

Physical Fitness Level of Students at Tiga Hati Kepenuhan Hulu Middle School

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ABSTRACT

This study aims to survey and analyze the physical fitness levels of students at SMP Tiga Hati Kepenuhan Hulu. Physical fitness is a fundamental aspect of health and adolescent development. The research population consisted of all students at SMP Tiga Hati Kepenuhan Hulu, totaling 167 individuals, from which a sample of 65 respondents was selected using the Slovin formula. Data were collected using the Indonesian Physical Fitness Test (TKJI) for ages 13–15, which includes speed (50-meter run), arm muscle strength (pull-up/hanging arm bent), abdominal muscle endurance (sit-up), leg muscle explosive power (vertical jump), cardiorespiratory endurance (1000/800-meter run), and flexibility (sit and reach). Test results were converted into scores and classified using the TKJI criterion-referenced assessment (PAP). The results showed that, in general, the physical fitness level of students at SMP Tiga Hati Kepenuhan Hulu fell into the “Moderate” category (45%) and “Poor” category (35%), with only 18% in the “Good” category and none achieving the “Very Good” category. Specifically, the components of leg explosive power (Vertical Jump) and cardiorespiratory endurance (Distance Run) showed very low levels, with all students (100%) categorized as “Poor” or “Very Poor” for leg explosive power, and the majority (98%) in the “Very Poor” category for cardiorespiratory endurance. The components of speed, arm muscle strength, abdominal muscle endurance, and flexibility also indicated that most students were in the lower-middle performance categories. These findings highlight an urgent need for a well-planned and sustainable physical fitness improvement program at SMP Tiga Hati Kepenuhan Hulu.

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INTRODUCTION

Physical fitness is the body's ability and capacity to adapt to physical stress (from daily work) without becoming fatigued. Physical fitness is an important aspect of overall health, directly contributing to a person's physical, mental, and emotional well-being. In adolescence, particularly among junior high school students, physical fitness plays a crucial role in development and growth. However, with lifestyle changes and technological advances, physical activity among adolescents tends to decline, while the prevalence of obesity and other health problems increases.

This decline in physical activity impacts various aspects of students' lives, including academic achievement and mental health. Research has shown that good physical fitness

can improve concentration, memory, and academic performance. Conversely, a lack of physical activity can lead to various health problems, such as obesity, diabetes, heart disease, and mental disorders such as stress and depression. Physical fitness is a crucial component of students' physical, mental, and social development. According to the WHO (2015), maintaining a fit and healthy body can be achieved by exercising regularly, at least 150 minutes per week. According to Shomoro and Mondal (2014: 355), physical fitness is the ability of a person's body to perform daily activities without experiencing significant fatigue. Physical fitness is an adaptive state that can be defined as a set of attributes possessed or achieved by a person related to the ability to perform physical activity.

Physical fitness is defined as the ability to perform daily tasks with vigour and alertness without undue fatigue, with sufficient energy to enjoy leisure activities and to meet unusual and unexpected situations (Akre & Bhimani, 2015: 129). Sinuraya (2020: 26) explains that physical fitness encompasses aspects of health and performance. The elements of physical fitness include muscular strength, muscular endurance, cardiovascular endurance, flexibility, coordination, agility, speed, and balance. In Indonesia, a similar situation is also found in various surveys of students' physical fitness levels. According to Widiastuti (2015: 13), physical fitness is defined as the ability to perform daily activities without significant fatigue. Students who are physically healthy and fit can carry out daily activities optimally. Physical fitness possessed by students can have a positive influence on student performance, which will also provide positive support for work or study productivity.

The process of child growth and development is a shared responsibility of parents, teachers, and the community. Physical education teachers have a significant responsibility to educate, support, and ensure the achievement of fitness for each student, as student physical fitness is crucial and a component in helping achieve national education goals. Sinuraya (2020: 26) explains that physical fitness encompasses aspects of health and performance. The elements of physical fitness include muscle strength, muscular endurance, cardiovascular endurance, flexibility, coordination, agility, speed, and balance. Measuring physical fitness levels through surveys is crucial for a deeper understanding of students' physical condition. On October 5, 2024, an observation was conducted on the physical fitness of students at Tiga Hati Kepenuhan Hulu Junior High School.

This observation aimed to identify physical fitness issues for students during morning exercise. The observations showed that most students faced various obstacles when the exercise began. Many students appeared unenthusiastic and tended to stand still during the exercise. Some students appeared lethargic and inactive in following the exercise movements guided by the teacher. This physical fitness problem is not limited to morning exercise but also continues into the classroom during the learning process. Some students appear lethargic and unenthusiastic about participating, with some even falling asleep as soon as the Pooron begins. This condition certainly hinders the achievement of effective and productive learning goals.

Students' lethargy during school activities is likely influenced by various factors, one of which is their declining physical fitness. Low physical fitness can cause students

to tire quickly and lack energy for activities. This decline in physical fitness is thought to be influenced by changes in students' lifestyles, where physical activity is decreasing due to technological advances, which lead students to spend more time in front of mobile phones or computer screens than engaging in physical activity. These technological advances and lifestyle changes have led to a decline in physical activity among students to decline. This minimal physical activity impacts students' physical fitness, resulting in Poor energy for school activities. This situation highlights the importance of increasing student participation in physical activity to maintain their physical fitness and support successful learning.

