

CHAPTER I

INTRODUCTION

1.1 Background

Education is an important factor in growth and development a country . Developed countries in all fields , both in the economic , technology , agriculture or nothing else has can be separated from the role of education .This is because smart people or educated will be able to give positive contribution to the state .But it is important to note that education will be managed to the utmost when each element a good education from the bottom up always oriented to national education goals.

The purpose of national education according to Law No.20 of 2003 states that:

“Tujuan pendidikan nasional adalah untuk berkembangnya potensi peserta didik agar menjadi manusia yang beriman, bertakwa kepada tuhan yang maha Esa, berakhlak mulia, sehat, berilmu, cakap, kreatif, mandiri, dan menjadi warga negara yang demokratis serta bertanggung jawab.”

"The purpose of national education is to the development of students' potentials to become a man of faith, fear of god almighty One, noble, healthy, knowledgeable, capable, creative, independent, and become citizens of a democratic and responsible."

The quality of learning and mathematics achievement in Indonesia is still belom changes are encouraging. Association of District Government of Indonesia (APKASI) highlighted the problem of low quality pendiikan in Indonesia is far behind compared to countries in Asia. General mathematics achievement of high school students in Indonesia is lower than the achievement of learning other subjects disclosed in.

One cause of low learning achievement are generally students still think that mathematics is difficult. Abdurrahman (2003: 252) explains: "From various source studies taught in school, mathematics is a field of study that is considered

the most difficult by the students both learning disabilities and for those who are not learning disabilities" Besides, it has not used the learning varied, interactive , and the fun will trigger the students do not like math and think math as a scary subject. Learning more centered on the teacher rather than the student. Mendominasipembelajaran teachers, while students just being good listeners and note taker. As revealed by Turmudi (2008: 10) explains that:

"Ilmu pengetahuan (matematika) yang selama ini di sampaikan menggunakan system transmission knowledge (bagaikan menuangkan air dari poci ke dalam gelas), siswa disuruh diam dengan "manis", mendengarkan expository (uraian dan penjelasannya) guru, menirukan ucapan guru, mengimitasikan proses menggambaranya guru, mengkopi apa yang di berikan guru di depan kelas. Dengan kata lain semuanya adalah aktivitas pasif"

"The science (mathematics), which is conveyed using a system of transmission of knowledge (like pouring water from a pitcher into a glass), students are told to shut up with the "sweet", listen Expository (description and explanation) teacher, imitating teachers, mengimitasikan process of drawing teacher, copying what is given to the class teacher. In other words, everything is a passive activity "

This has an impact on the attitudes of students who are less independent, armpits penapat dared to express themselves, always ask for the guidance of teachers and less persistent trying to solve a math problem, so that students understand the knowledge that only to the extent that is given teachers. This fact makes the teaching of mathematics as teaching mathematics at finally resulted in student mastery of mathematics to be relatively low.

Based on observations and interviews in the school year 2015/2016 semester at school parties, especially the mathematics teacher who taught in class X ipa 1 that, SMA Sinar Husni in improving the quality of education has made various efforts including a complete library books, discipline in the learning process both students and teachers, and involve teachers in training, each subject teacher shall make learning tools such as the annual program, the semester program, syllabus, the implementation lesson plan . thus mathematics learning

outcomes of students still tend to low with marked number of students who have not reached the minimum completeness criteria (KKM), where KKM mathematics courses is 7.5 as we can see from the table below:

Table 1.1. List of test scores math class X of SMA Sinar Husni

No	Score	Criteria	Sum	Presentation
1	≥ 75	<u>Complete</u>	6	18,75 %
2	≤ 75	<u>Not Complete</u>	26	81,25%
<u>Sum</u>			32	100 %

According to the provisions the Department of Education (in Daryanto, 2011: 191), which is said to be thoroughly studied class when the class there are 85% who have reached the absorption of more than or equal to 65% of learning. In this case, in class X SMA Sinar Husni only 18,75 graduation rates are achieved and it is still far from good.

The generally low level learning outcomes of the student, the school claimed to have made various efforts to improve the quality of education among other complementary library books, disciplined learning process both students and teachers, and involve teachers in training, each teacher shall make devices learning such as the annual program, the semester program, syllabus, lesson plan. However, even so the results of students' mathematics learning still tends to be low. This is the background for the researcher to choose SMA Sinar Husni Medan as a location to conduct research.

Then obtained from observations and interviews related to students who did not complete was found several activities, among others:

1. Students consider math as a difficult subject and moreover complicated delivery with the lecture method in particular the subject of numerous chances abstract concepts.
2. There are many students who do not pay attention to the teacher in explaining the material.

