

## DEVELOPING STUDENT'S DISCIPLINE IN PHYSICAL EDUCATION THROUGH PEER TEACHING MODEL

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### Abstract

**Purpose.** There is a lot of research on student character development through learning in schools, but research on specific student character development through peer teaching learning methods in physical education is still limited. Although there is some research on the development of student character in physical education learning, but it is still within its general scope. The purpose of this study is to see the development of student character, especially discipline through peer teaching learning in physical education. **Material and methods.** The research method used was an experiment using the Posstest-Only Control Design. The population is students of elementary school Tenjolaya 3. The sampling technique used in this study is the total sampling technique, so the number of samples in this study is grade 5 students of elementary school Tenjolaya totaling 60 people, where it consists of 2 classes. The instrument uses disciplinary observation techniques that researchers adopted from Umar Wirantasa (2017). Data analysis using quantitative descriptive analysis percentage approach assisted by Microsoft Excel 2019 Software and IBM SPSS version 25. **Results.** Based on these results, it can be concluded that there are differences in student discipline results between the experimental group and the control group, where the experimental group has a better influence. This means that the application of peer teaching learning models in physical education learning can improve the disciplinary character of students. Based on the results of the independent sample t-test analysis shown in table 1, it can be seen that the value of  $F = 0.525$  with a p-value score or  $\text{Sig.} = 0.471 > 0.05$  which means it has the same variance or homogeneous. Therefore, significance testing can be seen in the columns of the section Equal variances assumed and t-test for Equality of Means. Based on the results in the column, it can be known that the calculated t score = 4.454,  $df = 58$  and the p-value or sig score. (2-tailed) = 0.001 < 0.05. This means that there is a difference in student discipline test results between the experimental group and the control group, where the discipline test results in the experimental group are better than the control group with a Mean Difference score of 2.857. Based on these results, it can be concluded that there are differences in student discipline results between the experimental group and the control group, where the experimental group has a better influence. **Conclusions.** The results of research have shown that character development, especially student discipline, can be developed through the application of peer teaching models in physical education, and this indicates that peer teaching learning models can develop student disciplinary characters. It is expected that physical education teachers do not only focus on developing physical aspects alone, but also must focus on all aspects or potentials possessed by students, which include affective, cognitive and psychomotor, which seems to be now thinking in society is still considered a lesson that is only concerned with physical aspects.

**Keywords:** Character, Discipline, Learning Methods, Peer Teaching, Physical Education.

## INTRODUCTIONS

Character is a description of a person's behavior that reflects the habits in his life. Character is a person's personality attitude that is formed from the results of virtues (1), has the aim of determining the way of thinking, behaving and acting (2), therefore character becomes important in order to determine the way people interact and determine their goals (3). Character is the basis for a person to be able to grow and develop in certain situations, and not infrequently character can determine a person's fate in the future (4). Character is a distinguishing characteristic between humans and animals, because humans with character have the ability to control themselves, be knowledgeable and moral (5). Character is the innate nature of each individual which is a trait, personality, character and / or behavior that is manifested into his daily life (6). Character is very important to be developed properly, and can be done through character education at school.

Character education is an educator's effort in applying good moral values to students. Character Education is education to shape a person's personality through ethics education (7), the results of which are seen in a person's actual actions, namely good behavior, honesty, responsibility, respect for the rights of others, hard work, and so on (8,9). The meaning of character education can be explained as activities for guiding and developing the potential of students so that they can be well directed and able to become good personalities (10). Character education serves as a developer of various basic potentials to have a good heart and thinking, as well as good behavior to make the nation competitive in global competition and strengthen and build multicultural national behavior (11). One of the characteristics in a person is discipline (12), discipline is one of the characteristics that can be developed through the educational process (13), discipline will shape students to be more orderly and organized in carrying out their activities (14), and it needs to be owned by learners.