Given this phenomenon, it is crucial to survey the physical fitness levels of junior high school students. This survey aims to obtain empirical data that can be used to formulate strategies for improving physical fitness in schools. The data generated from this survey can also help schools and the government in developing more effective physical education programs that are tailored to students' needs. There are several factors that influence the level of physical fitness, including internal factors and external factors. Internal factors originate from the students themselves, namely, nutritional interests, students' physical fitness levels. External factors originate from outside the students, namely, the environment, social circles, school facilities and infrastructure, parental motivation, and others.

METHODS

The method used in this study was a quantitative descriptive survey approach. Herlan et al. (2020:40) stated that quantitative research with a descriptive format aims to explain and summarise various conditions, situations, or variables that arise in students who are the objects of research based on what happens. The method used in this study was a quantitative descriptive survey approach, with data collection techniques using tests and measurements. This study aims to determine the Student Physical Fitness Level Survey.

According to Sugiono and Hermawan, Sinurat & Janiarli (2022), a population is an object/subject with certain qualities and characteristics determined by the researcher to be studied and then drawn conclusions. In this study, the population was all 167 students at SMP Tiga Hati Kepenuhan Hulu.

Table 1.

Details of the Study Population of Students at Tiga Hati Middle School

Class	Number of Students		
	Boy	Girl	Total
VII A	20	12	32
VII B	18	13	31
VIII A	14	12	26
VIII B	14	10	24
IX A	14	13	27
IX B	11	16	27
Amount	91	76	167

A sample is a subset of the population and its characteristics. If the population is large and the researcher cannot study everything in the population, for example, due to limited funds, manpower, and time, then the researcher can use a sample taken from that population (Sugiono in Aluwia & Putra, 2022). A sample is a subset of the population, or a miniature of the population to be studied (Idrawati et al., 2020). A sample is a subset or part of the population whose characteristics are actually investigated (Kadir, 2022). According to Nalendra et al. (2021), to determine the number of samples to be used in this study, it can be calculated using the following Slovin formula.

Based on the calculation above, the number of samples used is 118. Furthermore, to determine the number of samples in each class, the researcher determined it using proportional random sampling. The formula for using proportional random sampling is as follows:

Table 2.
 Details of Samples Used by Each Class

NO	Class	Population	Calculation	Sample
1	VII A	32	$(32:118) \times 100$	27
2	VII B	31	$(31:118) \times 100$	26
3	VIII A	26	$(26:118) \times 100$	22
4	VIII B	24	$(24:118) \times 100$	20
5	IX A	27	$(27:118) \times 100$	22
6	IX B	27	$(27:118) \times 100$	22
Total Sample Size				139

Source: Nal Endra,dkk (2021)

The data collection technique in this study was a measurement test. The measurement test was conducted to obtain relevant data. The data obtained in this study were the results of physical fitness measurements of 7th and 8th-grade students at Tiga Hati Junior High School. The physical fitness test has a level of validation and reliability for students aged 13 to 15 years. Because these students are 13 to 15 years old, the test used in this study was the Indonesian Physical Fitness Test (TKJI), with a validation of 0.95 and a reliability of 0.96. (Narlan and Juniar, 2020:18)

The test instrument used in this study was the Indonesian Physical Fitness Test (TKJI). A person's physical fitness can be determined by measuring it with a test instrument/tool. One instrument commonly used to measure physical fitness in Indonesia is the Indonesian Physical Fitness Test (TKJI). This study will describe the TKJI (Teaching and Training for Physical and Mental Health) for 13-15 year olds, consisting of five test items: a 50-meter run, a 60-second elbow hang for girls, a 60-second pull-up for boys, a 60-second sitting position for boys, a vertical jump, and a 1,000-meter run for boys and an 800-meter run for girls. This test is a series of tests, so its implementation must be continuous and continuous throughout the series.

The instrument was developed based on a grid created in accordance with the research's dependent variables. To ensure the instrument reflects its overall content and is suitable for use as a data collection tool, it was first piloted on a population considered similar to the research sample. The development of the instrument is based on the

research variables outlined in the following grid according to: a) Speed Test (50 meter Sprint), b) Muscle Strength Test (Pull Up 60 seconds), c) Abdominal Muscle Endurance Test (Sit Up 60 seconds), d) Explosive Power Test, Leg Muscles (Vertical Jump), e) Cardiopulmonary Endurance Test, 2,400 m Distance Running Test, f) Sit and reach model test (Women). TKJl implementation process.

