IMPROVING STUDENTS' READING COMPREHENSION ON NARRATIVE TEXT BY USING STORY MAPPING

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ABSTRACT

This research is entitled "Improving Students' Reading Comprehension on Narrative Text by Using Story Mapping, (A Quasi-Experimental Study Done in the Second Grade of Junior High School)". The aims of the research are to know whether or not Story Mapping is effective to improve students' reading comprehension on narrative text and to know whether or not Story Mapping is significantly more effective to improve the students' reading comprehension on narrative text. The subject of the research was the second grade of SMP Tunas Baru Ciparay. The researcher took two classes that each of them consist of 24 students. The sample of the research were VIII-C as the experimental group and VIII-D as the control group. In obtaining the data, the researcher conducted pre-test and posttest. Based on the computation result by using t-test formula, with df = 46 at p = .05 of two-tailed, the critical value of t is 2.021. The result of the pre-test was lower than the critical table (0.001<2.021), which means that there was no significant difference between experimental group and control group before treatment. The result of the post-test was higher than the critical table (3.756>2.021), which means that there was significant difference between experimental group and control group after treatment. It also means that teaching reading comprehension on narrative text by using Story Mapping is significantly more effective than using the conventional method.

Keywords: Reading, Narrative Text, Story Mapping

1.1 The Background

The importance of having the ability to comprehend a text is absolutely needed for the students since the curriculum demands from the first grade of high school. Also, as a receptive skill, reading contributes to the quality of students' writing. As stated by Westwood (2001:10), students who are good comprehenders are also good thinkers.

In this research, the focus will be on the students' problems of comprehending a text. "In order to understand text, a reader must be able to identify the words rapidly, know the meaning of almost all of the words and be able to combine units of meaning into a coherent message" (Westwood, 2001:10). Those are the problems that the students face in their reading class. This situation can lead to lack motivation of reading for some students.

"Children who don't understand much of what they read are likely to turn away from reading as it provides no satisfaction" (Westwood, 2001:10). Thus, the students must enjoy the reading activity to keep them focus on the class. There are many interesting strategies to engage the students to their text and make them extract the points of their reading session.

According to Farris (2004, cited in Romli; 2014:3), story map is a graphic or semantic visual representation of a story and illustrates a way to provide an overview of a story. Meanwhile O'Donnell, Dansereau, & Hall (2002:74) stated "Story mapping is considered as a graphic organizers that reduce working memory overload, which eases the reading comprehension process." Story Mapping is a method that is suitable for the students to cope with their reading problem. It is a stuctured graphical informations extracting process of a story. This will help students on pointing out the important part of a story, so that they can understand the text better.

In order to find the empirical evidence of the use of Story Mapping, the researcher will conduct a quasi-experimental research entitled "Improving Students' Reading Comprehension on Narrative Text by Using Story Mapping". This research will be conducted to the second grade of Tunas Baru Ciparay Junior High School.

THEORETICAL FOUNDATION

In this chapter, the researcher will discuss some theories related to the problem of the research. This chapter consists of the explanation of reading, the explanation of narrative text, and the explanation of Story Mapping.

2.1 Reading

2.1.1 The Definition of Reading

Reading is a language receptive skill which should be mastered by the language learners. The process of reading is the reader takes the text meaning as ideas or informations, since it is considered as mental process. Reading is simply taking author's message. Therefore, reading is different from decoding, it has to be understanding the meaning (Ur, 1996:138). Readers should not only know words or phrases, they have to make sense of them and what information they get from them. This is important since the main point of all kinds of reading is to comprehend (Stoller, Anderson, Grabe, & Kamiyama, 2013:8).

2.1.2 The Reading Comprehension

Reading comprehension is the ability to construct and extract meaning from a written text (Mastropieri & Scruggs, 1997:197). Reading comprehension refers to the cognitive and linguistic procedures that are based to understand the meaning of the word, sentence construction, and phrases (Omar and Bidin, 2015:990). The meaning of an exact same word or phrase may be different in one sentence and another, and a sentence may be different too in many paragraphs or texts. This is influenced by the context or topic that is discussed in the text.

According to Shahanan et al. (2010:5), reading comprehension is the process of extracting explicit or implicit meaning that stated by an author and constructing meaning, by connecting the content that the reader gets and reader's prior knowledge and experience, at the same time. To comprehend the text, previous knowledge and experience is beneficial to relate to the context and build the concept of the text. As Harmer (2001:203) stated, "However, a reader who

did not have such pre-existing knowledge would find the reading task more difficult."

A good reader is a good comprehender, because the main point of reading is to comprehend (Stoller et al., 2013:8). The researcher concludes that the reading comprehension is mental process of someone making sense of a text thoroughly by connecting what they have just read and their prior knowledge.

2.1.3 The Importance of Reading Comprehension

As a basic skill that is essential for everyone, Shahanan et al. (2010:5) stated that reading should be practiced since they are a student in lower level of education. Watson et al. (2012:80) also stated, "reading comprehension is the most critical skill students need to be successful in school." Students need to be used to many kinds of text, which they will learn during their study in school year, and learn how to comprehend all of them. Reading comprehension is a mental process which sharpen the mind. Mastering reading skill will contribute to many achievments in life (Alturki, 2010:916), because reading is a basic skill that will give someone cleverness that leads to a greater opportunity in life. Brown (2000:312) stated that reading is an entrance to a new world.

