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To cite this article:

Ritonga, D. A., Damanik, S., Damanik, S. A., Suprayitno, & Priyambada, G. (2022). Development of learning variations to improve basic jumping skills and play approaches of elementary school students. *International Journal of Education in Mathematics, Science, and Technology (IJEMST)*, 10(2), 360-371. <https://doi.org/10.46328/ijemst.2246>

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Article Info

Article History

Received:

17 February 2021

Accepted:

18 November 2021

Keywords

Learning variations

Basic skills of jumping

Play approach

Abstract

From the class of 2018 to 2020, researchers found several weaknesses faced by physical education (PE) teachers in elementary schools in developing active learning. One of the very basic weaknesses is the low creativity and innovation of teachers in developing basic movement skills and character values with a play approach, and in this case, playing is made in the form of games that suit the needs of students. Teachers tend to use existing forms of play such as baseball, soccer, volleyball, and basketball, even though these games are not compatible with elementary school children's growth and development level. The purpose of research and development of learning variations of PE in sports and health based on a play approach is expected to develop basic movement abilities and character values of elementary school students. The research method used is Borg and Gall's research and development. The subjects of this study were 4th-grade elementary school students and four teachers at UPT Percut Sei Tuan. The research instrument uses a rating scale so that the variation of PE learning based on the play approach is suitable for improving elementary school students' basic techniques and character values .

Introduction

Physical education (PE) taught in schools provides opportunities for students to be directly involved in various learning experiences through selected physical activities, sports, and health that are carried out systematically. Good PE must increase and develop children's basic movement principles and character values. Professional skills may consist of competence areas such as planning education, creating a learning environment, and managing the learning process. In that case, it seems clear that the professional beliefs of teachers or prospective teachers are related to their professional skills concerning studies conducted in schools as stated by Kilicoglu (2019).

The development of science, technology, communication, and the flow of globalization brings changes in various aspects of life, including in education. The home/family environment, an educational institution, does not build children's character. Parents are busy with their own business, so there is no time to interact and

educate their children. As a result, children are educated more by television and internet shows that are not following the nation's cultural values. Studies have been conducted to fill gaps in existing research related to how well the emporium model meets the needs of students based on gender, race/ethnicity, international status, and first-generation versus next-generation (Guerrero et al., 2020).

Based on this explanation, it is necessary to have students' backgrounds in preparing a learning environment at school. This situation occurs under the conditions that school institutions tend to be shackled for the growth and development of children because the teacher only accumulates knowledge in the learning process without allowing students to think critically and build creativity. As a result, children become less intelligent. Teachers also tend not to be good role models for their students because many teachers unconsciously display bad behavior in front of their students, for example, throwing garbage in any place, saying dirty words, smoking, and others even though the teacher is a model. After all, what the teacher indirectly becomes knowledge and lessons that students will imitate, especially in elementary schools.

Research results (Akar, 2020) who will conduct further studies on learning aids can obtain opinions from other educational stakeholders who are experienced in using smart boards and get more complete results. Therefore it is necessary to prepare suitable tools to develop students' learning. This knowledge will teach children how to be good students and have intelligence abilities, basic movement skills, and character values that are learned from the easiest to the more difficult levels, PE subjects.

Understanding learning motion or motor in principle is not much different from learning in general. The motor means "the basic mechanics that causes motion." Movement is an activity based on motor processes. This motor process involves a coordinated system of movement patterns (brain, nerves, muscles, and skeleton) with a very complex mental process called the process of creating motion (Suprayitno, 2020).

The development of the ability of these students will be developed through the learning process. Through various play-based learning approaches in PE subject groups in elementary schools, one of them is to develop basic movements, motor skills, instill character values, sportsmanship, and awareness of healthy living. To achieve the PE learning objectives above, the PE teacher must have the ability to teach and develop innovative learning through a variety of play-based learning approaches.

Applying a learning context based on the play approach will create a vibrant, creative, and fun learning atmosphere so that children do not feel bored and bored in following the learning process (Alharthi & Zhang, 2021; Hsieh, Lin, & Hou, 2015). The development of variations in learning based on a play approach in the form of ball games, jumping games, throwing games combined with several basic techniques of playing sports was chosen as a game activity in a variety of learning through a play approach because "the world of children is the world of play." For this reason, the variation of PE learning based on the play approach is the right variation of learning to develop basic movement skills and character values at an early age in elementary schools through various game activities.

