Physical Fitness Level of Students of SMP N 5 Rambah Hilir, Rokan Hulu Regency

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ABSTRACT

Physical fitness is an important indicator in supporting the success of students' learning process and the formation of a healthy lifestyle from school age. This study aims to describe the physical fitness level of students at SMP N 5 Rambah Hilir, Rokan Hulu Regency based on the results of fitness tests conducted on students. The study used a quantitative descriptive approach with a sample of 28 students selected from the active student population. The instrument used was a physical fitness test appropriate for junior high school age, and the results were converted into fitness level categories. Data were analyzed using descriptive statistics in the form of averages and percentages of categories. The results showed that in general the students' physical fitness level was in the moderate category. This was indicated by 50% of the total sample falling into that classification. The average (mean) value of students' physical fitness was 17.71, which confirms the finding that their fitness condition was not yet in the good category. This finding indicates that although students have sufficient basic physical abilities to participate in school activities and physical education lessons, a more structured and continuous training program is still needed so that students' physical fitness level can be increased to a higher category. This study recommends that physical education teachers and schools develop fitness improvement programs based on test results, enrich the variety of physical activities in learning, and encourage student involvement in sports activities outside of class hours. This will provide schools with an empirical basis for improving student physical fitness development.

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- A. Conception and design of the study;
- B. Acquisition of data;
- C. Analysis and interpretation of data;
- D. Manuscript preparation;
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INTRODUCTION

Physical fitness is a key component in developing healthy, productive human resources who are ready to face the demands of modern life. In the context of education, physical fitness is understood not only as physical ability but also as a foundation for students' cognitive, affective, and social development. Various studies have shown that students with good levels of physical fitness tend to have higher levels of concentration, better attendance, and a lower risk of non-communicable diseases at an early age (Aminuddin & Fajar, 2019; Sari, 2021). This aligns



with the modern physical education paradigm, which positions physical activity and fitness as instruments for developing an active and healthy lifestyle starting in junior high school (Kurniawan, 2020).

At the junior high school level, particularly in grades VII–IX, students are in a crucial phase of growth and development. This phase experiences accelerated growth in height, increased muscle mass, and cardiovascular development. When supported by adequate physical activity, this will result in an optimal physical fitness profile (Pratama & Yuliana, 2018). However, the reality in various regions shows a trend of declining student physical activity due to lifestyle changes, increased reliance on gadgets, and limited play spaces and attractive sports facilities for adolescents (Rahmadani & Yusuf, 2022). This situation has the potential to reduce students' physical fitness levels, even in schools located outside of major urban areas.

SMP Negeri 5 Rambah Hilir, located in Rokan Hulu Regency, is an educational unit operating within the geographical and social context typical of a regency in Riau Province. This region is characterized by a largely rural environment, with relatively limited access to school sports facilities and student physical activity patterns heavily influenced by family habits and local culture. On the one hand, the outdoor environment actually has the potential to support physical activity; however, on the other hand, if not managed through a systematic physical education and sports program, this potential does not automatically translate into improved student physical fitness (Hidayat & Mulyani, 2023). Therefore, a factual mapping of students' physical fitness levels at the school is necessary as a basis for developing learning interventions and extracurricular programs.

Specifically, physical fitness in the context of physical education in Indonesia is generally measured through adolescent physical fitness tests or adaptations of similar instruments that assess cardiorespiratory endurance, muscle strength and endurance, flexibility, and speed or agility (Mahendra, 2017; Wibowo, 2022). These indicators align with the health-related fitness components that serve as global benchmarks. The quality of these components is largely determined by the intensity, frequency, and variety of physical activity students engage in both in and out of school (Putra, 2019). When physical education (PJOK) instruction focuses solely on mastering cognitive material or game techniques without providing adequate physical training, students' physical fitness achievements tend to be moderate or even poor (Sembiring & Hartati, 2020).

An objective issue that has emerged in the past decade is the gap between curriculum objectives—which require students to be healthy and fit—and actual outcomes in the field. Several studies at the junior high school level in various regions report that the majority of students are in the moderate fitness category, with a significant number even in the poor category, particularly in cardiovascular endurance and abdominal muscle strength (Nasution, 2018; Lestari & Rachman, 2021). If this phenomenon also occurs at SMP N 5 Rambah Hilir, it could potentially impact student readiness for learning, participation in school sports activities, and even immunity to disease. This issue is increasingly important considering that districts/cities outside growth centers often lack longitudinal student fitness data to inform school health program planning.

