Upgrading Speaking Ability through Peer Teaching Technique

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Abstract

This research focus in eighth grade is VIII A and VIII B. the researcher used Peer teaching technique to prove that students taught to use Peer teaching technique better and positively affect students' speaking ability than students taught by using Ordinary way in the eighth grade at SMP 1 Teluk Bayur, the specifics problems discussed in the following formulated questions; (1) What is the students' performance of pretest and posttest between control and experimental groups?, (2) Is there any significant difference between pretest and posttest performance of the control and experimental groups? This research used Experimental method. This research was conducted from February 22th 2019 to 25th March 2019 in second grade at SMPN 1 Teluk Bayur. The research using Peer teaching technique to improve students' speaking ability. The Instrument's research is test, in the test there are Pre-test, treatment and Post-test. Data analysis was scoring, normality, homogeneity, finding mean, and demonstrated T-Test.and the finding shown that significance result in applying peer teaching technique for teaching speaking of second grade students at SMPN 1 Teluk Bayur.

Keyword : Peer teaching technique, Speaking ability

INTRODUCTION

Teaching learning process involves some components; learners, teachers, aim of learning, material, teaching methods, median (teaching aids) and evaluation. In curriculum of junior high school, the graduated is targeted to gain functional level for communicative target (survival). Larsen (1986 : 02) learners are able to use English for survival purpose, to communicate for daily needs such as to read newspapers and manuals. English is functioned as communication tool in accessing information in interpersonal.

And the other hands, a teacher is offered to be able to manage his/her class learning process. One of them is method of teaching. Teaching method is a way of a teacher to convey a material of lesson. Wright, (1976: 228); in his work, human finds as efficiency as possible action by stating a best method for obtaining his aim. By using appropriate method, it can help the students in improving their abilities in mastery the skills. Curriculum of Junior high school is adjusted to the abilities, whether in cognitive, psychomotor, affective as application of the learning result. Commonly, in Junior High School, English subject is applied in 2 or 3 times a week, a class meeting need around 40-60 minutes, unfortunately, in learning process some of students are still not successful, because the competence of speaking have not been mastered by them satisfied yet, they do not reach the Minimized Completeness Criterion (KKM); 75 It was proved by their obtaining in producing the language; speaking ability, like answering the teacher's questions. The writer found that; 1) The students kept silent for a moment when the teacher asked them questions or offered them to give comments or opinions. They looked confused to response; 2) They did not have sense of confidence to begin speaking; 3) They did speaking, but they were not sure about their vocabulary and grammar produced.

In increasing of teaching methodology, researcher applied Peer Teaching Technique, it is a technique which allows the learners to create, motivate and regulate them selves. Peer teaching is a technique of self regulated learning which allows the learners to exercise control over the acquisition of skills and knowledge (Richey, 1912) this is an important way in developing of life-long learning skills. It also created an in environment where the learners take more responsibilities in their own learning and become self regulated learners. Based on the explanation above the writer wants to conduct a research about Peer Teaching Technique to Improve Students' Speaking Ability.

Related Literatures

1. Peer Teaching

Then peer popularized by Harvard Professor Eric Mazur in the early 1990s.[1] Originally used in many schools, including introductory undergraduate physics classes at Harvard University, peer instruction is used in various disciplines and institutions around the globe. It is a student-centered approach that involves flipping the traditional classroom by moving information transfer out and moving information assimilation, or application of learning, into the classroom. There is some research that supports the effectiveness of peer instruction over more traditional teaching methods, such as pure lecture

Peer teaching is one of ranges of learning strategies. It can be an informal activity which could be formalized. It has been recognized as one of the most effective teaching technique to develop the learner's capability in speaking in class. Furthermore, peer teaching is considered as a strategy to remedy specific problems. Even it may become the central organizing feature of learn, it can be thought to be part of a holistic conception of teaching and learning.

Aspects of speaking should be controlled by the teacher in teaching and learning process. In other hands, the learners have to be care and able to hold them in appearing speaking ability as one of skills in English. On this case, the teacher is offered to be creative in encouraging the learners learning skill. According to Brown (2000) "self-motivation can also be increased by giving a students self-confidence which leads to situation specific efficacy.

In using the peer teaching technique, the learners believe that they are capable of monitoring their own learning, being independent from the teacher, and self-evaluating their own work. In learning process, the learners are modified in groups, pair work; peer work, the learners were interactive and exhibited greater variety in their large use in peer group setting, because they have great opportunities to increase their abilities in learning and confidence independently.