However, nowadays student discipline problems are deteriorating, this has an impact on deviations in student attitudes such as lack of respect for teachers, often late and rarely ignores rules, and if left unchecked it will have a negative impact on learning outcomes (15–17), meaning that the formulated educational goals will not be optimally achieved. This disciplinary problem does disproportionately affect urban schools where most parents of students are low-income and ethnic minorities (18). Many students in public schools exhibit disciplinary problems such as disruptive behavior toward classmates in class, vandalism, bullying, and violence (19), and of course this requires a positive behavioral learning process accompanied by exclusive corrective strategies in order to promote a better classroom environment (20). This phenomenon is certainly clear evidence that indeed this nation is experiencing a decline in character, and these problems can be formed through character education carried out through the learning process instilled in every subject in schools.

Physical education is an integral part of the overall educational process (21), which means that the purpose of the physical education process must be able to cover the purpose of education as a whole. In Indonesia, physical education is a subject given at every level of education, and has the aim that students acquire movement skills, knowledge about physical health and various social attitudes (22). Physical education has complex goals that can make students grow and

develop from all aspects, both physical, mental and social (23). Physical education has a very important role in developing the potential of students to prepare for their survival (24), because through the physical education learning process students will be trained physically, socially, mentally and also their character (25). And there has been a lot of research on physical education related to physical aspects, but on the aspect of character, especially the character of discipline is still rarely done.

In the learning process, there are many models that can be applied as an effort to achieve goals, one of which is the peer teaching model or peer tutor (26). The peer teaching model is an approach to teaching that requires one student who is considered to have more knowledge to explain the material to other friends (27). In this model, students tell each other to their friends or teach their friends (28), It can be said that this model is a learning pattern between students (29), the student gives an explanation of the material to the students in his class and the teacher only controls the situation (30). This will provide new intellectual and social challenges for students, as they will have to assume the role of teacher or tutor by presenting the material fully (31).

Based on several studies of problems regarding discipline, physical education and peer teaching models, the author may be interested in examining more deeply the use of peer teaching learning models in physical education on the development of student discipline. Although some research on peer teaching models has been widely conducted, such as research which concludes that the peer teaching model is a teaching strategy that has good knowledge transfer process capabilities (32), it is further said that this peer teaching model is better at improving bottom passing techniques compared to the discovery learning model (33). Then it was also mentioned that the affective aspects of students after being given the peer teaching model were better than those using conventional models (34), Furthermore, the results of the study showed that with the peer teaching model student learning outcomes were much better than students who were given the lecture model (35).

From some of these studies, it can be seen that there are still very few studies or research on the impact of using peer teaching learning models that directly affect the development of student disciplinary character, more especially in physical education learning. This is where the purpose of this study will be to know directly the impact of the development of student discipline character after being given a peer teaching learning model in physical education lessons.

## **MATERIAL AND METHODS**

### **Participants**

The subjects involved in this study were as many as 60 people who were grade 5 students of SDN Tenjolaya 3 who were still active in school and had an average age of 11 years consisting of 24 male students and 36 female students, where group determination was carried out randomly. The subjects were divided into two groups, namely as many as 30 people entered the experimental group, namely the group that was given learning treatment using the peer

teaching model, while 30 more people entered the control group who were not given peer teaching model treatment.

### Research Design

The research method used in this study is an experimental research method with a quantitative descriptive approach. The selection of this research method aims to identify the presence or absence of character development, especially the discipline of peer teaching methods in physical education learning. The study design used *Randomize Posttest-Only Control Group Design*. This design has two groups, each of which is chosen randomly. The first group was given treatment (X) and the other group was not. The treated group is called the experimental group and the untreated group is called the control group. In this experiment, subjects were presented with several types of treatment and then the results were measured (36), For more details can be seen in the following figure 1:

Treatment group	R	X	O
Control group	R	C	O

Figure 1: *Randomize Posttest-Only Control Group Design*

Information:

R : Random group selection

X : Treatment Group with Peer Teaching Model

C : Untreated Control Group.