Playing is fun for students. By playing, students do not feel tired or burdened in doing physical activities, but it becomes something fun. Carrying out the process of learning motion in PE, which is a variety of movements and skills, of course, cannot be avoided by using the necessary infrastructure or sports equipment, and the most essential is the form of the game. Through the observations of researchers and preliminary studies as managers and as instructors in the Teacher Professional Education Program at the PE Health and Recreation Study Program at the State University of Medan, from 2018 to the 2020 batch, they found several weak factors faced by PE teachers in Elementary school, the result of feedback from student creativity program and subject teacher deliberations of PE in developing variations of learning that are active, creative and fun.

Method

One of the very basic weaknesses is teachers' low creativity and innovation in developing learning for basic movement skills and inculcating character values with variations in learning through a play approach. Learning through a play approach, in this case, is presented in the forms of games that are per the needs of students. A phenomenon in the field so far, teachers tend to use existing game forms such as baseball, soccer, volleyball, and basketball games, even though these games are technically not by the level of growth and development of elementary school children, and teachers perceive children as miniature adults. As a result, the learning provided is irrelevant to the competencies to be achieved and causes learning to be monotonous and less interesting. Seeing the above problems crucial in learning PE in elementary schools, researchers are interested in developing PE Learning Variations to Develop Basic Movement Skills and Character Values Based on Play Approach in 4th-grade elementary school students.

The method used in this study is the research and development (Research and Development) associated with product development through planning, production, and evaluation of the validity of the product (Sugiyono, 2015) (see Figure 1).

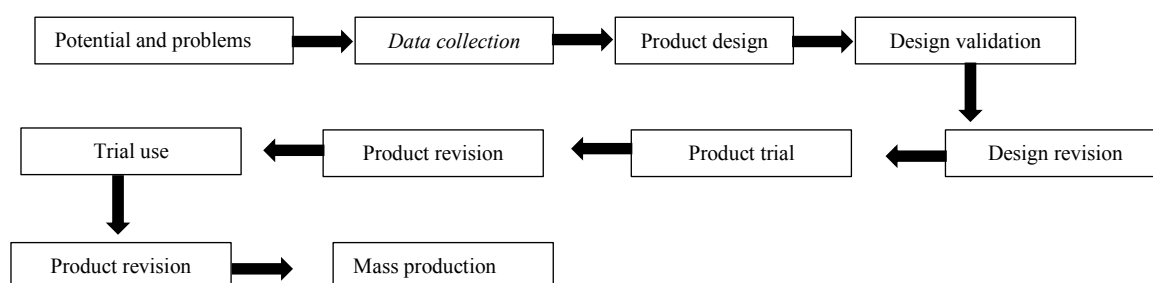


Figure 1. Steps to Use Research and Development (R & D) Methods

Results

Based on the results of the validation of the experts, there were several inputs in the form of suggestions and comments on the products developed (variations of learning PE, sports, and health with a play approach to develop basic movements and character of 4th-grade elementary school students. Suggestions and comments from experts are provided below.

The obstacle jump game moves the ball, namely: (1) the rules in the obstacle jump game to move the ball are simplified so that children in grade 4 elementary school are easy to understand, (2) the obstacle jump game moves the ball adapted to basic competencies in learning material in grade 4 elementary school, (3) the distance between the pedestals should not be too far, adjust to the child's character, and (4) the equipment should be adjusted to the characteristics of children in grade 4 elementary school in the hopping game of moving the ball, and self-made equipment needs to be considered for safety not only considering learning media. However, the equipment used should be cheap and practical.

Arranging triangular blocks, namely: (1) the rules for arranging triangular blocks are simplified so that children in grade 4 elementary school are easy to understand, (2) the game of arranging triangular blocks is adjusted to the basic competencies in learning material in grade 4 elementary school, (3) the distance between the pedestal should not be too far away, adjust to the child's character, (4) the distance between the group of friends and the group of opponents in compiling a triangular block is added by 1 meter, and (5) the equipment is adjusted to the characteristics of children in grade 4 elementary school. In this case, the blocks arranged are reduced again, and the equipment made by the players needs to be considered for safety, not only considering learning media, but the equipment used should be cheap and practical.