2.1.4 The Purpose of Reading Comprehension

The ability to comprehend a text will not only useful for students' language learning, but also for any other subject. Kader & Eissa (2016:4) stated, "if students experience difficulty comprehending text, it is likely they will struggle in many other academic areas." For instance, students, who can not comprehend a text, will have difficulties to extract the meaning of their biology textbook. So, they likely to struggle following the lesson which will affect their whole biology study, or maybe their career (Grünke, Wilbert, & Stagemann, 2013:51).

Shahanan, Callison, Carriere, Duke, Pearson, Schatschneider, and Torgesen (2010:32) stated that the purpose of reading comprehension are (1) improving students' application of reading comprehension strategies; (2) building their knowledge of specific genres, structures, and texts; or (3) developing their ability to engage in higher-order discussions about the text. The purpose of reading comprehension is to help students in any reading situation and in any academic areas, which will help their career, or future perhaps.

2.1.5 The Types of Reading

Reading performance in a classroom is categorized into two types. According to Brown (2000:312), the types are as follow:

1. Oral Reading

Students read orally at the beginning or intermediate level of language learning. It can be a media for evaluating students' bottom-up processing skill and checking students' pronunciation. Meanwhile, oral reading does not give many advantages in advanced language learning.

2. Silent Reading

Silent reading is mostly done by advanced learners. Silent reading is divided into two subcategories, intensive and extensive reading. In intensive reading, students focus on grammatical structures, discourse makers, and other details that related to understanding the textual meaning, implications, rethorical connection, and content. On the other hand, extensive reading is about general understanding of longer text that is mostly are read for pleasure, non-analyze purpose and non-specific purpose. It is also said that this type of reading is an entrance to a new world.

2.1.6 The Reading Text

Westwood (2001:2) stated, "When words are put together to communicate the meaning, a piece of text is created." Reading a text is to have the text understood. The purpose of a text is to convey message that later has to be extracted by a reader, which needs to understand the text to fulfil the communication purpose.

Again, what is needed is a good comprehender, since understanding of text result comes from the combination of word decoding, prior knowledge, and effective reading strategy (Westwood, 2001:10). This refers to understanding the elements of the text, the purpose of a text, the structure of the text, the language features of the text, etc. Brown (2000:49) stated, "Making reading an enjoyable activity is a very important part of the language learning experience." Students who do not understand the complexion of a text are likely to turn away from reading. As it gives them no satisfaction, they do not enjoy reading as Brown intended.

There are many kinds of text, but Westwood (2001:2) categorized the texts into two types based on its purpose. Factual text types are created to inform, instruct, educate, or persuade the reader. The text kinds that present information or ideas are; explanation text, exposition text, recount text, procedure text, information report, discussion text, factual description, and procedural recount. Literacy text types, which are created to entertain the reader, usually tells about human or living creature experiences. The kinds of this type are; narrative text, poems, and drama.

2.2 Narrative Text

2.2.1 The Definition of Narative Text

Narrative text is a text type which tells a story that has the purpose to entertain the reader. Feez and Joey (2000: 4) stated, that narrative text is a type of text which tells a story about a person or group of people facing problems and react to it, also gives insight about culture and social life. While Anderson and Anderson (2003:13) stated that "narrative text makes the audience think about an issue, teach them a lesson, or excite their emotion." It can be said that a narrative text is usually a product of writing which is developed and tied together to become a story that is the closest to life experience that readers can relate to their own life easily, so that they find it inspiring or entertaining.

Narrative can be spoken or written. Narrative can be told by a first person or third person narrator, the difference is on the involement of the narrator as one

of the character in the story. The way narrators tell the story, indicated that it is happened in a certain time in the past.

2.2.2 The Generic Structure of Narrative Text

Feez and Joyce (2000: 4) showed the steps for constructing a narrative text. They are:

- 1. Orientation, it is the opening of the story which introduce the characters, the settings which when and where the story takes place,
- 2. Complication, contains events of the story which stimulates the reader to guess what will happen in the story. It is the events in which a problem that would be faced by the characters rises,
- 3. Sequence of events, the reactions and the events that follow the complication,
- 4. Resolution, it is where the characters solve the problem in complication,

Coda, contains a comment or moral values which can be learned from the story, but this is an optional step.

2.2.3 The Language Feature of Narrative Text

The grammatical features that included in a narrative text is stated by Anderson & Anderson (2003:13) are as follow:

- 1. Nouns, that identify the specific characters and places in the story,
- 2. Adjectives, that provide accurate descriptions of the characters and settings,
- 3. Verbs, that show actions that occur in the story,
- 4. Time words, that connect events amd tell when they occured.

2.3 Teaching and Learning Reading Narrative Text

2.3.1 The Problem in Teaching Reading Narrative Text

The EFL students find that reading is difficult when they are facing longer sentences and words, also unfamiliar vocabulary (Harmer, 2001:203). They tend to follow the material that is being taught without paying attention to what is being discussed. This makes the goal of reading subject unsuccessful. In the end, students cannot understand the text that is given by the teacher.