Table 3.
 Indonesian Physical Fitness Test Norms (Boys and Girls)

No	Total Values	Physical Fitness Classification
1	39 – 41.9	Very Good
2	35 – 38.9	Good
3	31 – 34.9	Currently
4	25 – 30.9	Poor
5	< 25.0	Very Poor

Source: Vivian H. Heyward (2016)

After data collection, the next step is data analysis. The data processing steps are carried out using the following procedures:

1. After data entry, the data is tabulated into tables according to the types of tests administered. This is done to ensure the data is more organised and thus facilitates analysis.
2. After data collection, the data is entered into Microsoft Excel 2021 (data entry) according to each test group. This is to facilitate processing.
3. After tabulation, the data is analyzed and classified using the Benchmark Assessment (PAP) from the Indonesian Physical Fitness Test book.
4. After classification, the data is presented according to each classification.
5. The percentages are then calculated. According to Sousia and Huliselan (2020:76), the formula used to obtain relative frequencies (percentages) is:

$$P: \frac{F}{N} \times 100\%$$

6. The final step after the data has been analyzed and classified using percentages is to describe the results of the data processing.

RESULTS AND DISCUSSION

Result

The subjects in this study were students of Tiga Hati Kepenuhan Hulu Junior High School. The population of this study was all 167 students of Tiga Hati Kepenuhan Hulu Junior High School, consisting of 91 male students and 76 female students. Based on the sample calculation using the Slovin formula with a 5% error tolerance, a sample of 118 respondents was obtained. The survey of the physical fitness level of Tiga Hati Kepenuhan Hulu Junior High School students can be described as follows. The physical fitness level in this study was obtained from the results of a physical fitness test using the Indonesian Physical Fitness Test (TKJl) for ages 13-15 years. This test includes: 50-meter run (speed), hanging arm bent for girls and pull up for boys (arm muscle strength),

sit-ups (abdominal muscle endurance), vertical jump (leg muscle explosive power), 1000-meter run for boys and 800-meter run for girls (cardiorespiratory endurance), and sit and reach (flexibility). From each of these tests, research data were converted into scores and totalled, then classified using the TKJl Benchmark Assessment (PAP), resulting in physical fitness test results. The research results from these tests are described as follows:

Descriptive Statistical Analysis of Speed Test Level with 50 Meter Run (Sprint) at Tiga Hati Junior High School, Kepenuhan Hulu

Table 4.

Descriptive Statistics of the Speed Test Level with the 50-Meter Run (Sprint) at Tiga Hati Junior High School, Kepenuhan Hulu

Amount	559,8
Median	8,8
Std. Deviation	1,1
Minimum	6,5
Maximum	10,3
Mean	8,7

The data above illustrates the results of a survey of the physical fitness levels of students at Tiga Hati Kepenuhan Hulu Junior High School, as measured by a physical fitness test (TKJl). The analysis shows that the average (name of the TKJl variable/component you are analyzing) is 8.7, with a lowest score of 6.5 and a highest score of 10.3. A standard deviation of 1.1 indicates that the students' physical fitness data is clustered fairly closely around the mean. The following is a frequency distribution table:

Table 5.

Frequency Distribution of Speed Test Levels with 50-Meter Run (Sprint) at Tiga Hati Junior High School, Kepenuhan Hulu

NO	Category	Norm	Absolute Frequency	Relative Frequency
1	Very Good	S.d-7,8"	19	29
2	Good	7,8"-8,7"	12	18
3	Currently	8,8"-9,9"	17	26
4	Poor	10,0"-11,9"	17	26
5	Very Poor	11,9"-dst	0	0
AMOUNT			65	100 %

Table 5 presents the frequency distribution of leg muscle strength levels for the Bintang Junior Futsal Team in Rokan Hulu Regency. It shows that none of the 12 team members achieved the "Excellent," "Good," or "Fair" categories. The majority of team members, 7 (58%), fell into the "Very Poor" category, with a standard range below 84.50, followed by 5 (42%) in the "Poor" category, with a standard range of 84.50-127.50. This indicates that most members of the Bintang Junior Futsal Team in Rokan Hulu Regency have low levels of leg muscle strength. This can be further explained in Figure 4.1 below.

The table above presents the frequency distribution of 50-meter sprint speed levels for students at Tiga Hati Junior High School in Kepenuhan Hulu. Of the 65 students

tested, 19 (29%) achieved the "Excellent" category, with a time of ≤ 7.8 seconds, demonstrating excellent speed performance. Furthermore, 12 students (18%) were in the "Good" category with a time range of 7.8" - 8.7". A total of 17 students (26%) were in the "Average" category with a time record of 8.8" - 9.9". Meanwhile, there were 17 students (26%) in the "Poor" category with a time range of 10.0" - 11.9". No students (0%) were in the "Very Poor" category (≥ 11.9 "). This indicates that there is a variation in speed levels among students at SMP Tiga Hati Kepenuhan Hulu, with the largest proportion being in the "Very Good" category, but there are also significant numbers in the "Poor" and "Poor" categories.

Descriptive Statistical Analysis of 60-second Pull-ups at SMP Tiga Hati Kepenuhan Hulu **Table 6.**

Descriptive Statistics of 60-second Pull-ups at Tiga Hati Junior High School, Kepenuhan Hulu

Amount	792,0
Median	10,0
Std. Deviation	8,0
Minimum	2,0
Maximum	30,0
Mean	12,2

The data above illustrates the results of a survey of the physical fitness levels of students at Tiga Hati Kepenuhan Hulu Middle School, as measured through a physical fitness test (TKJI). The analysis results show that the average 60-second pull-up is 4.259, with the lowest score being 3.53 and the highest score being 4.78. Meanwhile, the standard deviation of 0.39 indicates that there is not too much variation in [name of the physical fitness component measured/physical fitness level] among these students, illustrating a relatively homogeneous distribution of data around the average value.