Developing Puzzle, namely: (1) regulation in compiling puzzles simplified so that children in grade 4 elementary school are easy to understand, (2) the game construct puzzle adapted to the basic competence in the learning materials in the 4th grade of primary school, (3) the distance between the pedestal do too far, the height of the obstacle is adjusted to the child's character, (4) the distance between the group of friends and the group of opponents in compiling puzzles is added by 1 meter, and (5) the equipment is adjusted to the characteristics of children in grade 4 elementary school. In this case, the equipment made by the players needs to be considered for safety, not only considering learning media, but the equipment used should be cheap and practical.

From the results of the discussion, for variations in learning PE, sports, and health with the approach of playing hurdles, moving the ball, arranging triangular blocks, compiling puzzles, equipment, or learning media facilities, the researcher said that this tool is very good in terms of safety, can develop basic jump movements for 4th-grade elementary school students. Based on the suggestions and comments of experts as described above, it is possible to immediately revise the design of learning variations in PE, sports, and health with the approach of playing hurdles, moving the ball, arranging triangular blocks, compiling puzzles to develop basic jump movements and character in grade 4 elementary school students. The suggestions from the experts are as follows:

- 1) The rules in hurdling, moving the ball, arranging triangular blocks, compiling puzzles are simplified. There are no penalties for students who make mistakes on the footstool, students who make mistakes will no longer return to the starting line.
- 2) The obstacles are adjusted to the child's height, and the blocks are reduced in size and weight.
- 3) The game time becomes 2 minutes each game and a 5 minutes break,
- 4) Equipment and facilities in the obstacle jump, moving the ball, arranging triangular blocks, and compiling puzzles have been considered safe.

- 5) The obstacle jumping game of moving the ball, arranging triangle blocks, compiling puzzles have been adapted to the themes and core competencies contained in the curriculum so that the jumping game can be used by PE teachers in grade 4 elementary schools in applying variations PE, sports and health learning on basic jumping motion material.

Product Trial

From the small group test that has been carried out on 15 students, it can be concluded, 66.67% of the basic techniques (specific movements) of hurdles moving the ball are easy to understand and easy to play, 60% think that the rules of the obstacle jumping game to move the ball are correct, 73.33% of the equipment is correct for jumping games. 73.33% stated that the number of players was correct, 60% of the game was good for basic jumping movements for 4th-grade elementary school students, 66.67% stated that the time given in the game was sufficient, 73.33% stated that the break time was appropriate (see Figure 2).



Figure 2. Small-Scale Product Trial

From the small group test carried out on 15 students, it can be concluded that 73.33% of the basic techniques (specific movements) in arranging triangular blocks are easy to understand and easy to play. 66.67% think that the rules of the game for arranging triangle blocks are correct, 73.33% of the equipment is correct, 66.67% stated that the number of players was correct, 66.67% said the game was good for basic jumping movements for 4th-grade elementary school students, 66.67% stated that the time given in the game was sufficient, 73.33% stated that the break time was appropriate (see Figure 3).

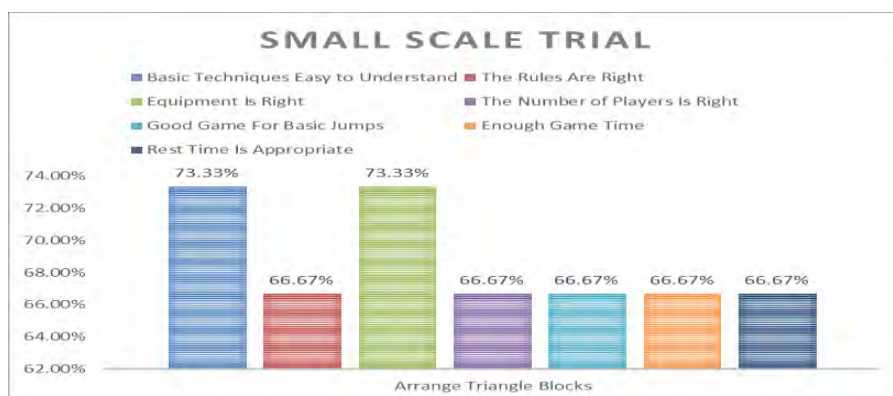


Figure 3. Small-Scale Product Trial

From the small group test that has been carried out on 15 students, it can be concluded that 60% of the basic techniques (specific movements) for compiling puzzles are easy to understand and easy to play, 66.67% think that the rules of the game of arranging triangle blocks are correct, 60% of the equipment is correct in the game of arranging puzzle blocks, 66.67% stated that the number of players was correct, 66.67% said the game was good for basic jumping movements for 4th-grade elementary school students, 66.67% stated that the time given in the game was sufficient, 66.67% stated that the break time was appropriate (see Figure 4).