Shahanan et al. (2010:5) stated that there are type of skills, such as decoding; broad conceptual knowledge; prior knowledge and experience; thinking and reasoning ablity; and motivation towards academic purpose, that influence the students' capacity of learn independently, to process any information from variety of topics, to enjoy reading, and to have the deep literature experience. "For some students, these skills may not develop naturally and can result in reading comprehension problems," (Watson, Gable, Gear, & Hughes, 2012:80).

The conventional method in teaching reading in EFL classes are typically not helping the students' improvement on reading comprehension of narrative text. The teaching and learning is usually focus on textbook, that guides the flow from the task to read, teach the vocabulary key, give the comprehension

questions, until summarize the text in their own words (Stoller et al., 2013:3). This conventional method of teaching reading is not effective to improve students' reading comprehension by just tell the students to read and read more. As stated by Watson et al. (2012:80), "Instead, students need highly structured and explicit instruction on strategy use." Furthermore, the conventional method tends to be testing of reading, rather than teaching of how to read text properly, which proven will make the students to become a good reader, (Stoller et al., 2013:3)

2.3.2 Strategy in Teaching Reading Narrative Text

Westwood (2001:10) stated that good comprehenders are effective users of comprehension strategies when they work with text. A strategy can be defined as a mental plan of action designed to achieve a specific purpose. This means that the use of strategies can help the students' reading comprehension difficulties.

"Strategy is the intentional application of a cognitive routine by a reader before, during, or after reading a text," (Shahanan et al., 2010:10). The intentional mental actions improve reading comprehension, since these deliberate efforts help students enhance their understanding, maximize their imperfect skills of reading comprehension, and broaden the students' knowledge that related to the text.

In choosing a particular strategy for the teaching and learning of narrative text, the selection should be taken from the evidence-based strategy that is recommended. The selection also should be suited to the students' needs. The growing number of evidence-based strategies includes: (i) direct instruction on background knowledge, (ii) graphic organizers, (iii) textstructure, (iv) paraphrasing, and (v) summarization, (Watson et al., 2012:82).

The researcher particulary chooses graphic organizer to be disscussed in this research, she finds that the characteristic of graphic organizer may be suitable to improve of reading comprehension on narrative text. as visual or graphic displays that show visual interrelationships of superordinate and subordinate ideas using spatial arrangements, geometric shapes, lines, and arrows to portray the content structure and demonstrate key relationships between concepts." In addition, Stenson (2006) stated that to improve students' comprehension graphic organizer is used by the student as an aid to concentrate on the important points of the story, (cited in Altuki, 2017:916-917). Graphic organizer can be suitable for teaching narrative text, since it emphasizes on highlighting the important elements of the story.

2.4 Story Mapping

2.4.1 The Definition of Story Mapping

Oxford Advanced learner's Dictionary defines 'story' as "A description of events and people that the writer or speaker has invented in order to entertain people." Map is defined as "A drawing to describe or give information about something, especially the way it is arranged or organized." So, if the word is added with –ing, become mapping, it could be defined as a sketch or drawing that shows location or relation between things or place. In other word it is an action to make a map. It can be concluded that story mapping is an act to create an organized information from a story.

Story Mapping is a strategy that enhance students' reading comprehension. It helps the teachers displaying the points or elements of the story, so the students can learn easily. Boulineau, Fore, Hagan-Burke, & Burke (2004:106) stated, "story mapping directs students' attention to relevant elements of stories using a specific structure." Story Mapping makes students learn the text effectively and specifically.

2.4.2 The Benefit of Story Mapping

Visualization is proven that it can affect the comprehension, since it is much simpler and more interesting than lines of words that may confuse the students. Shahanan et al. (2010:18) stated that Story Mapping is the tool that is recommended to help teachers in demonstrating the relationship between elements within a story. Story Mapping can reduce the amount of semantic information they needs to process in order to extract meaning, (Grünke, Wilbert, & Stagemann, 2013:52).

Kader & Eissa (2016:4) explained that the knowledge of narrative story structure will be improved effectively by using Story Mapping technique. Story Mapping, which is considered as graphic organizer, since it eases the cognitive process by only pointing out the essential elements of the story, (O'Donnell, Dansereau, & Hall, 2002:74). By using these tools, a child can reduce the amount of semantic information he or she needs to process in order to extract meaning (Grünke, Wilbert, & Stagemann, 2013:52).

2.4.3 The Procedure of Story Mapping Method

Story Mapping can be used before, during, or after reading for students and teachers to identify the key elements and structure of a story. It is better used during the reading activity to lead students focus on important components of narrative, and put them on the certain shape of the chart, (Boulineau et al., 2004:106)

"The use of this strategy intended to teach them to visually highlight key elements of a passage, and thus, to deepen their understanding of the text," (Grünke, Wilbert, & Stagemann, 2013:51). By highlighting the key elements, students remember clearer what is the point of the story. With their clear understanding, the students will be able to retell the story better. Shahanan et al. (2010:18) stated "For example, a teacher might ask students to list out the main elements (setting, characters, plot, problem, resolution) and link each with one of the fingers of one hand", later the students retell the story easily as the map guide them.

Farris (2004; cited in Romli, 2014:25-26) explained the general procedure to follow when preparing a basic story map:

- a. Read the story. Write a sequenced summary of the main ideas, key events, and characters that make up the plot of the story.
- b. Place the title, theme, or topic of the story in the center of the graphic story map in a predominant box or at the top of the semantic chart.