2. Peer-Teaching in Teaching speaking ability

Learning to speak, a foreign language will be facilitated when learners are active to communicate. Pinker (1994: 7) states that we learn to reading, and also speak by speaking. It means that speaking ability needs a direct interaction, in which someone speaks to someone else in direct situation. To develop the student's speaking skill, a teacher of a language has to be able to motivate his students to practice their ability and he needs to train the students to increase their ability and confident. Teachers have many responsibilities to develop the students speaking skills. Wright (1976: 5) states if the students are learning in to speak, they must have maximum opportunities to speak. Having a lot of chances to speak will improve the student's ability in speaking because language is speaking. The students should be ready to speak when they come to their speaking class. Otherwise, they often feel difficult to speak because they do not have enough ability to do it. Furthermore, the presentation will give greater opportunity for the students to express their ideas to the peers. So, they can speak comfortably, because they feel that they are attended by their classmates.

Teacher should watch and observe the teaching leaning activities to make sure the strategy is running smoothly, (Rubin, 1998) stated that this new way of involving students had increased their motivation, participation, real communication, in-depth understanding, their sense

of responsibility for their own learning, and their commitment to the course, as well as their confidence and respect for each other, the number of language skills and strategies they were able to practice and develop their language accuracy.

From the statement above, the researcher conclude that peer-teaching can increase students" motivation, participation, real communication, understanding, responsibility confidence, and respects for each other and also improve the students speaking ability. To apply peer-teaching in the classroom, the first thing teacher should do is choosing some students" which more experienced and knowledgeable to become the tutors. Then the teacher will supervise the selected tutors about 10 minutes before start learning process. After supervise the tutors, then teacher divide students" (the tutees) into small groups. And last, teacher will spread the tutor in each group, and teaching learning process can be start by the tutors.

Besides that, the procedures of peer teaching is the students assembled in groups of two or more are trained to work together. The students work together to prompt, monitor and evaluate each other, while working toward group goals. The students alternate between the roles of tutor and tutee in group of two. In larger group of the three or four roles of a group monitor and evaluator are added to the procedures. Students work together in their groups to achieve establish goals or rewards that are contingent upon group performance.

Theoretical Framework

There are three general theoretical perspectives that have guided research on peer teaching as one of cooperative learning popularized by Harvard Professor Eric Mazur in the early 1990s; firstly, it is anchored by **Jonh Dewey's theory on constructivism**. He is the early founder of constructivism theory. Dewey had his own beliefs in order to expresses his thoughts about constructivism theory. Additionally, he believed that construct and learns new things will not happen if the learners do not have old related experience in order to complete the learning process. Also, he believed that the learners learn better in groups because human nature is social, so when they working together they build their knowledge. Even more, he called teachers to give the student opportunities to collaborate and work through directed activities to build their learning knowledge.

Dewey would likely agree with Lev Vygotsky on social learning theories. The social learning theory help us to understand how people learn in social contexts (learn from each other) and informs us on how we, as teachers, construct active learning communities. Lev Vygotsky (1962), a Russian teacher and psychologist, first stated that we learn through our interactions and communications with others. Vygotsky (1962) examined how our social environments influence the learning process. He suggested that learning takes place through the interactions students have with their peers, teachers, and other experts. Consequently, teachers can create a learning environment that maximizes the learner's ability to interact with each other through discussion, collaboration, and feedback. Moreover, Vygotsky (1962) argues that culture is the primary determining factor for knowledge construction. We learn through this cultural lens by interacting with others and following the rules, skills, and abilities shaped by our culture. So, the teacher have big role giving stimuli in class activity such as: a) Developing Learning Communities; b) Community of Learners Classroom; c) Collaborative Learning and Group Work; d) Discussion-based Learning (Socratic Questioning Methods)

Lastly, this study is supported by **Social development theory by Vygotsky**. The major theme of social development's theoretical framework is that social interaction plays a fundamental role in the development of cognition. Vygotsky (1978) states: "Every function in the child's cultural development appears twice: first, on the social level, and later, on the individual level; first, between people (inter-psychological) and then inside the child (intra-psychological). This applies equally to voluntary attention, to logical memory, and to the formation of concepts. All the higher functions originate as actual relationships between individuals." (p57).

A second aspect of Vygotsky's theory is the idea that the potential for cognitive development depends upon the "zone of proximal development" (ZPD): a level of development attained when children engage in social behavior. Full development of the ZPD depends upon full social interaction. The range of skill that can be developed with adult guidance or peer collaboration exceeds what can be attained alone.