Table 7.

Frequency Distribution of 60-second Pull-up Levels at Tiga Hati Kepenuhan Hulu Middle School

NO	Category	Norm	Absolute Frequency	Relative Frequency
1	Very Good	>16 Kali	23	35 %
2	Good	11- 15 Kali	2	3 %
3	Currently	06- 10 Kali	21	32 %
4	Poor	02- 05 Kali	19	29 %
5	Very Poor	< 2 Kali	0	0 %
Amount			65	100 %

The table above presents the frequency distribution of arm muscle strength levels (Pull up 60 seconds) of students at Tiga Hati Kepenuhan Hulu Middle School. Of the total 65 students tested, there were 23 students (35%) who achieved the "Very Good" category with a norm of >16 times, indicating excellent performance. Then, 2 students (3%) were in the "Good" category with a norm of 11-15 times. The majority of students, namely 21 people (32%), were in the "Medium" category with a norm of 06-10 times. Meanwhile, 19 students (29%) were in the "Poor" category with a norm of 02-05 times. No students (0%)

were in the "Very Poor" category, with a norm of <2 times. This indicates that most students at Tiga Hati Kepenuhan Hulu Middle School have varying levels of arm muscle strength, with the highest concentration in the "Very Good" category, but also followed by a significant number in the "Moderate" and "Poor" categories.

Descriptive Statistical Analysis of 60-second Sit Ups

Table 8

Descriptive Statistics of 60-Second Sit-Ups at Tiga Hati Junior High School, Kepenuhan Hulu

Amount	835,0
Median	9,0
Std. Deviation	9,1
Minimum	2,0
Maximum	50,0
Mean	12,8

The data above illustrates the results of a survey of the physical fitness levels of students at Tiga Hati Kepenuhan Hulu Junior High School, specifically regarding the abdominal muscle endurance component, as measured by a 60-second sit-up test. The analysis shows that the average student performance on the 60-second sit-up test was 12.8 repetitions, with the lowest score being 2.0 repetitions and the highest score being 50.0 repetitions. Meanwhile, the standard deviation of 9.1 indicates significant variation in abdominal muscle endurance among these students, illustrating a fairly wide spread of data around the mean. The following is a frequency distribution table:

Table 8.

Frequency Distribution of 60-second Sit-Ups at Tiga Hati Kepenuhan Hulu Junior High School

NO	Category	Norm	Absolute Frequency	Relative Frequency
1	Very Good	38 Ke atas	0	0 %
2	Good	28-37	6	9 %
3	Currently	19-27	7	11 %
4	Poor	8. -18	38	58 %
5	Very Poor	<8	14	22 %
Amount			65	100 %

The table above presents the frequency distribution of the 60-second abdominal muscle endurance (Sit Up) levels of students at Tiga Hati Kepenuhan Hulu Middle School. Of the 65 students tested, none (0%) reached the "Very Good" category (norm 38 and above). Only 6 students (9%) were in the "Good" category with a norm range of 28-37 times. A total of 7 students (11%) were in the "Moderate" category with a norm range of 19-27 times. The majority of students, namely 38 people (58%), were in the "Poor" category with a norm range of 8-18 times. Followed by 14 people (22%) in the "Very Poor" category, with a norm range of <8 times. This indicates that most students at Tiga Hati Kepenuhan Hulu Middle School have low to very low levels of abdominal muscle endurance, with the majority being in the "Poor" category.

Descriptive Statistical Analysis of Vertical Jump

Table 9.

Descriptive Statistics of Vertical Jumps at Tiga Hati Kepenuhan Hulu Middle School.

Amount	1765,0
Median	21,0
Std. Deviation	8,1
Minimum	7,0
Maximum	39,0
Mean	27,2

The data above illustrates the results of a survey of the physical fitness levels of students at Tiga Hati Kepenuhan Hulu Middle School, specifically regarding the explosive power of the leg muscles as measured by the Vertical Jump test. The analysis results show that the average student performance on the Vertical Jump test was 27.2 cm, with the lowest score being 7.0 cm and the highest score being 39.0 cm. Meanwhile, the standard deviation of 8.1 indicates significant variation in the explosive power of the leg muscles among these students, depicting a fairly wide distribution of data around the average value. The following is a frequency distribution table:

Table 10.

Frequency Distribution of Vertical Jump Levels at Tiga Hati Kepenuhan Hulu Middle School.

