Small-sided games in football as a method to improve high school students’ instep passing skills

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Abstract. This study analyzed the influence of small sided games application toward increasing the learning result of instep passing in football. The research used one group pretest-posttest design. The data were obtained once a week for 135 minutes of small sided games and this activity had been held for four weeks with a final test in the final meeting. According to descriptive data result, there were increases of the mean. The data showed the increase of the application of small sided games resulted in not only the mean of the descriptive data but also the result of T-test. The significant of T-test is 0.000. It means less than 0.05 then the hypothesis Ha received and Ho rejected automatically. The presentation showed that 48.15% data is increasing by small-sided games application. The small-sided games were proven to be the right tool to increase instep passing football technique. We suggested to the apply that kind of games of football learning on physical education subject, especially for pre-university students.

1. Introduction
A good education will not only impact on itself but will also impact on the environment directly or indirectly. This shows that education does not only play roles in knowledge, intelligence, and skill but also for people who believe and pious to The Almighty God. To achieve the national education goals in the 2013 curriculum, there are compulsory subjects (group A) and compulsory subjects (group B), one of which includes subjects of Physical Education, Sport, and Health (PJOK). Physical Education, Sports, and Health are an important part of education as a whole, aiming to maintain students’ physical fitness, motion skills, sportive learning, cooperation and many others that are also interconnected with national education goals. By following learning physical education, sports, and health, students are not only able to absorb the values contained in PJOK but also are expected to be fresher in doing activities at school. Students who spend part of their time receiving class lessons are expected to gain new energy and atmosphere when they receive PJOK learning. In the learning of PJOK, there is a variety of sports activities and games that contain lots of values and positive elements and is expected to help to develop not only psychomotor ability but also develop cognitive and affective ability of students. Football is also sport or relatively much-loved by schoolchildren, ranging from elementary to high school level. The students not only play football when classes begin but also in their break time and when there is a race between classes or something sort of this. Small-sided games are games that are played on a smaller field than the big game of 11 against 11. Game 3 versus 3, 4 against 4 is an example of small-sided games.
This review systematizes the SSG use as a training method and highlights the main restrictions of its application in soccer. All factors affecting the SSG are analyzed separately according to studies conducted in order to understand its importance in the response of athletes to training [1]. Even the game can be played even though the number of players is not the same [2]. Small side games have become part of the history of football in the United States. Many of our parents, our grandparents, and our ancestors immigrated to America by playing this beautiful game on the streets of their home country [2]. According to Kamp, small-sided games philosophize on the pleasure and freedom of expression with limited emphasis especially for players at development ages. It was the informality of the game and the various obstacles children had to overcome while playing, such as a number of games being played at once in the playground that bred generations of footballers who really felt the rhythm and heartbeat of the game [3]. Learning model of small-sided games can be done in open areas and, thus, are possible not to use soccer field. In addition to not using soccer field, this model can also be designed with a variety of variations, such as adding or reducing the ball or players in the field. These games are expected to make students react quickly, for example after receiving feedback, students are expected to provide or connect the bait to his team-mates quickly and accurately. In addition, the minimum time is needed to successfully redirect the kick was assessed [4]. Due to the small field and the contact restrictions on the ball, space is narrower. This will make students have to react quickly so that the ball is not taken by opponents and this will be expected to affect the ability of these students.

The advantages of small side models are: a) it's fun, kids practice with the ball better, b) playing soccer to learn soccer, c) learning by trying, d) the most effective technique, insight and communication are developed in situations of the game e) children naturally learn the situation of the game constantly and repetitively and with the frequent contact with the ball; f) small-sided games maximize direct involvement in football situations g) freedom in failure, h) increase creativity and spontaneity [4]. Since the problem occurs at State Senior High School 4 Sidoarjo. It has no field to deliver soccer material, thus, small-sided games model is appropriate to be applied because this model does not need to use field with the size of the soccer field. This research will take football material especially passing with the inner leg because passing with the inner leg is the most commonly used technique in the game.

2. Method
This research uses quasi-experimental research with quantitative approach. Experimental research is a rigorous study to determine the cause-effect relationship among variables [5]. Meanwhile, quasi-experimental research is the closest to the real experiment where it is impossible to control/manipulate all relevant variables. There must be a compromise in determining internal and external validity in accordance with existing constraints [6]. The study design is a design of how a study will be conducted [5]. The research design used in this research is one group pretest-posttest design, which is a research and there is pretest before treatment and posttest after treatment. The time of this research is 4 (four) meetings with duration of 3x45 minutes per meeting. The sample in this research is 37 students of class X in State Senior High School 4 Sidoarjo.

3. Results
After the research data about passing learning results with the foot in soccer is collected, then researchers do a calculation analysis on the results of research data by using the technique of IBM SPSS v20 computer program. There is an increase in pre-test results and post-test passing with a foot inside soccer learning in PJOK in Social class X-2 State Senior High School 4 Sidoarjo in the treatment group. This can be described further in the table 1 and 2:
Table 1. Results of Pre-Test Calculation and Post-Test Passing

|     | N  | Pre-Test | Post-Test |
|-----|----|----------|-----------|
| Mean| 35 | 1.54     | 2.29      |
| Std. Deviasi | 35 | 1.314    | 1.582     |
| Varian | 35 | 1.726    | 2.504     |
| Maks  | 35 | 4        | 5         |
| Min   | 35 | 0        | 0         |

Table 2 Calculation of Normality Test

|     | Pre-Test | Post-Test |
|-----|----------|-----------|
| p value | 0.143    | 0.152     |
| Significant | 0.05   | 0.05      |
| Category   | Normal  | Normal    |

The influence of this model of the small-sided game is the result of passing learning with a foot of inner part of a Social student X-2 at State Senior High School 4 Sidoarjo. It is used formula as follows:

\[
\text{Percentage} = \frac{\text{MD}}{\text{Mpre}} \times 100\% \\
\text{Mpre} = 0.743 \times 100\% \\
= 1.543 \\
= 0.4815 \times 100\% \\
= 48.15\%
\]

4. Conclusion

Based on the results, it can be stated as follows: a). There is the influence of the application of small-sided games model to the learning passing results with a foot in soccer. This is proven by the result of t counted of 4.018> t table of 2.042 with a significant level of 0.05. b). The amount of influence of the implementation of small sided games model on the learning passing with a foot in the soccer is proven by the percentage of influence that is equal to 48.15%. As for suggestions that can be presented according to the results of research, discussion and conclusions are a). PJOK teachers are suggested to provide the right material and lesson plan especially for large soccer ball game material supported by other materials in order to improve the basic soccer techniques. B). Students are expected to develop the ability to play soccer in performing skill passing with a foot inside based on the analysis in this research.

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