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## ACHIEVEMENT IMPROVEMENT OF BASIC TABLE TENNIS TECHNIQUES THROUGH THE APPLICATION OF AUDIO-VISUAL LEARNING MEDIA

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#### ABSTRACT

The goal of this study is to see if using audio-visual media in conjunction with a scientific approach to learning table tennis game activities at SMP Negeri 1 Kabuh in Jombang, Indonesia, may increase student learning outcomes and to see how far those aims have been accomplished. This study employs two cycles of classroom action research. Planning, action implementation, observation, analysis, and reflection are the four steps of each cycle. According to the outcomes of the analyses, cycles I and II resulted in a significant increase. The results of learning to play table tennis in the first cycle were 59.38 percent across the board, with 19 students finishing the course. In cycle II, the percentage of students with complete learning outcomes increased to 87.51 percent, while the percentage of students with incomplete learning outcomes increased to 28 percent. The percentage of students with complete learning outcomes increased by 100% during cycle III, while the percentage of students with incomplete learning outcomes climbed by 32%. As a result, learning through the use of audio-visual learning media can improve learning achievement in class VII students of public middle-school 1 Kabuh.

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### 1. INTRODUCTION

Physical Education, Sports, and Health are vital instructional programs that help students develop their fitness (Felton et al., 2005; Metzler, 2017; Mustafa & Dwiyogo, 2020). This sport and health education is designed to encourage students to participate in sports activities in order to develop a healthy and robust generation of young people. Physical and health education in schools plays a vital role in a variety of ways, including providing chances for students to be directly involved in a variety of learning experiences through structured physical activities, games, and sports (Susanto, 2013; Mashud, 2017; Chan & Indrayeni, 2018; Varea & González-Calvo, 2021). Provision of learning opportunities aimed at promoting physical, character, movement, and personality harmony while also forming a healthy and fit lifestyle for life.

One of them states in the curriculum at the education unit level (Curriculum 2013) that education's objective is to conduct active, innovative, creative, effective, and joyful learning (Hidayani, 2017; Sadat, 2020; Rahman et al., 2021). A teacher can alter learning materials and adapt them to the learning environment's conditions. During the COVID-19

pandemic, the school conducted learning activities remotely, also known as distance learning and learning from home (Lase et al., 2021; Muzaini et al., 2021; Prasetia & Najiyah, 2021). This is difficult to implement due to the diverse economic conditions of students, and many students' interest in learning begins to wane as a result of low student interest in reading, and teachers who choose to provide teaching materials in the form of hangouts/writing so that students can easily access them without using up a lot of credit quota. This affects student learning outcomes in the very low Mid-Semester Assessment.

Table tennis is one of the items in the physical education subject that is included in the middle-school, Basic Competence material for physical education subjects. There are various strategies to learn in table tennis, including how to hold the bet, different sorts of strokes, and different types of strokes. You will be taught how to hold a bet, different sorts of strokes, and different types of strokes, namely table tennis service at SMP Negeri 1 Kabuh, at this meeting. It is indisputable that in the PJJ / Online teaching and learning process, students will face a variety of issues based on their ability (McLaughlan & Kirkpatrick, 2004; Coman et al., 2020; Carrillo & Flores, 2020; Joshi et al., 2020). Where a physical education teacher's lack of inventiveness in packaging physical education learning materials is cited as the reason for many students failing to finish the KKM (Minimum Completeness Criteria). As a result, a physical education teacher must be able to master a variety of models or learning approaches in order for learning to take place properly and effectively.

The results of observations of the table tennis learning process in class VII students of public middle-school 1 Kabuh have not gone well; there are still many students who have not been able to analyze the basic techniques of table tennis; there are many students who have not been active in participating in the learning process, and there are still many mistakes made by students in performing basic table tennis techniques.

From the above description of the problems, the author intends to improve learning outcomes of table tennis material at public middle-school 1 Kabuh with a learning approach through audiovisual media, namely by using audiovisual table tennis material aims to make it easier for students to analyze the movements made by the teacher in the form of packaging of teaching materials and increasing the ability of students to play table tennis will become more active and motivated. As a result, every table tennis learning material implemented at public middle-school 1 Kabuh will be assimilated and mastered to the fullest extent possible. Audio-visual learning media is another topic covered in this article.

As learning media is such an important aspect of the educational system, its utilization has an impact on student learning outcomes (Roemintoyo & Budiarto, 2021; Gumantan et al., 2021). The ability of instructors to create and implement learning designs is essential for successful and enjoyable learning. In addition, instructional design encompasses all of the procedures that go into improving learning and performance. From a process standpoint, instructional design entails a series of activities aimed at enhancing the learning experience in order to reach specific objectives. This is a branch of research concerned with turning broad principles of learning into plans for teaching and learning materials, including technology-based ones, from a learning viewpoint.