NO	Category	Norm	Absolute Frequency	Relative Frequency
1	Very Good	>66 Keatas	0	0 %
2	Good	53-65	0	0 %
3	Currently	42-52	0	0 %
4	Poor	31-41	21	32 %
5	Very Poor	<31	44	68 %
Amount			65	100 %

The table above presents the frequency distribution of explosive leg muscle power levels (Vertical Jump) of students at Tiga Hati Kepenuhan Hulu Middle School, with a total of 65 students. No students (0%) were included in the "Very Good" category (norm >66 and above), "Good" (norm 53-65), or "Moderate" (norm 42-52). The majority of students, namely 44 people (68%), were in the "Very Poor" category with a norm range of <31. While the remaining 21 people (32%) were included in the "Poor" category, with a norm range of 31-41. Overall, the data indicate that all students were in the "Poor" or "Very Poor" category, with the majority being at the "Very Poor" level.

Descriptive Statistical Analysis of 2,400 M Distance Running

Table 10.

Descriptive Statistics of the 2,400m Run at Tiga Hati Junior High School, Kepenuhan Hulu

Amount	497,5
Median	8,0
Std. Deviation	3,7
Minimum	3,0
Maximum	29,0
Mean	7,7

The data above illustrates the results of a survey of the physical fitness levels of students at Tiga Hati Kepenuhan Hulu Junior High School, specifically in the cardiorespiratory endurance component as measured by the 2,400 m Distance Run test. The analysis results show that the average student performance in the 2,400 m Distance Run test was 7.7 minutes, with the fastest (lowest) score of 3.0 minutes and the slowest (highest) score of 29.0 minutes. Meanwhile, the standard deviation of 3.7 indicates a significant variation in cardiorespiratory endurance among these students, illustrating a fairly wide spread of data around the average value. The following is a frequency distribution table:

Table 11.

Frequency Distribution of the 2,400 m Running Level at Tiga Hati Junior High School, Kepenuhan Hulu

NO	Category	Norm	Absolute Frequency	Relative Frequency
1	Very Good	39-41.9	0	0 %
2	Good	35 - 38. 9	0	0 %
3	Currently	31 - 34.9	0	0 %
4	Poor	25 - 30.9	1	2 %
5	Very Poor	< 25. 0	64	98 %
Amount			65	100 %

The table above presents the frequency distribution of the 2,400 m Distance Running level of Tiga Hati Kepenuhan Hulu Junior High School. Of the total 65 students tested, none (0%) achieved the category of "Very Good" (norm 39-41.9), "Good" (norm 35-38.9), or "Moderate" (norm 31-34.9). Almost all students, namely 64 people (98%), were in the category of "Very Poor" with a norm range of <25.0. Meanwhile, only 1 person (2%) was in the category of "Poor" with a norm range of 25-30.9. This indicates that most students of Tiga Hati Kepenuhan Hulu Junior High School have a very low level of overall physical fitness.

Descriptive Statistical Analysis of the Sit and Reach Model Test at Tiga Hati Kepenuhan Hulu Middle School.

Table 12.

Descriptive Statistics of the Sit and Reach Model Test at Tiga Hati Junior High School, Kepenuhan Hulu

Amount	579,0
Median	8,0
Std. Deviation	2,9
Minimum	4,0
Maximum	17,0
Mean	8,9

The data above illustrates the results of a survey of the physical fitness levels of students at Tiga Hati Kepenuhan Hulu Junior High School, specifically the flexibility component as measured by the Sit and Reach test. The analysis shows that the average student performance on the Sit and Reach test was 8.9 cm, with the lowest score being 4.0 cm and the highest being 17.0 cm. Meanwhile, the standard deviation of 2.9 indicates moderate variation in flexibility among these students, illustrating a fairly diverse distribution of data around the average value. The following is a frequency distribution table:

Table 13.

Frequency Distribution of Sit and Reach Model Test Levels at Tiga Hati Junior High School, Kepenuhan Hulu

NO	Category	Norm	Absolute Frequency	Relative Frequency
1	> 15	Very Good	1	2 %
2	12 – 14 cm	Good	10	15 %
3	9 – 11 cm	Currently	21	32 %
4	6 – 8 cm	Poor	32	49 %
5	< 5 cm	Very Poor	1	2 %
Amount			65	100 %

The table above presents the frequency distribution of flexibility levels (Sit and Reach model test) of students at Tiga Hati Kepenuhan Hulu Junior High School. Of the 65 students tested, 1 person (2%) achieved the "Very Good" category with a reach of ≥ 15 cm. A total of 10 people (15%) were in the "Good" category with a range of 12–14 cm, and 21 people (32%) were in the "Fair" category with a range of 9–11 cm. The majority of students, namely 32 people (49%), were in the "Poor" category with a range of 6–8 cm. Only 1 person (2%) was included in the "Very Poor" category with a reach of < 5 cm. This indicates that most students at Tiga Hati Kepenuhan Hulu Junior High School have a Poor level of flexibility, although there is also a significant portion in the "Fair" category and a small portion in the "Good" and "Very Good" categories.

Descriptive Analysis of Physical Fitness Statistics of Junior High School Tiga Hati Kepenuhan Hulu.

Table 14.