### Statistical Analysis

The instrument used in this study was an observation sheet on discipline. This observation sheet aims to collect the data that researchers need. The data is obtained at the end of the experiment as final data. The goal is to be able to find out the development of disciplinary character as a result of treatment which is the ultimate goal of research. The disciplinary observation sheet that the researchers used was adopted from "Student Discipline Observation" from Umar Wirantasa. The form of observation guidelines in this study is a guideline that is structured or uses possible answers and has been determined indicators of each answer as a guide for observers when making observations. There are at least three indicators, namely 1) Students carry out the rules that apply in school well; 2) Obey applicable policies and policies; and 3) Self-mastery and introspection during learning. The observation sheet is filled in by the researcher when observing students while carrying out the learning process in class. Score 1 if students do not appear to do the activity assessed, score 2 if students appear to do enough activities to be assessed, while score 3 if students appear to do the activity assessed (37). Here are observation guidelines to see student discipline:

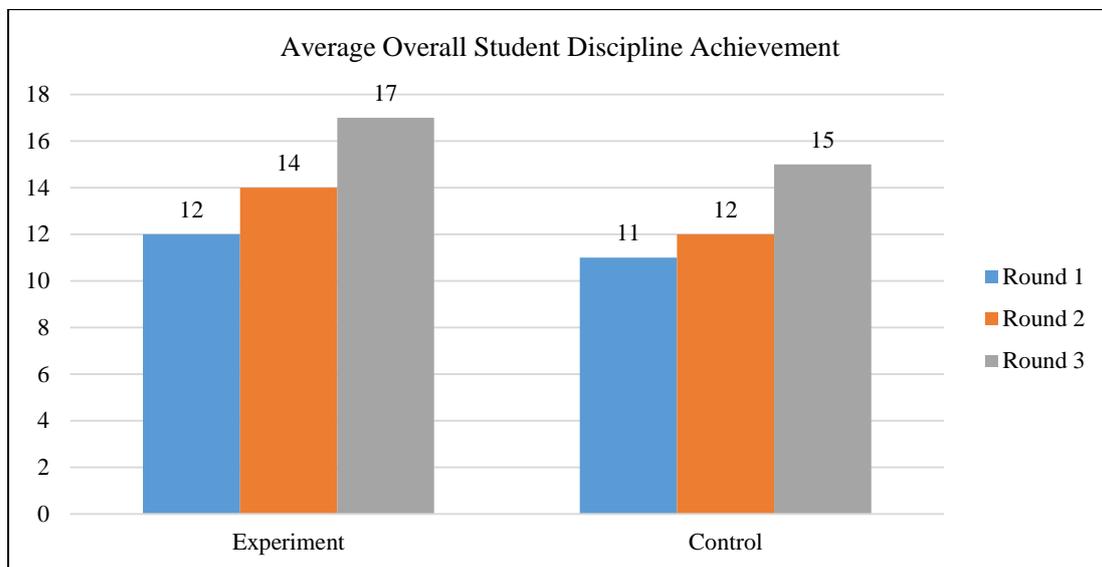
**Table 1: Student Discipline Observation Guidelines**

Indicator	Descriptors	Score		
		3	2	1
Students carry out the rules that apply in school well.	1. Students are already in class when the teacher enters the classroom.	Students are in the classroom before the teacher enters.	Students are in the classroom after the teacher enters but the lesson has not yet taken place	Students are in class after class.
	2. Students in neat uniforms in class.	Students in neat uniforms, clothes inserted, wearing belts.	When 1 or 2 attitudes are achieved	No attitude was achieved.
	3. Students picket in class according to schedule.	Students carry out pickets as scheduled, earnestly.	Students picket in class according to schedule but not really.	Students do not picket.
Obey applicable policies and policies.	4. Students submit work on time.	Students collect assignments on time.	Students are late in submitting assignments from a predetermined time.	Students collect assignments on a predetermined time.
	5. Students don't talk to themselves when the teacher explains.	Students speak for themselves when the teacher explains and cannot be reprimanded.	Students talk to themselves, but when reprimanded can be silent.	Students are silent and pay attention to the teacher's explanation.
Mastering yourself and introspection when.	6. Do not disturb friends while learning takes place.	Students disturb their friends while studying and cannot be reprimanded.	The student disturbed his friend but when reprimanded, he did not disturb his friend again.	Students do not interrupt (talk, play) their friends who are studying.
	7. Students reprimand crowded friends in class.	Students did not reprimand their lively friends, but also joined the crowd.	Students are silent and do not reprimand crowded friends in class.	Students reprimand crowded friends in class.

