## CHAPTER V CONCLUSION AND SUGGESTION

## **5.1.** Conclusion

Based on result of hypothesis test using significant level  $\alpha = 0,05$  above, it can be concluded that :

- There's no significant difference of student's learning achievement of surface area and volume of cylinders between taught by STAD with teaching aids and Direct Instruction. It means that cooperative learning model type STAD using teaching aids doesn't give significant contribution to the student's learning achievement of surface area and volume of cylinders yet.
- 2) There's a significant difference of student's learning achievement of surface area and volume of cylinders between students with high and low abilities. In which student with high ability taught by STAD using teaching aids have learning achievement is higher than taught by Direct Instruction. Meanwhile student with low ability taught by STAD using teaching aids have learning achievement is lower than taught by Direct Instruction. In overall it can be concluded that student's learning achievement with high ability is higher than student with low ability.
- 3) There's a significant interaction between model of teaching and student's abilities to the student's learning achievement. It means that both factors namely, method of teaching and student's ability influence student's learning achievement. Since some student's with low initial ability when given the treatment can achieve the same score with student's with high initial ability and reverse.

Learning with STAD using teaching aids make students are more active in discussion than Direct Instruction. It can be showed by the percentage of student's activity each meeting, in which the percentage of student's activity in class with learning model STAD is higher than in class with learning model Direct Instruction.

Student's response in solving the test show that students taught by STAD with teaching aids is better than taught by Direct Instruction. There are some mistake that found from the analysis result of student's answer sheet. They are :

- 1) Mistake in accepting information.
  - a. Mistake in writing what is known
  - b. Mistake in writing what is asked
- 2) Mistake which referring to the concept of surface area and volume of cylinders namely mistake in using and applying formula.
- 3) Mistake in calculating

## **5.2. Suggestion**

From the research result, discussion and conclusion that have been described above, then given suggestion :

- For the students with low ability, it's better to use Direct Instruction as the method of teaching to deliver the material so that students can enhance their learning achievements.
- 2) For the students with high ability, it's better to use STAD with teaching aids as the method of teaching to deliver the material since they can learn by themselves and teacher just facilitate them.
- 3) For the mathematic teacher suggested if using learning model with teaching aids as one of efforts to improve the student's learning achievement must be supported by increasing the student's understanding about concept of requirement material which related to the concept of cylinders. Beside it, applying it with enough time such that can give the time to review the matter without let students understand the concept by themselves.
- 4) To obtain the research result which more believe, this research is needed to use more bigger samples maybe doing it in other school such that obtained the more valid research result.