From a scientific perspective, there are still significant research gaps. First, most physical fitness research in Indonesia focuses on students in urban areas or reference schools, thus underrepresenting the real-world conditions of schools in districts like Rokan Hulu (Sari, 2021). Second, existing research generally only reports fitness scores without linking them to the context of physical education (PJOK) learning, the availability of infrastructure, and the

characteristics of the students' social environments. In fact, physical fitness is the result of the interaction between individual factors (age, gender, nutritional status), school factors (quality of physical education teachers, training programs, schedules), and environmental factors (access to physical activity, family support) (Hamzah & Wulandari, 2023). Third, local studies on the physical fitness of junior high school students in Rokan Hulu Regency, especially at specific schools such as SMP N 5 Rambah Hilir, have not been widely published in indexed national or international journals.

The research novelty of this study lies in its attempt to capture the level of physical fitness of students in a specific geographic and social context, namely junior high schools in the Rambah Hilir area, Rokan Hulu Regency, using standardized measurement references and analyzing them based on fitness categories recognized in the sports literature. Thus, this study not only produces descriptive data on student fitness but also provides an argumentative basis for physical education teachers and schools to improve teaching strategies, increase hours of structured physical activity, or develop fitness-based extracurricular activities. In addition, these local findings are expected to enrich the national map regarding the physical fitness of school adolescents, which has so far been concentrated in certain areas (Yudha & Santoso, 2024).

Based on this background, the study, entitled "Physical Fitness Levels of Students at SMP N 5 Rambah Hilir, Rokan Hulu Regency," aims to: (1) determine the general level of physical fitness of students, (2) identify which fitness components are relatively weak and require intervention, and (3) provide practical recommendations for physical education teachers and school administrators. By understanding the initial level of students' physical fitness, efforts to improve it can be more targeted, for example through enrichment of endurance training, core muscle strengthening, or independent physical activity programs at home. Furthermore, the results of this study can also serve as a reference for local governments or relevant agencies in designing early childhood sports development programs at the district level.

Here we go: this study will use a quantitative descriptive design with a physical fitness test instrument appropriate for junior high school age and tested in the Indonesian context over the past 10 years. All sampled students will undergo a series of tests according to standard procedures. The data obtained will be categorized by fitness level (excellent, good, moderate, poor) and analyzed to identify general trends and differences based on gender or grade. In this way, the research not only presents figures, but also provides a basis for pedagogical and managerial decision-making at SMP N 5 Rambah Hilir, Rokan Hulu Regency.

METHODS

Research Type and Design

This research is a quantitative descriptive study. A descriptive approach was used because the primary objective of the study was to capture or describe the level of physical fitness of students at the time of the study without providing any specific treatment. The data obtained were physical fitness test scores, which were then classified into specific categories (excellent, good, moderate, poor) according to the guidelines used.

Research Location and Time

The research was conducted at SMP Negeri 5 Rambah Hilir, Rokan Hulu Regency, Riau Province. The location was selected purposively based on the following

considerations: (1) the school is located in an area of the regency where there has been little research on student physical fitness, and (2) the school offers a regular Physical Education (PJOK) course. The research was conducted in the even semester of the academic year... (fill in the appropriate timeframe).

Population and Sample

The population in this study was all students of SMP Negeri 5 Rambah Hilir in grades VIII during the current academic year. If the student population is not too large (e.g., <120 students), this study can use total sampling, where all students present and meeting health requirements are sampled. If the student population is large enough, the sample can be drawn using proportional random sampling, which randomly selects a sample proportionate to the number of students in each grade level. The sample size can be determined using the Slovin formula or by referring to a minimum of 30% of each grade level to achieve a more representative picture of fitness.

Research Instruments

The instrument used in this study was the Indonesian Physical Fitness Test (TKJI) for junior high school age groups, which has been widely used in physical education research and has assessment guidelines and fitness level categories. This instrument was deemed suitable for use in the school context due to its simple procedures, readily available equipment, and clear assessment norms.

Data Analysis Techniques

Data analysis was conducted quantitatively and descriptively using the following steps:

1. Scoring

Each student's test result was converted to a score according to the TKJI (Indonesian National Fitness Standards) standard table based on gender and age.

2. Category Determination

Each student's total score was then classified into the following categories: very good, good, average, poor, and very poor (according to the guidelines used).

3. Descriptive Statistics

Data are presented in the following format:

- a. Average (mean)
- b. Minimum and maximum scores
- c. Standard deviation
- d. Percentage of students in each fitness category
- 4. Further Analysis (optional)

If desired, simple comparisons can be made by gender (male and female) or by grade level using a non-parametric/simple difference test. However, because this research is descriptive, the presentation of percentages per group is adequate.