Vygotsky's theory was an attempt to explain consciousness as the end product of socialization. For example, in the learning of English language specifically to train students' speaking skill, our first utterances with peers or adults are for the purpose of communication. So,

Social Developmental Theory by Vygotsky's can be concluded that knowledge is social, constructed from cooperative efforts to learn, understand, and solve problems. In other word, he strengthen that social interaction with member of group more over a skilful teacher is meaningful way to develop students' competence. So, students who learn speaking ability in a group through peer teaching technique will highly boost their learning motivation because student can share and negotiate to build the way of thinking whit out , by having development competence will effect to students' speaking ability

METHODOLOGY

The research using Peer teaching technique to improve students' speaking ability. The Instrument's research is test, in the test there are Pre-test, treatment and Post-test. Data analysis was started to give scoring, normality, homogeneity, finding mean, and demonstrated T-Test and the data gathered would be process by using SPSS 16 software.

Findings

The study investigated The Effectiveness of Peer This condition is justified by Vygotsky's theory as ground of this research theory is the idea that the potential for cognitive development depends upon the Technique to Improve Students Speaking Ability at Eighth Grade Student on SMPN 1 Teluk Bayur In order to identify the field of problems, the researcher conducted interview. The class Interview was done on 23 February 2019

1. Result of Interview

The interview was conducted with the English teacher of eighth grade students on 23 February 2019. The teacher has known about Peer teaching technique, but rarely use it in the class. And the teacher explained that all students in eighth grade had the same ability in the class especially in VIIIA.

The researcher also conducted some interviews to some students to know their attitude toward English. From the interviews, it can be concluded that they had difficulties in English, especially in learning speaking. They had difficulties expressing the meaning in English so they were silent during the class. They also said that they had some difficulties in pronouncing the words since the words and their pronunciation are different.

2. Normality Distribution

The normal distribution test was used to check whether the tests were normally distributed. The analysis used Kolmogorov-Smirnov formula through SPSS 22.0 for windows. It used significant criteria

0.05. The data was stated in normal distribution if significant point bigger than 5% or 0.05 (i.e. $\alpha > 0.05$). The table 1 was the result of normally distribution on pretest.

The output in the table shows the Asymp. Sig. (2-tailed) pretest of data is 0.082. Because significance 0.082>0.05, so it can be concluded that the test has normal distribution. The succeeding on the output, the computation result shown as the data was distribute normally.

		TEST
		32
Normal Parameters ^{a,b}	Mean	.0000000
	Std. Deviation	5.54476951
Most Extreme Differences	Absolute	.146
	Positive	.118
	Negative	146
Test Statistic	C	.146
Asymp. Sig. (2-tailed)		.082

a. Test distribution is Normal.

b. Calculated from data.

In the other class, the result of normality test can be seen in table 2 the value shows the Asymp. Sig. (2-tailed) pretest of data is 0.001 while the statistic value is 0.224, so it can be concluded that the test has normal distribution. The succeeding on the output, the computation result shown as the data was distribute normally.

		TEST
Ν		29
Normal Parameters ^{a,b}	Mean	.0000000
	Std. Deviation	1.68915677
Most Extreme Differences	Absolute	.224
	Positive	.195
	Negative	224
Test Statistic	-	.224
Asymp. Sig. (2-tailed)		.001

Table 2. Test of Normality Distribution on Control Group

a. Test distribution is Normal.

b. Calculated from data.

3. Homogeneity of Variance

The homogeneity of variance test was accomplished after conducted normal distribution test. LeveneStatistic test on SPSS 22.0 for windows was employed to analyse the data and to find out the homogeneity of variance. To find samples variant were homogenous, the significant of the data must be higher than 0.005, and the output as shown the table 3.

	0.		•	
LeveneStatistic	df1	df2	Sig.	
4.822	7	16	.004	

Table 3. The Result of Homogeneity Variances in Experimental Group

The level of significance in the test was established at 0.005. Moreover in the table 4 the significant value was 0.004 in VIII A, it is lower than the level of determined significance. 0.004<0.005. The point in LeveneStatistic show the smaller point is, the bigger homogeneity is. It draws a conclusion that the variances data is homogenous.

Table 4.The Result of Homogeneity Variances in Control Group

LeveneStatistic	df1	df2	Sig.
13.204	3	20	.000

The level of significance in the test was established at 0.005. Moreover in the table 4.4 the significant value was 0.000 in VIII A, it is lower than the level of determined significance. 0.000<0.005. The point in LeveneStatistic shows 13.204, the value is bigger than Levenestatistic in table 4.3. so, the succeeding data can be conclude that students in class VIII B is more heterogeneous, or in the other word the member is not too homogenous.