Data analysis uses quantitative descriptive analysis with a percentage approach where in this study the author uses the help of Microsoft Excel 2019 software and IBM SPSS version 25 in statistical data processing.

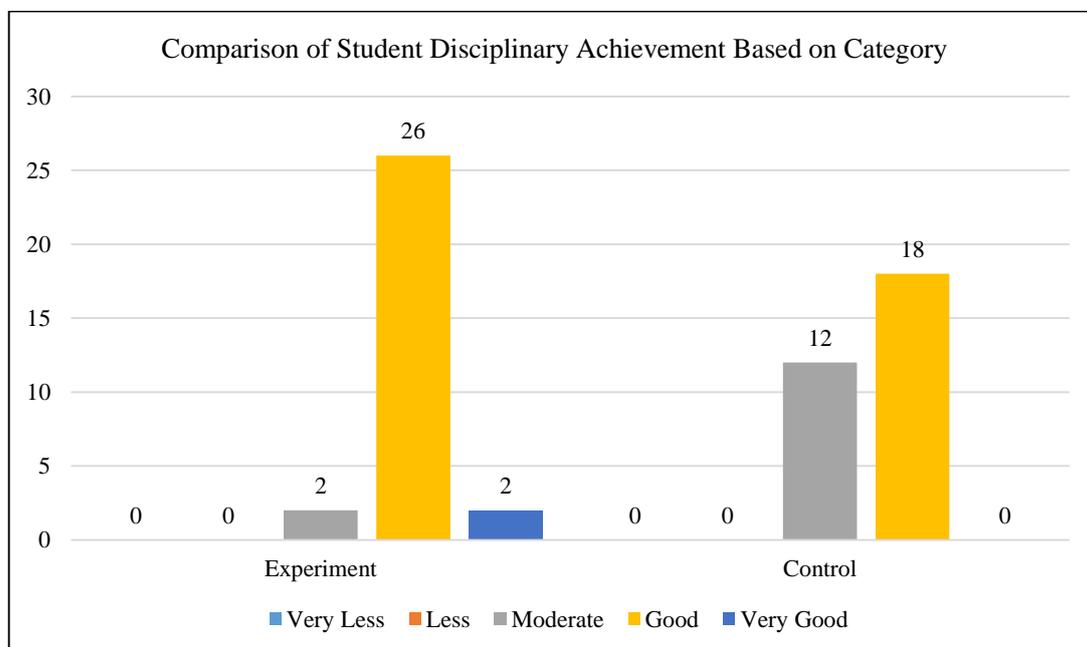
## RESULTS

In this section, the author will describe and display the results of research based on the objectives in this study, which is related to the development of student disciplinary character through the application of peer teaching models in physical education learning. The following are the results of the average achievement of overall student discipline between the experimental group and the control group.



**Figure 2: Average Overall Student Discipline Achievement Results in Experiment Group and Control Group**

From figure 1 it can be seen that there is a development in the scores of meeting 1 to meeting 3 on the overall discipline of students and there is a difference in average scores which shows that the experimental group has a higher score than the control group. While apablia is seen in more detail with each category can be seen in figure 2 below:



**Figure 3: Comparison of Student Discipline Achievement Based on Category Results in Experiment Group and Control Group**

In figure 2 it can be seen that the level of discipline of SDN Tenjolaya 3 students in the experimental group is "good" with details in the category of very good there are 2 students or 7%, the category is good 26 students or 87%, the category is enough 2 students or 7%, the category is less 0 students or 0%, and 0 students or 0% for the category is very less. Likewise, the level of discipline in the control group was "good" with details in the category very good with 0 students or 0%, the category either 18 students or 60%, the category was enough 12 students or 40%, the category was less 0 students or 0%, and 0 students or 0% for the category was very less. Although both groups received a level of discipline in the "good" category, there were differences in each frequency category obtained by the two groups.

Then after that, an independent sample t-test was tested to find out whether each model applied had a significant difference. Here are the results of his testing using the help of the IBM SPSS 26 program.