- c. Draw enough ties projecting out symmetrically from the center of the map to accommodate the major events of the story's plot. Attach related pieces or second-level information from the summary list to these ties in chronological order, moving clockwise around the center. The semantically organized chart is simply arranged by story elements, so information is transferred to it accordingly.
- d. Draw additional ties projecting out symmetrically from each secondary box to accommodate the important details associated with the key plot event, adding relevant information from the summary list.
- e. Review the final semantic chart or story map for completeness. Those steps are preview of procedure how to apply the story mapping method theoretically.

2.4.4 The Purpose of Story Mapping

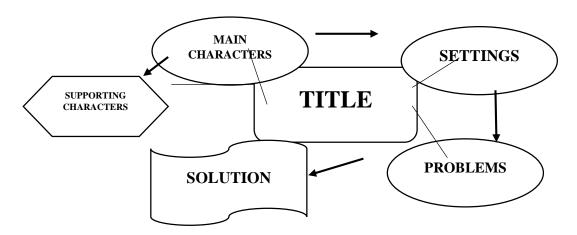
According to Boulineau et al., (2004:106) Story Mapping is specifically intended to improve students' comprehension of a text by emphasizing on the connections between the structure of the story elements, The students also will remember the story better and retell it easily with the structured understanding of the story.

Generally, the purposes of Story Mapping are to enhance the meaning of the text by using mental imagery, to strenghten the bound between the readers and their reading, and the most important is to make the reading activity more enjoyable. As stated by Scott (1990:49), "making reading an enjoyable activity is a very important part of the language learning experience."

2.4.5 The Example of Story Mapping

The map provides readers with a space to record important story grammar categories including: Setting, characters, problem, goals, actions, outcome, and conclusion of the story, (Boulineau et al., 2004:106). The space that is used by the researcher is in various geometrical shapes, so that the students can see the differences and relationship between the elements.

Figure 2.1 Story Mapping Schema



2.5 Teaching Reading Narrative Text by Using Story Mapping

Texas Reading Initiative (2002:19) stated "story maps are visual representations of the elements that make up a narrative." Story Mapping strategy is suitable for teaching narrative text due to many reasons. First, the procedure of Story Mapping makes the students focus more on the core of a narrative story. Second, the benefits of Story Mapping can ease the students' reading comprehension process. The purpose of using Story Mapping as reading category may solve many language learning difficulties.

The researcher conclude that story mapping may be effective in improving students' reading comprehension of narrative text, since the characteristic of it is emphasizing students' interaction with the text. Shahanan et al. (2010:18) stated that story mapping is proven by many researcher to make students comprehend narrative story better. All of the strategies conducted in a lesson, the best ones are on how the students learn, not how the teachers perform, (Lewis & Hill, 1992:8).

CHAPTER III RESEARCH METHODOLOGY

This chapter discusses the methodology of this study. It covers the research design, the research variables, the research hypotheses, population and sample, the research instrument, the research procedures, the schedule of the research and the data analysis.

3.1 The Research Design

The method employed is an experimental design, which focuses on the validity of the effect of independent variable on the dependent variable (Ary et al., 2010:301). There are three designs of experimental research; true-experimental, quasi-experimental, and pre-experimental. Particulary, this research conducts quasi-experimental research. The choice fell to quasi-experimental because the researcher thinks that this is the best option in finding out the answer of the problem stated before. As explained by Fraenkel, Wallen, and Hyun (2012:275), quasi-experimental research provides better control of the subject characteristics threat than other research designs.

Table 3.1
The Ouasi-Experimental Design

Sample	Pre-test	Independent Variable	Post-test
Experimental Group	Y_1	X	Y_2
Control Group	Y_1	_	Y_2

X =The Treatment

 Y_1 = Students' Reading Skill in Pretest

 Y_2 = Students' Reading Skill in Posttest

The quasi-experimental design uses two groups of students for pretest and posttest. The researcher compares between the result of the students' test after the treatment is conducted in experimental group and the result of the students' test in control group, in order to find out the effectiveness of the treatment that is discussed. This research's aim is to find the most valid answers with the most suitable design for this educational research.

3.2 The Research Variable

A variable is a noun concept that varies on different values within a class or object (Fraenkel, Wallen, and Hyunn, 2012:77). According to Ary, variable is divided by its use on the research. The types of variable are as follows:

- a. Independent Variable, is the variable that is manipulated in the experimental group. It is referred as the treatment.
- b. Dependent Variable, is the variable that is observed and measured in this research. It is referred as the outcome.

In this research, the strategy Story Mapping is the independent variable, since it is going to be applied to the experimental group. As for the dependent variable, it is reading comprehension on narrative text, which is being observed and measured in this research.

3.3 The Research Hypotheses

Ary et al. (2010:270) stated, "an experimental begins with an experimental hypothesis, a prediction that treatment will have a certain effect". The research hypotheses is the answer to the research questions. Some of the purpose of hypotheses are as tentative answer or explanation of a phenomena, to provide direction in research, and framework for reporting the findings and conclusion (Fraenkel, Wallen, and Hyunn, 2012:82-83)

The types of the hypotheses are the Null Hypotheses and Alternative Hypotheses, as stated by Fraenkel et al.:

1. Null Hypotheses

Symbolized as H_0 , it states negation of answer the researcher expects in an experiment. The null hypotheses of this research is; There is no significant difference in the result between Story Mapping and the conventional method in improving the students' reading comprehension on narrative text.