Refer to the current finding, it can be concluded that the students were varies in both class, they almost have the same variant. The existing this condition because the researcher gave treatment spread to the sample. During the research, all sample got the same proportion in speaking instruction. Student who has difficulties in learning got emphasized treatment such as give intention guide and motivation, so, they were easier in learning. Whereas student who was smarter also got appreciation in their collaboration and participation.

4. Finding of significant difference between pretest and posttest performance of the control and experimental groups

This part explain answer posit second question in chapter one. Here is the report of concerning the data description. The researcher used T-test as statistical tool and computed the data by SPSS program

to find the significance difference between pretest and posttest performance of the control and experimental groups. The following analysis step will answer question and also it can proof the correctness of theories used in this research.

a. The result of paired sample correlations

After getting the scores of the student on pre-test and post-test, the data were statistically computed to find the correlation between the pre-test and post-test. The following table presents the result of the computation of correlation coefficient. To determine level of the correlation the researcher used legend in table 5 from Arikunto.

No	Descriptions	Qualification
1	Excellent	0.800-1.00
2	Very good	0.600-0.800
3	Good	0.400-0.600
4	Fair	0.200-0.400
5	Poor	0.00-0.200

Table 5 Table interpretation

The statistical analysis finding on paired samples correlations as in table 6 shown that the pretest and post-test, in VIII A is 0,675 verbal interpretation is Very Good and Sig. or probability was 0,000.

			l oup
Test	Ν	Correlation	sig.
Pre Test & Post Test	32	.675	.000

Table 6 Paired Samples Correlations of Experimental Group

While the table 7 (paired sample correlations) above shows the result of correlations the Sig. or probability was 0,000. Then pretest and posttest correlation is 0.876 verbal interpretation is Excellent. Based on the correlation performances show positive correlations between pre-test and post-test on sample of group in both experimental and control class.

Table 7 Paired Samples	Correlations of	Control Group
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Test	Ν	Correlation	sig.
Pre Test & Post Test	29	.879	.000

b. The mean of pre-test and post-test

Based on computing SPSS program, it found that in VIII A or experimental class which the number of group member was 32 students got mean in pre-test is 39.31, standard deviation is 6.606, verbal interpretation is fair. Then mean performance in post-test is 42.47, standard deviation is 7.513, verbal interpretation good. The students got improvement after they was treated through peer teaching technique

		Ν	Mean	Std. Deviation	Verbal	Interpretation
	Pre-test	32	39.31	6.606		Fair
VIII A	Post Test	32	42.47	7.513		Good
	Pre-test	29	26.55	3.449		Fair
VIII B	Post Test	29	27.55	3.501		Fair

Table 8 Mean performance Pretest and Posttest Between Control and Experimental Group

Legend : 0-19 Poor, 20-39 Fair, 40-59 Good, 60-79 Very good, 80-100 Excellent

While in VIII B or control class which the number of group member are 29 students got mean in pretest was 26.55, standard deviation is 3.449, verbal interpretation is fair. Then mean performance in posttest is 27.55 3.501, verbal interpretation is fain. Finding mean in control class show the point have no significance gain, or the other word the conventional technique used in control class was able to improve the students speaking skill effectively.

c. The result of paired sample test

After getting the scores of the student on pre-test and post-test, the data were statistically computed to find t obtain then it is compared with t table. The following table presents the result on computation of paired sample test.

Table 9. Paired Samples Test					
Test	Mean	std.deviation	t-obtain	Df	t-table
Pre-test &					
Post-test	3,156	5,754	3.109	31	2.040

From the result above that the t obtained was 3.109 it is slightly higher than t - table 2.040. The succeeding data show as mentioned Rubin that it seemed, was help that was not an extension of but an alternative to traditional classroom teaching (Rubin, 86). The idea of peer tutoring developed because of students' need for aid in schoolwork. It showed that "Peer teaching technique" that was applied by the researcher in the intervention process was effective in teaching speaking ability.

Table 10. Paired Samples Test					
Test	Mean	std.deviation	t-obtain	Df	t-table
Pre-test &					
Post-test	1.000	1.732	3.103	28	2.048

From the result above that the t obtained was 3.103 higher than t - table 2.048. The finding in table 10 show that residual value between mean performance in pretest and posttest is trifle. It proof that the conventional technique is deficiently helpful whereas peer teaching technique is more effective to improve students speaking ability in SMPN 1 Teluk Bayur specifically eight grade students.