Descriptive Statistics of Physical Fitness at Tiga Hati Kepenuhan Hulu Junior High School

Amount	954,0
Median	14,0
Std. Deviation	2,8
Minimum	8,0
Maximum	21,0
Mean	14,7

The data above illustrates the results of a survey of the physical fitness levels of students at Tiga Hati Kepenuhan Hulu Junior High School, specifically on the overall physical fitness component (based on the total TKJI score). The analysis results show that the average student performance on the overall physical fitness test was 14.7, with the lowest score being 8.0 and the highest score being 21.0. Meanwhile, the standard deviation of 2.8 indicates a relatively small variation in the overall physical fitness levels among these students, depicting a relatively homogeneous distribution of data around the average value. The following is a frequency distribution table:

Table 15.

Frequency Distribution of Physical Fitness Levels at Tiga Hati Kepenuhan Hulu Junior High School.

NO	Category	Norm	Absolute Frequency	Relative Frequency
1	22 – 25	Very Good	0	0 %
2	18 – 21	Good	12	18 %
3	14 – 17	Currently	29	45 %

NO	Category	Norm	Absolute Frequency	Relative Frequency
4	10 – 13	Poor	23	35 %
5	5 – 9	Very Poor	1	2 %
Amount			65	100 %

The table presents the frequency distribution of the overall physical fitness level of students at Tiga Hati Kepenuhan Hulu Junior High School. Of the 65 students tested, none (0%) achieved the "Very Good" category (norm 22 – 25). A total of 12 students (18%) were in the "Good" category with a norm range of 18–21, and 29 students (45%) were in the "Moderate" category with a norm range of 14–17. The majority of students, namely 23 students (35%), were in the "Poor" category with a norm range of 10–13. Only 1 student (2%) was included in the "Very Poor" category with a norm range of 5–9. This indicates that the majority of students at Tiga Hati Kepenuhan Hulu Junior High School have a Moderate level of physical fitness, although there is also a significant portion in the "Poor" category and a small portion in the "Good" and "Very Poor" categories.

Discussion

This study aims to survey the physical fitness levels of students at Tiga Hati Kepenuhan Hulu Junior High School. Physical fitness is an important aspect of health and quality of life, especially during adolescence when growth is occurring. The results of this survey provide a comprehensive overview of the various components of physical fitness as measured using the Indonesian Physical Fitness Test (TKJI) and how they are distributed among students. Descriptive analysis of the speed component (50-meter dash) shows that the average student running time is 8.7 seconds, with a range of 6.5 to 10.3 seconds and a standard deviation of 1.1. The frequency distribution shows that 29% of students are in the "Excellent" category, 18% are in "Good", 26% are in "Moderate", and 26% are in "Poor". This indicates a fairly even variation, but with significant proportions in the excellent, moderate, and poor speed categories. Although there are very fast students, equal proportions are found in the moderate and poor categories, indicating the need for attention to improving speed for some students. In the arm muscle strength component (60-second pull-ups), the average repetition rate was 12.2, with a wide range from 2.0 to 30.0 repetitions and a standard deviation of 8.0. The frequency distribution shows that 35% of students were in the "Very Good" category, but only 3% were in the "Good" category. The majority were divided between "Average" (32%) and "Poor" (29%). This highlights that while there is a group of students with excellent arm muscle strength, there is also a large group at the average and poor levels. The high standard deviation confirms the significant heterogeneity in arm muscle strength abilities among students.

For abdominal endurance (60-second sit-ups), the average repetition count was 12.8, with a wide range from 2.0 to 50.0 repetitions and a standard deviation of 9.1. These data demonstrate a large variation in student ability. The frequency distribution clearly shows that the majority of students were in the low category; 58% were in the "Poor" category, and 22% were in the "Very Poor" category. Only 9% of students achieved the "Good" category, and none achieved the "Very Good" category. This finding is very

important because it indicates that the abdominal endurance of students at Tiga Hati Kepenuhan Hulu Junior High School is generally at a low level and requires serious intervention. Furthermore, for the explosive leg muscle component (Vertical Jump), the average jump was 27.2 cm, with a range from 7.0 to 39.0 cm and a standard deviation of 8.1. The frequency distribution shows a very worrying pattern. No students fell into the "Very Good," "Good," or "Average" categories. All students (100%) were in the "Poor" (32%) and "Very Poor" (68%) categories. These data clearly indicate that the explosive power of the leg muscles of students at SMP Tiga Hati Kepenuhan Hulu is at a very low level, even tending to be below average. In the cardiorespiratory endurance component (2,400 m Distance Run), the average time was 7.7 minutes, with a range of 3.0 to 29.0 minutes and a standard deviation of 3.7. Although the descriptive data show a wide range of times, the frequency distribution for the overall physical fitness level (based on the TKJI score norms) shows that the majority of students have low cardiorespiratory endurance. The absolute majority (98%) were in the "Very Poor" category (score < 25.0), and 2% in "Poor" (score 25-30.9). This is the most critical indicator that shows that the level of cardiorespiratory fitness of students is almost entirely at the lowest level based on the TKJI standards. Finally, in the flexibility component (Sit and Reach model test), the average reach was 8.9 cm, with a range of 4.0 to 17.0 cm and a standard deviation of 2.9. The frequency distribution shows that the majority of students (49%) were in the "Poor" category, and 32% were in the "Sufficient" category. Only 15% were in "Good" and 2% were in "Very Good", with 2% in "Very Poor". This means that students' flexibility tends to be at the poor to adequate level, with most needing improvement.