2. Alternative Hypotheses

Symbolized as H_a, it states affirmation of answer the researcher expects in an experiment. The alternative hypotheses of this research is; There is significant difference in the result between Story Mapping and the conventional method in improving students' reading comprehension on narrative text.

3.4 The Population and Sample

Fraenkel, Wallen, and Hyunn (2012:91) stated, "a group may be both sample in one context and population in another context". It means that population and sample have similarities in the researcher's interest. Specifically,

population is the group that the researcher hopes to apply the results, while sample is part of population that the information is actually obtained. The sample itself can be a population to another smaller sample.

In this research, the population that interest the researcher is the second grade of SMP Tunas Baru Ciparay which consists four classes, which are VIII-A; VIII-B; VIII-C; VIII-D. Each class has 40 students, and the population is 160 students. Meanwhile, the researcher takes two classes, VIII-A and VIII-B, to be observed. It makes the samples to be 80 students.

3.5 The Instrument

Instrument is a device to collect the data or information from the research subject. Some of the forms of instrument are test, questionnaire, rating scale, and interview. In this research, the test form is used to obtain the result of students' achievment in the variable that is observed. Thus, the instrument is called the achievment test.

Ary et al. (2010:201) stated, "achievment test is used to measure mastery and proficiency in different area of knowledge by presenting subjects with a standard set of questionsinvolving completion at cognitive task." Simply, achievment test is a tool to measure what students have learned. Moreover, achievment test is generally classified into standarized or teacher or researcher made. The teachers or researchers construct their own tests specifically so that the tests are suitable for their objective of research. This kind of achievment test has more advantage than the standarized test that has already been provided, but it is more difficult to make.

To measure students' achievment, this design needed students to take two tests. The pre-test and post-test, which are conducted before and after the treatment. Pre-test is intended to measure the students' current understanding towards the material that will be discussed and to make sure that the experimental group and the control group is not significantly difficult in their reading ability before treatment, Meanwhile, post-test is intended to measure students' understanding after they are given the treatment. Both of the experimental group and control group will take the pre-test and post-test.

The instrument that will be used in this research is teacher-made test. The test will consist of questions of the narrative text comprehension, approximately there are 10 multiple choice questions and 5 open-ended questions.

3.6 The Treatment

The treatment will be given to the VIII-A class as the experimental group, and the researcher will use the conventional method to the VIII-B class as the control group. As explained before the treatment of Story Mapping strategy will be only applied to the experimental group, which is VIII-A. The treatment will be conducted in 4 meetings. Each treatment will be done in 60 minutes.

Table 3.2
The Schedule of the Experiment

Meetings Time	Activities		
	Experimental Group	Control Group	

1	April 30th, 2018	Pre-Test	Pre-Test
2	April 30th, 2018	Treatment	Conventional Method
3	May 2nd, 2018	Treatment	Conventional Method
4	May 3rd, 2018	Treatment	Conventional Method
5	May 4th, 2018	Treatment	Conventional Method
6	May 5th, 2018	Post-Test	Post-Test

3.7 The Data Analysis

The obtained data by the instrument will be processed using t-test for independent group. The scores of the pre-test and post-test are computed statistically to find out the t value. This process of computation is needed to conclude the result of this research. According to Ary et al. (2010:171-173), the formula to find the derived t (t_0) is as follows:

$$t_{0} = \frac{\overline{X_{1}} - \overline{X_{2}}}{\sqrt{\left(\frac{\sum x_{1}^{2} - \frac{(\sum x_{1})^{2}}{N_{1}} + \sum x_{2}^{2} - \frac{(\sum x_{2})^{2}}{N_{2}}}{N_{1} + N_{2} - 2}\right) \cdot \left(\frac{1}{N_{1}} + \frac{1}{N_{2}}\right)}}$$

Note: $\overline{x_1}$ = The mean of the scores of the control group

 $\overline{x_2}$ = The mean of the scores of the experimental group

 Σ_{1}^{2} = The sum of squares of the scores of control group

 Σx_2^2 = The sum of squares of the experimental group

 $(\Sigma x_1)^2$ = The square of the sum of the score of the control group

 $(\Sigma x_2)^2$ = The square of the sum of the score of the experimental

group

 N_1 = The total number of the scores of control group

 N_2 = The total number of the scores of experimental group

The derived t value (t_o)have to be interpreted to state the hypotheses and answer the research questions. The steps in interpreting the result of the computation are as follow:

- 1. Determine the degree of freedomby using the $df = N_1 + N_2 2$ formulation.
- 2. Determine what types of significance test being conducted, whether *o netailed* or *two-tailed*.
- 3. Determine the significance level, the conventional level used is p=.05.
- 4. Determine the critical value of p=.05 and $df = N_1 + N_2 2$.
- 5. Compare the value of the derived $t(t_o)$ to the value of the critical t on the t-table.
 - a. If the value of t_0 is bigger than the critical value of t, the Alternative Hypotheses (H_a) is accepted, stating that there is significant difference in the result between the Story Mapping strategy and the conventional method. This also means that the Story Mapping strategy is effective.
 - b. If the value of t_o is smaller than the critical value of t, the Null Hypotheses (H_a) is retained, stating that there is no significant difference in the result between the Story Mapping strategy and the

conventional method. This also means that the Story Mapping strategy is not effective.