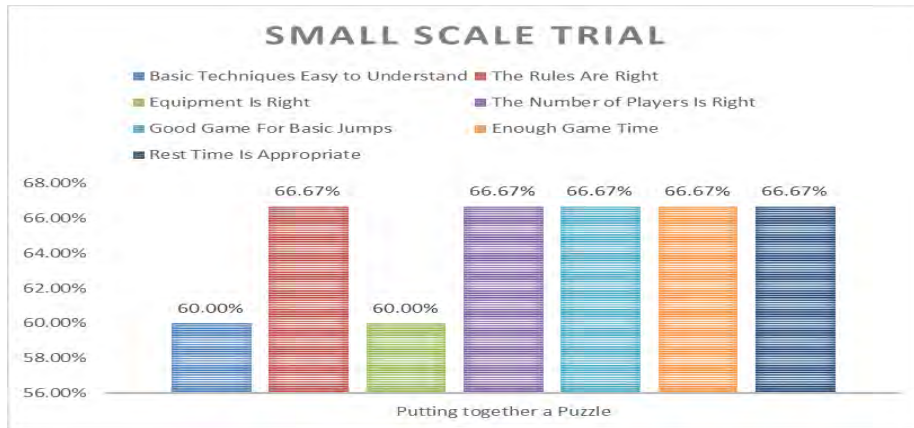


Figure 4. Small-Scale Product Trial

From the large group test carried out on 30 students, it can be concluded, 90% of the basic techniques (specific movements) of obstacle jump moving the ball are easy to understand and easy to play. 90% think that the rules of the obstacle jump game moving the ball are correct, 93.33% of the equipment is the correct for the jumping game to move the ball, 96.67% stated that the number of players was correct, 93.33% of the game was good for basic jumping movements for 4th-grade elementary school students, 90.00% stated that the time given in the game was sufficient, 90% said that the break time was appropriate (see Figure 5).

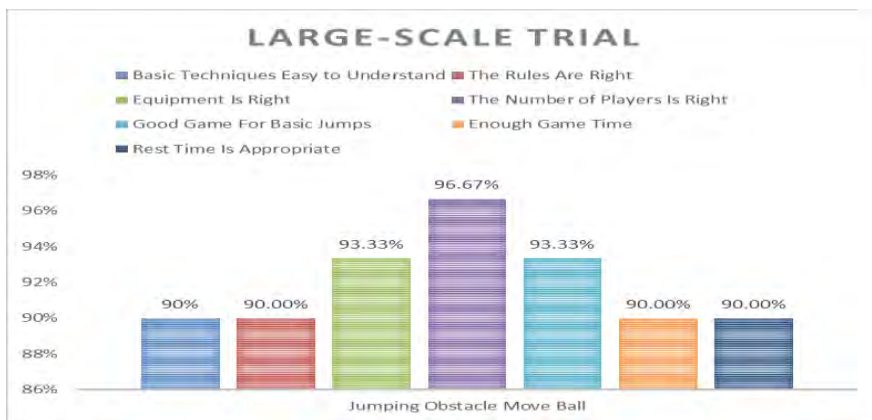


Figure 5. Large-Scale Product Trial

From the large group test that has been carried out on 30 students, it can be concluded that 93.33% of the basic techniques (specific movements) for arranging triangular blocks are easy to understand and easy to play, 90% think that the game rules for arranging triangle blocks are correct, 93.33% of the equipment is correct. 96.67%

stated that the number of players was correct, 93.33% of the game was good for basic jumping movements for 4th-grade elementary school students, 93.33% said that the time given in the game was sufficient, 90% said that the break time was appropriate (see Figure 6).