Overall, the results of the survey of physical fitness levels of students at Tiga Hati Kepenuhan Hulu Junior High School (based on the TKJI composite score) showed an average of 14.7, with a standard deviation of 2.8. The frequency distribution confirmed that no students reached the "Very Good" category. Although there were 18% in the "Good" category, the majority of students fell into the "Moderate" (45%) and "Poor" (35%) categories, with 2% in "Very Poor". These findings highlight that, in general, students' physical fitness was at a medium to low level. A comparison between the components of physical fitness showed that students performed very poorly in leg muscle explosive power (Vertical Jump) and cardiorespiratory endurance (2,400 m Run based on TKJI norms), where almost all students fell into the "Poor" or "Very Poor" category. Meanwhile, in speed (50-meter run) and arm muscle strength (pull-up), the distribution was more varied, with some students reaching the "Very Good" category, but there were still large groups in the moderate and poor categories. Abdominal muscle endurance (sit-ups) also showed a majority of students in the low category. Flexibility showed a more widespread distribution, but the majority remained in the poor and adequate categories. These results align with several previous studies indicating a decline in physical fitness levels in adolescents, likely due to a sedentary lifestyle and the predominance of technology use. This low level of physical fitness can negatively impact physical health, concentration, and student productivity at school. Therefore, a planned and sustainable

intervention program is needed to improve the physical fitness of students at Tiga Hati Kepenuhan Hulu Junior High School.

Based on the survey results and discussion of the research conducted, it can be concluded that the physical fitness level of students at Tiga Hati Kepenuhan Hulu Junior High School is generally in the moderate to poor category, with the majority of students concentrated in this category. The components of leg muscle explosiveness and cardiorespiratory endurance showed very low levels (the majority in the "Very Poor" category), while the components of speed, arm muscle strength, abdominal muscle endurance, and flexibility also showed that the majority of students were in the moderate or below category. This indicates the need for serious efforts and a dedicated program to improve the physical fitness of students at this school.

CONCLUSION

Based on the results of the survey and analysis conducted regarding the physical fitness level of students at Tiga Hati Kepenuhan Hulu Junior High School, several key points can be concluded. In general, the physical fitness condition of students tends to be in the medium to low category. This is indicated by the majority of students concentrated in the "Moderate" and "Poor" categories for overall physical fitness, and no students reached the "Very Good" level. In more detail, there were significant problems in the components of explosive leg muscle power (Vertical Jump) and cardiorespiratory endurance (as measured by the 2,400 m run based on TKJl norms). In both aspects, the fitness level of students was found to be very low, with almost all students in the "Poor" or "Very Poor" category. As for other components such as speed (50-meter run), arm muscle strength (60-second pull-up), abdominal muscle endurance (60-second sit-up), and flexibility (Sit and Reach), although there were differences in ability levels among students, most of them still fell into the medium category or below ("Moderate", "Poor", or "Very Poor"). Thus, the results of this study clearly show that serious attention and implementation of planned and sustainable programs are needed to improve the physical fitness of students at SMP Tiga Hati Kepenuhan Hulu.

REFERENCES

- Adriana, Wida Kristi. *Survei Tingkat Kesegaran Jasmani Siswa Smpn Se-Kecamatan Badau Kabupaten Kapuas Hulu*. Diss. IKIP PGRI Pontianak, 2022.
- Agus, A., & Sepriani, S. (2021). *Manajemen Kebugaran*. Padang: SUKABINA Press. ISBN: 978-602-8124-96-6.
- Akre, A., & Bhimani, N. (2015). Correlation between physical fitness index (PFI) and body mass index in asymptomatic college girls. *Journal of Exercise Science and Physiotherapy*, 11(2), 129
- Akre, A., & Bhimani, N. (2015). Correlation between physical fitness index (PFI) and body mass index in asymptomatic college girls. *Journal of Exercise Science and*

Physiotherapy, 11(2), 129.