3. Often when given the opportunity to ask students only silence, while the students do not understand the material presented teachers.
4. Sometimes if there are students who asked the teacher, his friends even abusing it.
5. Most of the students can do exercises, while they are not trying to read a book to do the exercises, or ask a friend who can work.

Besides, from the results of interviews with the math teacher, Mr. Retno, said that:

“ Hasil belajar matematika siswa secara umum masih rendah, masih banyak siswa yang memperoleh nilai di bawah rata-rata. Saya melihat, secara umum siswa memang kurang menyukai pembelajaran matematika, siswa sangat pasif, sehingga tidak ada keinginan untuk belajar matematika itu sendiri. Sudah sering dilakukan motivasi namun mereka memang seolah tidak berniat untuk mengikuti pembelajaran.”

“ The results of students' mathematics learning in general is still low, there are still many students who memperoleh score below average. I see, in general, students did not like the study of mathematics, students are very passive, so there is no desire to learn mathematics itself. It has often performed as motivation, but they did not intend to participate in learning. ”

If observed, in general, students do not have the desire to learn mathematics is seen from boredom, saturated paa student learning. There is no interest so that students prefer to passive or inactive. Slavin (in Trianto, 2009: 30) says that "cognitive development largely depends on how far the child actively manipulating, and actively interact with the environment". It can be said that the activity is one of the things that affect the process pembelajaran. However, if the problem still persists student activity will decrease. The longer students will get bored, and considers mathematics as subjects of the curriculum demands it. Students can not accept the meaning of mathematics itself and in ahirnya will berampak on student learning outcomes.

See the magnitude of the impact of student activity on student learning outcomes in the field of study of mathematics, let efforts to increase student

activity. Lack of activity and student learning outcomes is influenced by various factors including the learning model used by the teacher. Results of preliminary observations conducted by researchers at the School Sinar Husni field indicates that the learning of mathematics in the school in general is still very dull and learning much dominated by the teacher while the students sit passively receiving information, this condition indicates that the methods used by teachers still lack less varied.

See above issues, the cooperative learning model TPS accompanied by demonstrations, seen as relevant to the above issues in order to minimize these problems. Excellence cooperative learning model TPS with other cooperative learning model is a form of individual and group responsibility, because in this model there are individual tasks and task groups. Each student will think and have their own opinion independent in completing tasks related to the duties partner. So before students enter kepasangannya already have opinions on the materials studied, so that they will cooperate with each other and help each other in pairs members to understand the material and complete their tasks. Cooperative learning model TPS-type learning accompanied demonstration methods expected to be used to improve learning activities and improve the completeness of student learning, especially math.

With this consideration which may encourage researchers to examine this issue, given the importance of choosing the learning method. In connection with the above, the researchers suggested title 'Improving of Activity and Student Learning Out-Come by Applying Think-Pair-Share (TPS) Type with Demonstration on Topic The Distance in 3D-Space in X Grade SMA Sinar Husni Academic year 2015-2016'.

1.2 Problem Identification

Based on the background above, some problems can be identified as follows:

1. Mathematics is a field of study that is considered difficult by students.
2. Students still dominant passive and tend to only receive information from the teacher.
3. Mathematics students outcome are still low
4. The use of learning model that is chosen by teacher irrelevant

1.3 Problem Limitation

Based on the problem identification, the problem that exist is limited on implementation of TPS to increase of activity and student learning out come by applying think-pair-share (TPS) type with demonstration on topic the distance in 3D-Space in X grade SMA Sinar Husni academic year 2015-2016.

1.4 Problem Formulation

Based on the problem limitation above, then the problem can be formulated as follows.

1. Is the student activity increased by applying think pair-share type with demonstration on topic the distance in 3D-Space in x grade sma sinar husni ?
2. Is the student mathematical learning out come increased by applying think pair-share type with demonstration on topic the distance in 3D-Space in x grade sma sinar husni ?

1.5 Objective of Research

1. To know increasing of student activity on topic on topic the distance in 3D-Space by applying of think pair-share (TPS) type with demonstration in x grade sma sinar husni
2. To know increasing of student mathematical learning out come on topic on topic the distance in 3D-Space by applying of think pair-share (TPS) type with demonstration in x grade sma sinar husni

1.6 Benefits of Research

1. provide opportunities for students to be more active in the learning of mathematics
2. As an alternative for teachers of mathematics courses in an effort to improve student learning outcomes activities
3. As inputs to schools in improving the quality of learning
4. As a comparative study of the same research in the future