CHAPTER IV FINDINGS AND DISCUSSION

This chapter presents the result of the research and the achievement of the second grade students' reading comprehension on narrative text in SMP Tunas Baru Ciparay. This chapter is divided into findings of the data and discussion. It includes the findings computation, which consist of the analysis of pretest and posttest scores, and its discussion.

4.1 The Research Findings

In this research, the alternative hypothesis is that there is significant difference in the result between using Story Mapping and conventional method in teaching reading comprehension on narrative text. The researcher used pre-test and post-test to prove the hypothesis and find the answer to this research.

4.1.1 The Pre-Test

The pre-test was given to the control group and experimental group on May 5th, 2018. The test is in the form of reading test that consist of 20 multiple choice and open-ended questions. Students are assigned to take the test to know the students' current reading comprehension on narrative text. The table below is the result of the pre-test scores:

Table 4.1
The Result of Pre-Test Score

The Result of Tre-Test Score					
Subject	Experime	Experimental Group		Control Group	
	x_1	x_1^2	x_2	x_2^2	
1	53	2809	60	3600	
2	67	4489	60	3600	
3	47	2209	27	729	
4	60	3600	40	1600	
5	60	3600	73	5329	
6	47	2209	53	2809	
7	47	2209	53	2809	
8	73	5329	60	3600	
9	47	2209	60	3600	
10	73	5329	53	2809	
11	47	2209	53	2809	
12	47	2209	53	2809	
13	60	3600	47	2209	
14	47	2209	40	1600	
15	53	2809	67	4489	
16	47	2209	67	4489	

17	47	2209	60	3600
18	40	1600	27	729
19	53	2809	53	2809
20	27	729	73	5329
21	33	1089	67	4489
22	33	1089	53	2809
23	47	2209	80	6400
24	47	2209	53	2809
Σ	1202	63180	1332	77864

The total sample of the experimental group is 40 students, but only 24 students were adequate to take the pre-test. Meanwhile, the total sample of the control group is 40, but only 28 students were adequate to take the pre-test. In order to balance the sample, 24 out of 28 students of the control group were taken randomly by the researcher.

Table 4.1 above shows the result of the students' pre-test score. The highest pre-test score of the experimental group is 73 that was obtained by 2 students, and the lowest pre-test score of experimental group is 27 that was obtained by 1 student. The mean of pre-test scores of the experimental group is 50.05. Meanwhile, in the control group, the highest pre-test score is 80 that was obtained by 1 student, and the lowest pre-test score is 27 that was obtained by 2 students. The mean of pre-test scores of the control group is 55.5.

The pre-test score result of control group and experimental group is computated to know the similar ability of both of sample groups by using *t*-test for independent group:

4.1.2 The Treatment

After giving pre-test to both of the sample groups, the researcher gave the treatment to the experimental group from April 30th, 2018 to May 5th, 2018. Meanwhile, the control group were taught by using conventional method.

First Treatment

The first treatment was held on Monday, April 30th, 2018. The researcher had arranged the treatment to be started at 8:20 – 9:40 AM, right after the pre-test was conducted. The first activity in the experimental class was introducing narrative text to the students. The class discussed narrative text's general understanding and its features briefly. The class also discussed the text "*Pinnochio*" and the questions from the pre-test. The control class was also having the introuction session of narrative text, including the generic structure of the text, and the disscusion of pre-test.

Second Treatment

The second treatment was held on Wednesday, May 2^{nd} , 2018, which began at 10:00 - 11:20 AM. The experimental class continued discussing narrative text, specifically on its generic structure. The researcher explained to the students the scheme of Story Mapping. The researcher used "Jack and the Beanstalk" text to be extracted by the class in the Story Mapping activity. The

activity was guided by the researcher and done in the board, though some students draw down the work in their notes. The control class explored narrative text by reading aloud and having simple quiz of their understanding of the text.

Third Treatment

The third treatment was held on Thursday, May 3rd, 2018, from 07:00 to 8:20 AM. The experimental class was instructed to sit in groups of four. They were going to have a Story Mapping groupwork activity. The researcher gave the "*Timun Mas*" text, along with the blank scheme of Story Mapping, for every group to be read and done in the Story Mapping scheme. The control group was given another project from the school's textbook, completing the practices on it.

Fourth Treatment

The last treatment was held on Friday, May 4^{th} , 2018. It was started on 07:00-08:20 AM. Students in the experimental class did their next Story Mapping activity. This time they did it by theirselves. Meanwhile, the control class was having individual text reading and then answering the questions from the textbook.

After giving the treatment, both of the sample groups were expected to have improvement in comprehending narrative text. The researcher conducted post-test later to measure their improvement.