RESULTS AND DISCUSSION

Result

Physical fitness data was obtained through the Indonesian Physical Fitness Level (TKSI) test for 28 students selected as research samples. From these data, data processing was carried out, it was seen that the average value (mean) obtained by students was 17.71. Furthermore, the highest (maximum) value was 22. And the lowest (minimum) value was 13. And the standard deviation (SD) value was 2.80, more details about the distribution of physical fitness can be seen in the table below:

Table 1.Frequency Distribution of Physical Fitness (X1)

Total Value	Classification	F	%
22 - 25	Very Good	4	14,29
18 - 21	Good	9	32,14
14 - 17	Average	14	50,00
10 -13	Poor	1	3,57
	Total	28	100

Based on the table above, it can be explained that the physical fitness of 28 students selected as research samples at SMP N 5 RAMBAH HILIR, ROKAN HULU REGENCY, is in the very good category as many as 4 people (14.29%), then in the good category as many as 9 people (32.14%). in the moderate category as many as 14 people (50%) and in the less category as many as 1 person (3.57%). And in the very less category as many as 0 people (0.00%).

Based on the explanation above, it can be said that the physical fitness of students at SMP N 5 RAMBAH HILIR, ROKAN HULU REGENCY is in the moderate category.

Discussion

The results of mapping the physical fitness levels of students at SMP N 5 Rambah Hilir, Rokan Hulu Regency, show that the majority of students fall into the moderate category, with a small number falling into the good category, and a small number falling into the poor category. This pattern aligns with the findings of various studies on physical fitness at the junior high school level in Indonesia, which indicate that the fitness of school-aged adolescents tends to be suboptimal, particularly in cardiovascular endurance and muscle strength (Lestari & Rachman, 2021; Sari, 2021). This "moderate" condition can be interpreted as meaning that students possess basic physical capacity that allows them to participate in learning activities and sports, but have not yet reached the ideal fitness level that reflects an active and fit lifestyle.

One factor that may explain this finding is students' daily physical activity patterns. In regencies like Rambah Hilir, some students still engage in informal physical activities, such as helping their parents or spending a lot of time outdoors. However, these activities are not always rhythmic, structured, or intense enough to improve health-related fitness components. Physical fitness, particularly cardio-respiratory endurance and muscle strength, requires exercise at a specific frequency and duration. If students

rely solely on incidental physical activity and PE lessons once or twice a week, fitness gains will be slow (Putra, 2019).

Furthermore, PE learning patterns in schools often focus more on mastering game material and basic technical skills than on systematic fitness training. If teachers don't set aside dedicated time for endurance training (e.g., circuit running, light intervals, or moderate-to-high intensity games), students are simply "moving" but not "training." This is where the findings of this study are important: fitness data that tends to be at a moderate level should be interpreted as a signal that PE programs need to include more explicit, planned, and measurable fitness content. Teachers can include fitness testing at the beginning of the semester and then develop follow-up programs for students who fall below the minimum level.

The environment and facilities also play a role. Schools in areas like Rokan Hulu may have open spaces, but they may not necessarily have standard running tracks, simple fitness equipment, or indoor facilities that allow for training in the rain. These limitations are not an excuse for not training fitness, but rather require teachers' creativity in utilizing active traditional games, bodyweight-based circuit training, and inexpensive group activities. Therefore, the results of this study can be used as a basis for proposals to schools or committees to improve simple sports facilities.

From a youth health perspective, the moderate findings also warrant long-term vigilance. Junior high school is a golden age for developing active lifestyle habits. If fitness is not optimal during this phase, combined with increased device use and decreased physical activity in high school, the risk of fitness decline is even greater. Therefore, the recommendations derived from this study are not only for physical education teachers, but also for schools and parents to encourage physical activity outside of class hours. Thus, this discussion confirms that the moderate level of physical fitness of students at SMP N 5 Rambah Hilir reflects a combination of factors: unstructured physical activity patterns, physical education (PJOK) learning that is still dominated by game skills, and limited facilities. However, these findings also provide clear opportunities for improvement: the school has a baseline for developing data-driven fitness improvement programs, teachers have a basis for differentiating exercise, and future researchers can compare results after interventions are implemented.

CONCLUSION

In general, the physical fitness level of students at SMP N 5 Rambah Hilir in Rokan Hulu Regency is in the moderate category. This is supported by the fact that 50% of the 28 students in the sample had fitness scores that fell into this classification. The average (mean) fitness score of the students was 17.71, further confirming the finding that their fitness was at a moderate level.

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