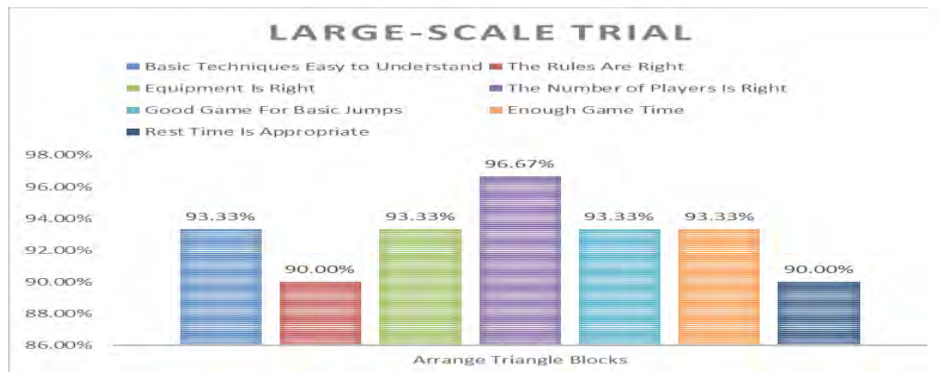


Figure 6. Large-Scale Product Trial

From the large group test carried out on 30 students, it can be concluded, 90% of the basic techniques (specific movements) in compiling puzzles are easy to understand and easy to play. 90% think that the rules of the game of arranging triangle blocks are correct, 93.33% of the equipment is correct in the game of arranging puzzle blocks, 96.67% stated that the number of players was correct, 93.33% of the game was good for basic jumping movements for 4th-grade elementary school students, 93.33% said that the time given in the game was sufficient, 93.33% stated that the break time was appropriate (see Figure 7).



Figure 7. Large-Scale Product Trial

Discussion

Based on the results of previous studies through the application of the climbing monkey playing method in this classroom action research, it was found that there was an increase in student activity in locomotor movements by 70%, non-locomotor movements by 54%, and manipulative movements by 83.3% (Hidayat, 2017). Based on the research results, the model for developing basic throw through this game is proven to be feasible, quality, and acceptable for developing the conceptual skills of game motion and increasing primary school students' physical fitness. Respondents playing ball show that the average category is quite good, meaning that this

development model is average - can be demonstrated (Kesumawati et al., 2020).

Based on the results of the study that for equipment or means of PE learning variations with the approach of playing jump obstacles, moving the ball, arranging triangular blocks, compiling puzzles, the researchers said that this tool is very good in terms of safety, can develop basic jumping movements and the character of children in grade 4 elementary school. The rules in the jump ball game, move the ball, arrange triangular blocks, compose puzzles are very simple and easy to understand by children in grade 4 elementary school. PE learning requires several supporting aspects to achieve success and effective goals. One of the efforts to improve the quality of PE learning can be supported by appropriate learning methods. In addition, there are external factors and internal factors from students, one of which is the motivation always to excel, which can improve learning outcomes (Priyambada et al., 2016).

The application of PE for students certainly has various basic goals and directions as an effort to improve students' movement abilities and manage physical and mental abilities or psychology with various goals. Behind the socio-psychological aspects, aspects of muscle function, cardiovascular, balance, and mobility are important factors that support the work of our bodies (Rismayanthi et al., 2021). Based on this statement, it can be explained that the movement ability of students in PE, which is supported by other aspects such as psychology, can provide benefits to achieve optimal goals, one of which is the ability of effective physical movement.

PE learning provides space and opportunities for students to explore. Physical movement activities controlled by learning methods using a play and tactical approach can provide space and its optimization to achieve learning goals and improve the quality of student learning. In addition, PE can shape the character of children or students (Mahardhika et al., 2018). The obstacle jump game moves the ball, arranges triangular blocks, composes puzzles also by the variation of PE learning to develop basic movements and characters with a play approach and following the characteristics of elementary school children so that this product can be a variation of teacher learning in carrying out the learning process for basic motion material. The jump's distance can be near and far according to the jump of children in grade 4 elementary school in the game, and the length of playtime is adjusted to the abilities and characteristics of children in grade 4 elementary school.

The equipment and movements used are considered for safety and not only considering variations in learning, but the equipment used is cheap and practical. From the development of variations in PE learning based on the play approach, it can be assessed by experts and teachers as practitioners in the field, stating that variations in PE learning based on the play approach are very well structured and appropriate to be used in learning to develop character values, cooperation, courage, and honesty. The variations of PE learning based on the play approach are playing hoops, moving the ball, arranging triangle blocks, compiling puzzles. From the results of previous studies by Astuti and Mardius (2017), collaborative games significantly influence the character formation of students in the State Elementary School, Balai Gadang Village, Koto Tengah District Padang City (Astuti & Mardius, 2017). Based on the research results, the development of traditional game models as PE learning for upper-class elementary school children should follow the objectives of building a character (cooperation, honesty, self-confidence, and caring for others) (Kurniawan & Zawawi, 2017).