- Arifandy, Achmad, Eko Hariyanto, and Usman Wahyudi. "Survei tingkat kebugaran jasmani siswa SMP." *Sport Science and Health* 3.5 (2021): 218- 234
- Armade, M., & Manurizal, L. (2020). Tingkat Kebugaran Jasmani Peserta Didik yang Aktif Mengikuti Senam Kebugaran Jasmani Indonesia Bersatu (SKJ 2018) Di MTs Swasta Menaming Kecamatan Rambah. *Journal Of Sport Education and Training*, 1(2), 44-52.
- Bahari, F., Hanief, Y. N., & Junaedi, S. (2020). Analisis Tingkat Kebugaran Jasmani Siswa Kelas Atas Ditinjau Dari Keikutsertaan Dalam Ekstrakurikuler. *Jendela Olahraga*, 5(2), 89-97. ISSN: 2579-7662.
- Herlan, H., Nurwansyah, R., & Julianti, R. R. (2021). Tingkat Kebugaran Jasmani Siswa Ekstrakurikuler Olahraga Di SMA Negeri 1 Surade. *Jurnal Literasi Olahraga*, 2(1), 38-42. ISSN 2745-53994.
- Ilyas, I., & Almunawar, A. (2020). Profil kebugaran jasmani siswa ekstrakurikuler bola voli. *Jurnal*
- Ilyas, I., & Almunawar, A. (2020). Profil kebugaran jasmani siswa ekstrakurikuler bola voli. *Jurnal Olahraga dan Kesehatan Indonesia (JOKI)*, 1(1), 37-45. ISSN: 2747-061X.
- Iskandar, T., & Rahman, F. (2018). Pengaruh Metode Latihan Hand Grip terhadap Kekuatan Genggaman Tangan pada Atlet Putra Pelatcab Petanque Kota Bekasi. *Motion: Jurnal Riset Physical Education*, 9(2), 140-145.
- Indrawati., Maryatun., Purwaningsih, W., Andriani, A., & Siswanto. (2020) Penerapan Metode Penelitian Dalam Praktik Keperawatan Komunitas Lengkap Dengan Contoh Proposal. Surakarta: Indotama Solo
- Kardianto, Kardianto, Rizki Aminudin, and Deden Akbar Izzuddin. "Tingkat Kebugaran Jasmani Peserta Ekstrakurikuler Olahraga Di Sman 1 Cariu." *Jurnal Kependidikan Jasmani Dan Olahraga* 1.1(2020): 28-37.
- Keliat, P., Lubis, A. E., & Helmi, B. (2019). Profil Tingkat Kebugaran Jasmani Dan Kecukupan Gizi. *Jurnal Ilmiah STOK Bina Guna Medan*, 7(2), 46- 54.
- Mahfud, I., Gumantan, A., & Nugroho, R. A. (2020). Pelatihan Pembinaan Kebugaran Jasmani Peserta Ekstrakurikuler Olahraga. *Wahana Dedikasi: Jurnal PkM Ilmu Kependidikan*, 3(1), 56-61.
- Narlan, D. & Juniar, D.T. (2020). Pengukuran dan Evaluasi Olahraga. Yogyakarta: CV. Budi Utama. ISBN:978-623-02-1670-1.
- Nalendra, A. R. A., Rosalina, Y., Priadi, A., Subroto, I., Rahayuningsih, R., Lestari, R., Kusamandari, S., Yuliasari, R., Astuti, D.,
- latumahina, J., Purnomo, M. W., & Zede, V. A. (2021). Statistika Seri Dasar dengan SPSS. Bandung: media Sains Indonesia Olahraga dan Kesehatan Indonesia (JOKI), 1(1), 37-45. ISSN: 2747- 061X.
- Prakoso, D. P., & Hartoto, S. (2015). Pengukuran Tingkat Kebugaran Jasmani Terhadap Siswa Yang Mengikuti Ekstrakurikuler Bolavoli di SMS DR Soetomo Surabaya. *Jurnal Pendidikan Olahraga Dan Kesehatan*, 3(1), 9-13.

- Ramadana, P., Nirwandi, N., Damrah, D., & Igoresky, A. (2023). Tinjauan Tingkat Kebugaran Jasmani Gugus Depan 08.089-08.090 Madrasah Tsanawiyah Negeri 4 Kota Padang. *Jurnal JPDO*, 6(3), 163-169.
- Shomoro, Degele dan Mondal. 2014. *Spectrum International Journal of Humanities: Comparative Relationships of Selected Physical Fitness Variables among Different Colleges*. Vol. (1), No.II ISSN 2321-6808.
- Sinuraya, J. (2020). Tingkat Kebugaran Jasmani Mahasiswa Pendidikan Olahraga Universitas Quality Berastagi. *Kinestetik*, 4 (1), 26.
- Putra, M. A., & Sinurat, R. (2025). Survey Tingkat Status Gizi Siswa Ekstrakurikuler Sepak Bola Di SMA Negeri 3 Tambusai. *Jurnal Pendidikan Jasmani, Kesehatan, dan Rekreasi*, 3(1), 49-59.
- Sugiyono. (2018). *Metode Penelitian Kuantitatif, Kualitatif, dan R&D*. Bandung: ALFABETA.
- Ulango, A. P., Bakhtiar, S., Jonni, J., & Wulandari, I. (2023). Tinjauan Tingkat Kebugaran Jasmani Terhadap Peserta Didik Ekstrakurikuler Olahraga SMP Negeri 30 Padang. *Jurnal JPDO*, 6(9), 172-180. ISSN 2654-8887.
- Vivian H. Heyward. (2016). Aerobic Capacity, Physical Fitness and V02 Maxium Measurement. *Advance Fitness Assessment & Exercise Prescription*, 805, 2-5. <http://www.biopac.com/wpcontent/uploads/app252.pdf>
- Wardhani, R. M. K., Utomo, A. W. B., & Wahyudi, A. N. (2022). Tingkat Kebugaran Jasmani Siswa Ekstrakurikuler Taekwondo di SMK Negeri 2 Ngawi. *Dharmas Journal of Sport*, 2(2), 41-49. ISSN: 2798-8325.
- Widiastuti. (2015). *Tes dan Pengukuran dalam Olahraga*. Jakarta: PT RajaGrafindo.