Teachers should employ media and learning strategies to help pupils improve their speaking skills. The usage of audiovisual media, such as a tape recorder or even an LCD projector, is the most likely to be used in schools. Students' speaking abilities and motivation to participate in learning improve as a result of the intervention. The use of audiovisual media enhances the learning experience (Nicolaou et al., 2019; Kurniawan et al., 2021). Furthermore, audiovisuals enhance the learning environment, inspire students to explore, experiment, and discover, and encourage them to develop speech and convey their thoughts (Saye & Brush, 2021; Pham, 2021). There are two sorts of audio-visual media: audio-visual stills and audio-visual motion. The benefits of audio-visual media include the ability to

clearly portray oral and written messages, the ability to overcome the restrictions of distance, time, and senses, and the ability to be utilized for instructional learning (Pham, 2021).

Making presentations more appealing requires the use of audiovisual elements (Foutsitzi, 2018; Naderer et al., 2020; Syafril & Kurniawati, 2021). Creating audio-visual content necessitates specialized knowledge, particularly when it comes to creating engaging educational media. One of the aspects that determines the success of the learning process is the attractiveness with which the media utilized is constructed so that students' attention is drawn to the material given (Abidin, 2017; Rahmatullah et al., 2020). As a result of this description, audiovisual media should be used in learning, particularly in physical education disciplines.

## 2. METHOD

Classroom action research studies are used in this study. The goal of this study is to increase the quality of classroom learning, especially learning PJOK. Beginning with a difficulty that a teacher encounters in the classroom throughout the teaching and learning process, an alternative is devised to better the situation, and it is then tested and assessed. The researcher employed two cycles to conduct this study because, according to the researcher, improving student quality cannot happen overnight, and there are occasions when the first result is inadequate, necessitating more work. The researcher employs Classroom Action Research (CAR) to improve the learning process of Physical Education subjects, with the action being the use of audio-visual table tennis learning video media to increase cognitive learning results. Understanding (Cognitive) Test Instruments, Skills Test (Psychomotor), and Teacher Observation Sheets were among the instruments utilized in this study.

To make the data obtained meaningful, it must first be processed and evaluated before it can be used as a decision-making tool. The data analysis method's goal is to understand and derive conclusions from the data collected. If the second cycle's exam scores are better than the first, the student's learning outcomes in basic table tennis technical content will improve. Furthermore, the Minimum Completeness Criteria for class VII students at public middle-school 1 Kabuh is 76, according to the learning curriculum. Individual students are regarded to have completed learning if they achieve a test score of at least 76. The method for determining whether or not audio-visual media can be used to improve learning outcomes of basic table tennis techniques. Moreover, if more than 85 percent of students in a class have completed their studies, the class is said to have completed its learning (classical completion). The data in the form of values obtained by holding tests in each cycle will be examined with the boundaries of student mastery specified by the classical mastery formula to determine the attainment of student learning mastery.

## 3. RESULTS AND DISCUSSION

The researcher conducted a preliminary survey to determine the current status in the field before beginning the classroom action research method. The following are the results of the initial survey. In the 2021/2022 academic year, 32 students from public middle-school 1 Kabuh participated in physical education, particularly table tennis, with 15 male students and 17 female students. Based on the learning process of table tennis, particularly how to play table tennis, the learning process can be classified as unsuccessful. Because teachers are less innovative in teaching table tennis, students are less interested and motivated to learn to play. Based on the observations, it was discovered that students in online learning have a hard time understanding the material

for playing table tennis. Due to the short time allotted and the use of PowerPoint movies, students demonstrated a lack of understanding when following the subject. Teachers have a hard time obtaining appropriate and correct examples/models for learning to play table tennis. Teachers are having some trouble coming up with a solid learning method for their students. Monotonous or traditional learning reduces students' learning motivation, which has an impact on their ability to play table tennis.

Before beginning the activity, the researchers and partners gathered the preliminary research data. This is to determine the initial state of the class on the table tennis game material of the students. The following is a description of the data collected as a consequence of studying the table tennis game for students in class VII at public middle-school 1 Kabuh. Based on the findings of the initial data recapitulation before being given the action, the data acquired suggest that the majority of students had poor learning outcomes, with 34.38 percent of students having completed their learning.

### Cycle 1

### Planning

The researcher creates the following classroom action research plan:

1. Meet with the Physical Education subject teacher to discuss the research plan that will be carried out.

- 2. Determine fundamental skills and topic matter.
- 3. Gather research materials and tools.

### **Cycle 1 of Action Implementation**

1. Carry out the actions outlined in the lesson plans and rules for student observation. 2. The teacher leads, directs, and assesses discussion and practice exercises while using Powerpoint movies to guide students through the learning process. The observer recorded the activities of the students and the teacher during the learning process.

3. All students are required to take notes on the information being taught during the learning process.

4. Following the completion of the learning, both the first and second meetings include an assessment. Psychomotor tests were carried out by observing the movement of basic table tennis skills while cognitive assessments were carried out by offering textual descriptions.

### Observation

The attitude of students who are passionate about listening to films provided by the teacher shows that learning through audio-visual media is sufficient to instill a fresh love and enthusiasm for studying table tennis. In cycle II, there is still time to improve the outcomes in the hopes of a better outcome. Figure 1 depicts the results for the first cycle of learning outcomes.

