher eliminated 2 items categorized as difficult (number 26 and number 30) and 3 items categorized as easy (number 10, 11 and 16). Then, from the reliability analysis the researcher decided to use 25 test items for the post test.

Next step was administering the post test to get the main data about using Herringbone Technique on students' reading comprehension. And the last was analyzing the result of the post-test. From the post test, could be seen that the highest score of experimental class was 100, the medium was 88 and the lowest was 80 while the control class divided as 96 as the highest, 84 as the medium and 72 as the lowest.

### **Research results**

The post test was done to both experimental and control groups. The test administered on 26<sup>th</sup> May 2015 after teaching the two groups twice by using different treatment. The scores of the post test were used to investigate the

significant difference between experimental and control class. The post test consisted of 25 items in the form of multiple choice. The result of the post test was analyzed statistically by using independent sample t-test formula to know the mean difference between the experimental and control class significant or not.

From the analysis of the post test score, it was found that the value of *t-test* value was 2.44. Then, it was consulted to the t-table value with the significant level of 5% and  $Df = 69$ . The value of t-table of 5% with  $Df = 69$  was 1.995. Therefore, the value of t-test was higher than the value of t-table ( $2.44 > 1.995$ ). Consequently, the null hypothesis ( $H_0$ ) stating that “There is no significant effect of using Herringbone Technique on reading comprehension achievement of the eleventh grade students at SMAN 1 Pesanggaran in the 2014/2015 academic year” was rejected. On the contrary, the alternative hypothesis ( $H_1$ ) stating that “There is significant effect of using Herringbone Technique on reading comprehension achievement of the eleventh grade students at SMAN 1 Pesanggaran in the 2014/2015 academic year” was accepted. Thus, it can be stated that Herringbone Technique significantly affected the eleventh grade students’ reading comprehension achievement at SMAN 1 Pesanggaran in the 2014/2015 academic year.

## **Discussion**

The researcher conducted a study about Herringbone Technique in order to know about the effect of Herringbone Technique on the students’ reading comprehension. Then, the researcher administered the posttest in order to get data about the result of using Herringbone Technique on students’ reading comprehension. The total number of the test items was 25 in the form of multiple choice test and the time allocation was 60 minutes. The result showed that Herringbone Technique

significantly affected the eleventh grade students' reading comprehension achievement at SMAN 1 Pesanggaran.

The use of Herringbone Technique was quite new for the respondents, so the researcher had to guide them in the first meeting to make them understand about the function and what should be done with the diagram. The guidance was necessary especially when they tried to construct 5WH1H questions. The students were not good enough in constructing the questions correctly, so the researcher helped them to construct the questions correctly. As the result, they could comprehend the narrative text with no more confusion and difficulties by using Herringbone Technique.

The research finding was in line with the expert's opinions. Deegan (2006) describe that Herringbone Technique helps students for encoding information and drawing relationship between facts and main idea in the text. Furthermore, Herringbone Technique can be used to organize information for all content areas (McKnight, 2010:50). It can be clarified that Herringbone Technique is appropriate for the eleventh grade students. Besides, the students also can identify general and specific information, and also comprehend the reading text easily and accurately by applying Herringbone Technique.

The successful effect of using Herringbone Technique in teaching reading comprehension was supported by previous researches. Anggraeni (2013) did an experimental research to investigate the effect of using Herringbone Technique on reading comprehension. She found that Herringbone Technique was positively affected the reading comprehension achievement of the students in the experimental class. Mardiyani (2013) also conducted a research of Herringbone Technique in a

classroom action research. She gained a positive result that was teaching reading by using Herringbone Technique was able to improve the students' reading comprehension achievement.

From explanation above, it can be concluded that Herringbone Technique was an appropriate technique that has significant effect on the students' reading comprehension achievement, especially in comprehending narrative text. This technique also appropriates for fourth up to twelve grade students. It plays an important role to increase students reading comprehension achievement. The evidence above showed that using Herringbone Technique had a significant effect on reading comprehension achievement of the eleventh grade students of SMAN 1 Pesanggaran.

### **Conclusion**

Based on the data analysis and discussion, the following point could be concluded. That, there was a significant effect of using Herringbone Technique on the eleventh grade students' reading comprehension achievement at SMAN 1 Pesanggaran in the 2014/2015 academic year. It means that the experimental group that was taught reading comprehension by using Herringbone Technique got better reading comprehension achievement than those in the control group.

Since the use of Herringbone Technique in the reading class gave a significant effect on reading comprehension achievement, the researcher proposes some suggestions to the following people. The English teacher is suggested to use and apply Herringbone Technique in teaching reading to help the students comprehend the reading narrative text completely and efficiently. The students of SMAN 1



Pesanggaran are suggested to actively involve themselves and more interested in teaching and learning process of reading comprehension by using Herringbone Technique to comprehend the reading text better because it was proved that the use of Herringbone Technique had a significant effect on the students reading comprehension achievement.

The future researchers are suggested to conduct a further research dealing with similar topic in different aspect of investigation. In addition, the researchers are suggested to conduct different research using different research design, such as, A descriptive study on the use Herringbone Technique on students' reading comprehension achievement.

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