4.1.3 The Post-Test

After the researcher had done giving the treatment, both of the sample groups were scheduled to take the post-test on May 5th, 2018. The post-test consists of different set of questions, yet the same form of questions than the pretest. The table below is the result of the post-test:

Table 4.2
The Result of the Post-Test

Subject	Experimental Group		Control Group	
	x_1	x_1^2	x_2	x_2^2
1	47	2209	60	3600
2	80	6400	60	3600
3	67	4489	47	2209
4	67	4489	60	3600
5	60	3600	67	4489
6	73	5329	53	2809
7	67	4489	47	2209
8	80	6400	47	2209
9	80	6400	47	2209
10	80	6400	60	3600
11	67	4489	60	3600
12	53	2809	60	3600
13	47	2209	40	1600
14	67	4489	60	3600
15	67	4489	80	6400

16	87	7569	73	5329
17	73	5329	67	4489
18	73	5329	33	1089
19	67	4489	27	729
20	67	4489	27	729
21	47	2209	40	1600
22	60	3600	27	729
23	60	3600	73	5329
24	73	5329	27	729
\sum	1609	110633	1242	70086

The total sample of the experimental group is 40 students, but only 24 students were adequate to take the post-test. Meanwhile, the total sample of the control group is 40, but only 28 students were adequate to take the post-test. In order to balance the sample, 24 out of 28 students of the control group were taken randomly by the researcher.

Table 4.2 above shows the result of the students' post-test scores. The highest post-test score of the experimental group is 87 that was obtained by 1 student, and the lowest post-test score of experimental group is 47 that was obtained by 3 students. The mean of post-test scores of the experimental group is 67.04. Meanwhile, in the control group, the highest post-test score is 80 that was obtained by 1 student, and the lowest post-test score is 27 that was obtained by 4 students. The mean of post-test scores of the control group is 51.75.

The post-test score result of the control group and the experimental group is computated to know the effectiveness of the treatment by using t-test for independent group.

4.2 The Data Analysis

- 4.2.1 The Computation of Pre-test
 - 1. Calculate $\overline{x_1}$ (The Mean of the Experimental Group's Scores) $\overline{x_1} = \frac{1202}{24} = 50.08$
 - 2. Calculate $\overline{x_2}$ (The Mean of the Control Group's Scores) $\overline{x_2} = \frac{1332}{24} = 555.5$
 - 3. Calculate $\sum x_1^2$ (The Sum of the Squares of the Experimental Group's Scores)

$$\sum x_1^2 = 63180$$

 $\sum x_1^2 = 63180$ 4. Calculate $\sum x_2^2$ (The Sum of the Squares of the Control Group's Scores)

$$\sum x_2^2 = 77864$$

5. Calculate $(\sum x_1)^2$ (The Square of the Sum of the Experimental Group's Scores)

$$(\sum x_1)^2 = (1202)^2 = 1444804$$

6. Calculate $(\sum x_1)^2$ (The Square of the Sum of the Control Group's Scores)

$$(\sum x_2)^2 = (1332)^2 = 1774224$$

- 7. Obtain the number of scores in each group
 - $N_1 = 24$ (Experimental Group)

 $N_2 = 24$ (Control Group)

8. Enter the values obtained in the steps above into the t-test formula

$$t = \frac{X_1 - X_2}{\sqrt{\frac{\left(\sum X_1^2 - \frac{(\sum X_1)^2}{N_1} + \sum X_2^2 - \frac{(\sum X_2)^2}{N_2}}{N_2}\right) \cdot \left(\frac{1}{N_1} + \frac{1}{N_2}\right)}}$$

$$t = \frac{50.08 - 55.5}{\sqrt{\frac{\left(63180 - \frac{1444804}{24} + 77864 - \frac{1774224}{24}}{24 + 24 - 2}\right) \cdot \left(\frac{1}{24} + \frac{1}{24}\right)}} \cdot \left(\frac{1}{24} + \frac{1}{24}\right)}$$

$$t = \frac{-5.42}{\sqrt{\frac{\left(63180 - 60200.16 + 77864 - 73926\right)}{46}\right) \cdot \left(\frac{2}{24}\right)}}}$$

$$t = \frac{-5.42}{\sqrt{\frac{\left(6917.84\right)}{46}\right) \cdot \left(\frac{1}{12}\right)}}}$$

$$t = \frac{-5.42}{\sqrt{\frac{\left(150387826\right) \cdot \left(\frac{1}{12}\right)}{46}}}$$

$$t = \frac{-5.42}{\sqrt{12532318.8}}$$

$$t = \frac{-5.42}{3540.10} = -0.001$$

With the $df = N_1 + N_2 - 2 = 24 + 24 - 2 = 46$, at the level of significance (p) = .05 of two tailed, the critical value of it is 2.021. As the value of the derived t (t_0) was lower than that of the critical t (t-table) $\rightarrow 0.001 < 2.021$, the Null Hypothesis (H_0) was retained. It means that there was no significant difference in the result of the students' reading comprehension on narrative text between the control group and the experimental group at the beginning of the research. In other words, the control group and the experimental group had similar ability of reading comprehension on narrative text. Therefore, they were qualified to be the sample group of this research, thus treatments were given to the experimental group.