This condition is justified by Vygotsky's theory as ground of this research theory that is the idea which the potential for cognitive development depends upon the "zone of proximal development" (ZPD): a level of development attained when children engage in social behaviour. Full development of the ZPD depends upon full social interaction. The range of skill that can be developed with adult guidance or peer collaboration exceeds what can be attained alone.

d. Hypothesis testing

Finally, the calculation of the pre-test and post-test would be compared with the t-table. If the value of the t-test is higher than the t-table, the null hypothesis (H_o) is rejected and the alternative hypothesis (H_a) is accepted. On the other hand, if the value of the t-test is lower than t-table the null hypothesis (H_o) is accepted and the alternative hypothesis (H_a) is rejected.

Table 4.18 shows that by found t statistic value in Experimental Class is higher than control class, the researcher found 3.103 in paired sample. In the other side t table is 2.040.Because of 3.103 > 2.040, it can be said that null hypothesis (H_o) is rejected and alternative hypothesis (Ha) is accepted or prove that: "There is significance effect of Peer teaching technique to improve speaking ability in SMPN 1 Teluk Bayur Than The one that not use this technique

Table 11 Significant difference of pretest and posttest between experimental and control class

Respondent	Computed Value	t _t (0.05)	Decision	interpretation

Experimental	3.109	2.048	Reject Ho	Significant
Control	3.103	2.040	Reject Ho	Significant

Discussion and Interpretation

Teaching speaking skills in English Language Teaching has its own challenges given a distinct impression to the teacher. A teacher is expected to be creative enough to manage the class and control the atmosphere in order to provide meaning and valuable learning experiences for each student. So, the teacher should find the broad way to help the students are able to speak correctly, and accuracy.

It is realized that there were factor which influence the success of the study. The technique of presenting the materials which was used in this study must be varied by means to attract the students' motivation and more active in learning process. Here, the researcher used peer teaching technique in teaching speaking skill in order to stimulate their enthusiasm for learning and improve students' speaking skill. The finding of this research verified that, when the students learn better in groups because human nature is social, so when they working together they build their knowledge. Even more, he called teachers to give the student opportunities to collaborate and work through directed activities to build their learning knowledge. It was as mentioned by John Dewey on Constructivism theory.

When applying peer teaching technique in the class for young age, meaning the teacher construct the comfort environment for the learner, because the member of the class is not always in monotonous learning situation. It was posit Social Learning Theory by Lev Vygotsky. Social learning theory help us to understand how people learn in social contexts (learn from each other) and informs us on how we, as teachers, construct active learning communities. Through peer teaching technique, the both teacher and students learn through this cultural lens by interacting with others and following the rules, skills, and abilities shaped by our culture. So, the teacher have big role giving stimuli in class activity. Vygotsky added in Social development theory that the major theme of social development's theoretical framework is that social interaction plays a fundamental role in the development of cognition.

So, students who learn speaking ability in a group through peer teaching technique will highly boost their learning motivation because student can share and negotiate to build the way of thinking whit out , by having development competence will effect to students' speaking ability. Other than the teacher supported the students to participate actively in class. In addition most of students agreed and enjoy that use of peer teaching technique could motivate them and they realized their ability was improved. Therefore, they all aggreed that peer teaching technique gave highly motivation to them in learning and could encourage the student's interest in English lesson.

CONCLUSIONS

In the light of the finding, the researchers can conclude that the intervention process in teaching speaking by using peer teaching techniques effectively and greatly help improve students' speaking abilities. By applying peer teaching techniques it turns out that it can motivate the students' speaking confidently and they can improve English vocabulary

REFERENCES

- Arikunto, Suharsimi, (2006). Prosedur Penelitian : suatu pendekatan praktek. Jakarta: PT. Rineka Cipta
- Antonio S. Broto. (2001). "Statistic Made Simple", 2nd edition. (National Bookstore).
- Brown, H. Douglas. (2000). *Principles of Language Learning and Teaching*. San Francisco: San Francisco State University.
- Accessed in 26 October 2018 in http://www.researchgate.net/profile/zainab_Jaafar
- Larsen, Diane, Freeman. (1986). *Techniques and Principles in Language Teaching:* Oxford University Press.
- Pinker, S. (1994). *The language instinct : How the Mind Creates Language*. New York: Harper Collins Pub.
- Rubin, L.A.H.C.1998. Model for Active Learning collaborative Peer Teaching.
- Richey, R. W. (1912). *Planning for teaching an introduction to education*. California: department of education Saint Mary's College.
- Rubin, L.A.H.C.1998. Model for Active Learning collaborative Peer Teaching.
- Wright, 1976: 228). said that it "attracts students interest motivation, stimuli to involve in teaching learning process without any doubtless"