**Table 1: Independent Sample T-Test**

		Levene's Test for Equality of Variances		t-test for Equality of Means				
		F	Sig.	t	Df	Sig. (2-tailed)	Mean Difference	Std. Error Difference
Discipline	Equal variances assumed	0.525	0.471	4.454	58	0.001	2.857	0.491
	Equal variances not assumed			4.454	57.892	0.001	2.857	0.491

Based on the results of the independent sample t-test analysis shown in table 1, it can be seen that the value of  $F = 0.525$  with a p-value score or  $\text{Sig.} = 0.471 > 0.05$  which means it has the same variance or homogeneous. Therefore, significance testing can be seen in the columns of the section Equal variances assumed and t-test for Equality of Means. Based on the results in the column, it can be known that the calculated t score = 4.454,  $df = 58$  and the p-value or sig score. (2-tailed) =  $0.001 < 0.05$ . This means that there is a difference in student discipline test results between the experimental group and the control group, where the discipline test results in the experimental group are better than the control group with a Mean Difference score of 2.857. Based on these results, it can be concluded that there are differences in student discipline results between the experimental group and the control group, where the experimental group has a better influence. This means that the application of peer teaching learning models in physical education learning can improve the disciplinary character of students.

## DISCUSSION

The results showed that the learning model *Peer Teaching* in Physical education can improve the development of student discipline. This indicates that the educational process carried out can accommodate the goals of student development, because basically education carried out in schools is mandatory for every human being and is strived to be able to bear responsibility and

produce progress in science and life experience for each individual (38). Every learning process carried out using various learning models must indeed be designed to develop all the potential that exists in students (39), And one of them is that with this peer teaching model that has been proven in this study can improve the disciplinary character of students. In the learning process using this peer teaching model, the teacher gives confidence to students who are considered to have more skills than others to become tutors for other students, and this is done starting from warm-up activities, apperception and prayer activities before learning to the coolingdown stage. Of course, this will provide freedom for students to explore their creativity and learn to be responsible for the tasks given (40).

In line with this, it is said that model *Peer Teaching* is one of the learning models that can foster in students an attitude of responsibility for their duties, discipline, playing an active role, interactive and having communication skills (41–43). In addition, it can indirectly foster a positive attitude and can apply disciplinary values to students as well as the learning material delivered can be quickly understood (44–46). The peer tutor method is one of the learning strategies to help meet the needs of learners for self-actualization involved as tutors (47), that way they will feel proud of their role and also learn from their experience (48). When they study with peer tutors, learners also develop a better ability to listen, concentrate and understand what is being learned in a meaningful way (49). Peer tutors make students actively learn, and more opportunities to respond or provide feedback on the information provided as well as reinforcement of the knowledge that has been given. With high learning participation, students get high learning outcomes and can complete the tasks given by the teacher (50).

This peer teaching learning model provides an opportunity for students to be able to think about how to provide information to their friends so that their friends can understand, and this will increase and develop students' creative thinking power (51), This will also encourage other students to interact with each other freely or not awkwardly because they have almost the same background experience (52). The advantage contained in this peer teaching learning method is the existence of social learning which is characterized by interdependence between learners and tutors, and this is not owned by other learning methods (31). In addition, the peer teaching model has also proven to be a learning strategy that is quite effective in developing students' interaction and social skills (53), It is also believed to increase motivation in learning because it tends to show confidence as a tutor and a high sense of curiosity as a learner (54), and the potential to develop yourself, especially in terms of courage (55), Either dare to appear in front of the crowd, or dare to ask something that is not understood. Peer teaching learning models with various types are able to make students more active in learning, and more have the opportunity to respond or provide feedback on the information provided and reinforcement of the knowledge that has been given (56).