- 4.2.2 The Computation of Post-test
 - 1. Calculate $\overline{x_1}$ (The Mean of the Experimental Group's Scores) $\overline{x_1} = \frac{1609}{24} = 67.04$
 - 2. Calculate $\overline{x_2}$ (The Mean of the Control Group's Scores)

$$\overline{x_2} = \frac{1242}{24} = 51.75$$

3. Calculate $\sum x_1^2$ (The Sum of the Squares of the Experimental Group's Scores)

$$\sum x_1^2 = 110633$$

4. Calculate $\sum x_2^2$ (The Sum of the Squares of the Control Group's Scores)

$$\sum x_2^2 = 70086$$

5. Calculate $(\sum x_1)^2$ (The Square of the Sum of the Experimental Group's Scores)

$$(\sum x_1)^2 = (1609)^2 = 2588881$$

6. Calculate $(\sum x_1)^2$ (The Square of the Sum of the Control Group's Scores)

$$(\sum x_2)^2 = (1242)^2 = 1542564$$

7. Obtain the number of scores in each group

$$N_1 = 24$$
 (Experimental Group)

$$N_2 = 24$$
 (Control Group)

8. Enter the values obtained in the steps above into the *t*-test formula

$$t = \frac{\overline{X_1 - X_2}}{\sqrt{\frac{\sum X_1^2 - \frac{(\sum X_1)^2}{N_1} + \sum X_2^2 - \frac{(\sum X_2)^2}{N_2}}{N_1 + N_2 - 2}} \cdot \frac{1}{\sqrt{\frac{1}{N_1} + \frac{1}{N_2}}}$$

$$t = \frac{67.04 - 51.75}{\sqrt{\frac{110633 - \frac{2588881}{24} + 70086 - \frac{1542564}{24}}{24 + 24 - 2}} \cdot \frac{1}{\sqrt{\frac{1}{24} + \frac{1}{24}}}$$

$$t = \frac{15.29}{\sqrt{\frac{(\frac{110633 - 107870.04 + 70086 - 64273.5}{46}) \cdot (\frac{2}{24})}}}$$

$$t = \frac{15.29}{\sqrt{\frac{(\frac{3362.96 + 5812.5}{46}) \cdot (\frac{1}{12})}{46}}}$$

$$t = \frac{15.29}{\sqrt{(199.466) \cdot (\frac{1}{12})}}$$

$$t = \frac{15.29}{\sqrt{16.62}}$$

$$t = \frac{15.29}{\sqrt{4.07}} = 3.756$$

With the $df = N_1 + N_2 - 2 = 24 + 24 - 2 = 46$, at the level of significance (p) = .05 of two tailed, the critical value of it is 2.021. As the value of the derived $t(t_0)$ was higher than that of the critical $t(t_0) \rightarrow 3.756 > 2.021$, the Null

Hypothesis (H_0) was rejected, and the Alternative Hypothesis (H_a) was accepted, stating that there was significant difference in the result between Story Mapping and the conventional method in improving students' reading comprehension on narrative text. It means that there was significant difference in the result between the post-test of the experimental group and the control group. The experimental group has significantly higher post-test result than the control group. It also means that improving students' reading comprehension on narrative text by using Story Mapping is effective.

4.3 The Discussion

The research result showed that the t_0 which was obtained from the pretest scores is lower than t-table (0.001 < 2.021). Thus, the Null Hypothesis was retained (H₀). This means that there is no significant difference between the experimental group and control group at the beginning of the research. After the treatment was given to the experimental group, the t_0 (t observed) which was obtained from the post-test scores is higher than t-table (3.756 > 2.021). This means that there is significant difference in the result between using Story Mapping as a means to improve students' reading comprehension on narrative text and the conventional method to the second grade of SMP Tunas Baru Ciparay. The post-test result of the experimental group is significantly higher than the post-test result of the control group. It also means that Story Mapping is effective to be implemented in teaching reading narrative text to the second grade students of SMP Tunas Baru Ciparay.

CHAPTER V CONCLUSION AND SUGGESTION

This chapter presents conclusion and suggestion of the research. The conclusion is the interpretation of the findings and the process of the research. The suggestion represents advise and recommendation for further researcher and related parties.

4.1 Conclusion

This research is concerned with the students' improvement on reading narrative text by using Story Mapping. As stated in the first chapter, the aims of the research are to know whether or not Story Mapping is significantly more effective to improve the students' reading comprehension on narrative text than the conventional method. Thus, the researcher uses quasi-experimental design.

The researcher conducted the research to the second grade of SMP Tunas Baru Ciparay, and took two classes as the sample of the research which each class consists of 24 adequate sample. To obtain the data of the research, the researcher conduct reading tests; pre-test and post-test. Pre-test is conducted to measure the students' prior knowlede towards the subject matter, while post-test is conducted to measure the students' achievment after the treatment and to measure the difference between Story Mapping treatment and the conventional method.

The findings of the research showed that the improvement of students' reading comprehension on narrative text that used Story Mapping is significantly higher than used the conventional method. It can be seen from the result of the computation that the value of to is significantly higher than the value of t-table. That means Story Mapping is effective as a means of teaching narrative text reading.

5.2 Suggestions

Based on this research, there are some suggestions proposed either for future English teacher or non future English teacher. The suggestions are as follow:

- 1. In teaching and learning process, it is important to choose the most suitable techniques or media for the students' need in the subject matter.
- 2. Story Mapping is recommended for teaching reading because it can help students' to explore the structure of the text in order to understand the text better. Also, it is a visual media which will increase students' interest in learning reading.
- 3. To make the Story Mapping for learning reading more successful, the researcher suggests that the teacher should prepare the simpler text first, and followed by some more difficult text as the learning goes on. Thus, the students will adapt to the learning situation better.

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