# 13RER- Indonesian Journal of Research and Educational Review

Volume 1, No 2, 2022, pp 253-261 257



Figure 1. Results for Cycle I

### **Analysis and Reflection**

Figure 1 showing the achievement of the results above indicates that students' learning outcomes improve as they meet their success goals. The procedures used, on the other hand, still need to be improved. In the first circumstances, students demonstrated good learning results, with a percentage of students who completed 59.38 percent and students who did not complete 40.63 percent. Meanwhile, teachers and students confront challenges such as the fact that many pupils are still unable to do the movements properly as a result of studying in a network with a relatively short learning period.

Internal approaches to each individual student continue to play a critical role in student excitement in order to obtain maximum results. The following are observations of teacher actions during Cycle I of the study process:

1) It's a good idea to start the class with a question.

2) Students appreciate your ability to communicate the information to them.

3) Class management is generally good, albeit there is some noise due to network/connection latency.

4) Follow the RPP when it comes to learning.

5) Interact with students and encourage them to do their best.

6) Encouraging and directing students to become better

7) Bringing the Lesson to a Close

### Maintenance plan

It is required to make changes in the following cycle of learning based on the findings of the first cycle's analysis, which include:

1) Physically prepare students by encouraging them to warm up correctly.

2) Conducting a more rigorous internal network strategy for students who are still struggling.

3) Provide greater encouragement to students so that they are more excited about participating in table tennis teaching and learning activities.

4) Create audio-visual learning videos so that students can be more engaged in the learning process.

### Cycle II

### Planning

In cycle 2, researchers plan class action by talking with observers about the study plan that will be carried out in cycle 2 based on the reflections from cycle 1. It will be taught in the second cycle

### Implementation of Cycle 2 (Actions 1 and 2)

Cycle 2 action is the implementation of a set of activities that have been modified to overcome the issues in cycle 1 so that the success of employing audio-visual media in learning table tennis can be seen. Observing and then practicing the table tennis lesson videos created by the trainer are the scheduled learning exercises. Observations of student activities during learning were also made in cycle 2, just as they were in cycle 1. In cycle 2, teaching and learning activities were carried out in accordance with the plan that had been prepared. Furthermore, cycle 2 of the 2nd action in this PTK is used to carry out learning activities for basic table tennis techniques. Students are guided to perform a number of basic table tennis methods through the implementation of studying and comprehending the game of table tennis. So that kids can learn how to do it right and then practice it effectively.

### Observation

According to the findings of the observations, students were more excited about learning, and there appeared to be no boredom among them. Students are not sluggish when it comes to studying and are always looking for ways to speed up the process. The students appeared joyful and excited during the warm-up, which was packaged in a game format. Learners are more active and enthusiastic. The presentation of the subject seemed to please the students at the time of learning. Moreover, students have begun to love studying as a result of audio-visual learning material, and because of the competition model adopted, students appear to want to outperform one another. The audio-visual learning media given is also a hit with the students. This can be noticed in students' attitudes, who seem to desire to try again and again. Learning to play table tennis is a multi-step process. From learning basic basics to playing table tennis, students appeared satisfied with the audio-visual learning tools offered, which was sufficient to make them feel challenged to play the sport.

The satisfying test results in cycle II in Figure 2 show that learning with audiovisual learning material is enough to instill a fresh passion and nuance in learning to play table tennis.

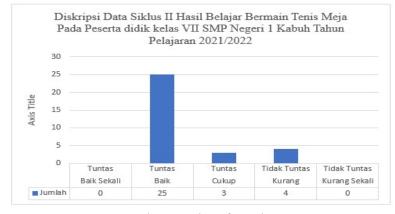


Figure 2. The Results of Cycle II

### **Analysis and Reflection**

The results of students learning to play table tennis went from 34.38 percent in the beginning conditions to 59.38 percent at the conclusion of the first cycle and grew to 87.51 percent at the end of the second cycle, according to the test results from cycle II. However, there is still work to be done to improve the method used so that the percentage of students with positive learning outcomes can reach 100%.

### 4. CONCLUSION

In two cycles, classroom action research was conducted with seventh-grade students at public middle-school 1 Kabuh. Each cycle is divided into four stages: planning, action implementation, observation, and analysis and reflection. Based on the results of the data analysis and discussion, it has been determined that learning through the use of audio-visual learning media can increase learning outcomes in class VII students of public middle-school 1 Kabuh. Cycle I and cycle II yielded a considerable increase, according to the analyses' findings. In the first cycle, the results of learning to play table tennis in the entire category were 59.38 percent, with 19 students completing the course. In cycle II, the percentage of students with complete learning outcomes increased to 28 percent. In cycle III, the percentage of students with complete learning outcomes increased by 100 percent, while students with incomplete learning outcomes increased by 32 percent.

As a result, the study's findings demonstrated that using audio-visual-based learning media is critical in assisting the implementation of the learning process both offline and online.

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