The physical education process provided in accordance with the character of students and packaged appropriately will be able to maximize the objectives of the learning process (57). Therefore, the application of the learning process in this model must also be adjusted to the ability of the learners, lest the tutor provide an understanding that cannot be followed by the learner. That in the peer teaching model a tutor must pay attention to the directions given by

the teacher, not only have good knowledge, but be able to communicate verbally well and know his abilities (31). On the other hand, learners must also be able to accept direction from tutors, ask questions if they are not clear and practice diligently, so as to be able to develop reciprocal relationships based on their respective responsibilities. By having and understanding each other's responsibilities, a sense of discipline will be formed in him to always obey and obey the rules applied (58,59). Discipline is an attitude of obeying and following a set rule and it will be formed when someone has responsibilities that must be carried out (60), It is said that if a teacher is able to help students become more responsible people, many disciplinary problems can be solved (61). This indicates that if students are given more responsibility to give direction and material to other students, and other students are also given the responsibility to obey and follow the directions of their tutors, a sense of discipline will be formed in students.

The peer teaching model in physical education learning can indeed develop student attitudes (31), and usually this attitude will have a positive role in determining learning achievement (62). Attitudes are always related to an object, and accompanied by both positive and negative feelings, usually a student will have a positive attitude towards objects that he considers valuable in his view, and he will also have a negative attitude towards objects that he considers worthless. Attitudes will determine how students perceive and choose in their lives (63). The application of this learning model can also increase the confidence of students, students dare to appear in front of their friends (64), in addition, the peer teaching learning model using peer teaching can also improve the socialization process of students in the learning process, because in its implementation they directly interact with different role conditions (65). Peer teaching learning in physical education can be applied starting from before the core material begins (66), So that students learn to not only understand the material but also understand and learn how to seek attention to other students (67). In this case, a teacher must indeed be creative in determining the selection of the right learning model, also must be able to develop a good strategy so that the learning process can run smoothly and in accordance with what is desired. No matter how well the learning model affects learning outcomes, it will not succeed if applied by teachers who are less creative and appropriate in arranging their learning activities. Teachers hold the key to the success of a teaching and learning process, because basically there is no bad learning model, but the application of inappropriate learning activities and management that makes learning objectives not achieved optimally (68).

The application of peer teaching learning models in physical education provides excess experience for students. They interact with each other as fellow students, exchange ideas and play roles, meaning that this peer teaching model requires them to change roles in the interaction process, namely as students who receive material and students who deliver material (69). This process will give more meaning to their socialization process, because at the same time they must be able to change roles. They will easily respect each other, and after that there will be a sense of responsibility which is the basis of a person to be disciplined in dealing with situations (70). where a result will be achieved from a sense of responsibility for his duties and it is influenced by his discipline (71), discipline is closely related to a sense of responsibility (72). This is certainly important for students to develop their social aspects, where the social process for children is important because basically humans are social creatures. The ability to

socialize is needed by humans in living their lives in this world. As mentioned that humans are social creatures who will continue to depend on each other. Skills and abilities in socializing have become a special imperative in living life, because with it makes individuals feel more able to appreciate (73). The application of education at elementary school age also seems to be a must, because at elementary school age social development begins to experience an expansion that was only limited to the family environment increasing to peer (74).

Physical activities carried out by children in their daily lives, especially those related to friends and their environment have become an automatic socialization model (75). By developing aspects of student discipline character through physical education, it provides new findings that indeed learning activities in physical education can not only be carried out to develop physical aspects, but also students' attitudes and characters can be developed optimally, Because by developing character education, students will have the ability to establish social interaction with their environment which will later have a major contribution in achieving happiness and development in the next aspect (76). That way, the results of this study will provide reinforcement of the importance and also the purpose of physical education, where if carried out properly the educational process can have a positive effect on the development of attitudes, knowledge and physical students simultaneously, so that it is hoped that in the future physical education will no longer be underestimated by the general public.

## CONCLUSIONS

The results of research have shown that character development, especially student discipline, can be developed through the application of peer teaching models in physical education, and this indicates that peer teaching learning models can develop student disciplinary characters. It is expected that physical education teachers do not only focus on developing physical aspects alone, but also must focus on all aspects or potentials possessed by students, which include affective, cognitive, and psychomotor, which seems to be now thinking in society is still considered a lesson that is only concerned with physical aspects. Therefore, for other researchers who want to research physical education can focus on affective aspects, so that there will be more research results and information about the development of attitudes or character through physical education learning.

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