Learning Variations

Variations can be interpreted alternately or variously. Learning variation is a teaching activity in the context of teaching and learning process interactions aimed at overcoming student boredom, so that in teaching and learning situations, students always show perseverance, enthusiasm, and are full of participation (Mustakim, 2011). Variety is a teacher's skill to keep the learning climate interesting. When online learning needs to address identified problems and facilitate the efficient operation of online PE classes, strategic learning methods are needed to understand the characteristics of online PE and thus better communicate the value of PE. It is also important to cultivate teaching skills through sharing online PE classes, of which collaboration between PE teachers is central (Jeong et al., 2020)

The purposes of variation are: 1) Increase and maintain student attention during the learning process, 2) provide opportunities for students to develop their talents and interests in new things, 3) provide opportunities for the possibility of functioning of student learning motivation, 4) provide opportunities for students to get a way of receiving the lessons they like, 5) fostering and forming positive attitudes of students towards teachers at school, 6) providing opportunities for students to learn according to the development of their abilities, 7) providing the possibility of unique learning opportunities, 8) providing a conducive environment for students to learn.

Approach to Play

Playing is essentially one of the necessities of life for children, according to Suharjana (2011). In a child's life, playing is an exercise carried out so that children become adult humans who have more opportunities to practice their potential. Therefore playing cannot be separated from the child's life itself. Loy, McPherson, and Kenyon define a play as a variety of activities that are: 1) free, 2) separate, 3) uncertain or changing, 4) spontaneously, 5) do not consider results, 6) are regulated by regulations and trust building (Damanik, 2014).

A play approach should be taken so that the ability to move (motor) and character values of children can be developed for elementary school children in particular. In playing, there are also possibilities to educate children's abilities. The stronger self-awareness can foster a sense of pleasure and a feeling to win. In playing, it is very important to use other media to support the game since the media can stimulate students in the game. Through games, basic movements can be developed, including non-locomotor, locomotor, and basic manipulative movements. The basic movement of jumping is included in the basic locomotor movement. The jumping motion moves the body forward by resting on one foot and landing on both feet.

Jumping Basics

Basic motion is a change in the place or position of an object at the initial balance point such as walking, running, jumping, and throwing involving body parts such as the head, hands, and feet that can be applied in various games, sports, and physical activities (Lubans et al., 2010). Jumping is a movement to lift the body from one point to another farther or higher by supporting one foot and landing with good balance.

Character

Character is a unique value-both imprinted in the self and embodied (embodiment) in behavior. Character coherently radiates from the results of thought, heart, taste, and intention and a person or group of people (Diana, 2014). The national commitment to character education is imperatively contained in Law Number 20 of 2003 concerning the National Education System. Article 3 of the Law states that "National Education functions to develop capabilities and shape the character and civilization of a dignified nation in the context of educating the nation's life, aiming at developing the potential of students to become human beings who believe and are devoted to God Almighty and have good morals, are creative, and have good character, independent and become a democratic and responsible citizen." Character is a way of thinking, behaving, and acting that characterizes a person who becomes a habit displayed in social life (Suharjana, 2011). Character education can be carried out simultaneously with teaching and learning activities integrated into every subject, including PE and PE. PE is not only a sport but also a strategic tool to build character (Susilawati & Kartini, 2019).

Conclusion

Based on the data obtained and the assessment of the research results, conclusions can be drawn:

- 1) This study produces a guide to variations in PE learning with modifications to the game, the size of the tool, the size of the players participating, the duration, and the principles to be played even with the limited facilities and infrastructure owned.
- 2) Variations in PE learning with a play approach can be a solution for teachers in providing learning variations on the basic jumping motion material.
- 3) Variations in PE learning with the approach of playing jumping and jumping, moving the ball, arranging triangular blocks, compiling puzzles can add insight to students in terms of knowledge of the form of the game. Furthermore, it can develop elementary school students' basic jumping motion and character.

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