

# Integration of Sports Training and Small Games to Improve the Profile of Pancasila Students

Wawan Junresti Daya\*, Ilham, Reza Hadinata, Ugi Nugraha, Alek Oktadinata, Yusradinafi

Master of Physical Education Study Program, Faculty of Teacher Training and Education, Universitas Jambi, Indonesia

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**Abstract** This research aimed to thoroughly investigate the paradigm shift in sports from a focus on athletic achievement to its potential as a vehicle for promoting societal development. It also aims to show how sports activities can be strategically integrated to cultivate and reinforce the core values outlined in the Pancasila Student Profile, as mandated within the framework of the Indonesian Independent Curriculum. This study aims to critically investigate the paradigm shift in sports from a focus on athletic achievement to its potential as a vehicle for promoting broader societal development. It seeks to demonstrate how structured sports activities can be strategically integrated to cultivate and reinforce the core values articulated in the Pancasila Student Profile, as mandated within the framework of the Indonesian Independent Curriculum. Accordingly, this investigation is considered to be of significant importance, as sports have increasingly been recognized globally as an effective medium for shaping positive character traits in children. Considering this understanding, it becomes necessary to conduct an experimental trial to assess its relevance to the development of Pancasila Student Profile values among elementary school students in Jambi City. In order to achieve the stated objective, a quantitative research method with a one-group pretest posttest experiment design was adopted. The hypothesis posited was that the integration of sports training and small games significantly enhanced the values embodied in the Pancasila Student Profile. Moreover, the data collection instruments included a questionnaire centered on critical thinking for elementary school students, namely the Student Creativity Survey 2.0,

and a questionnaire measuring the learning independence of the students. The research results showed that the integration of sports training and small games in education significantly improved the three main competencies of the Pancasila Student Profile, namely independence, critical thinking ability, and creativity. Through engagement in games that require independent decision-making, critical analysis, and creative improvisation, students can be instilled with the capability to develop competencies in a balanced and comprehensive manner, in accordance with the broader educational goals rooted in Pancasila values.

**Keywords** Integration, Sports Training, Small Games, Pancasila Student Profile

## **1. Introduction**

Globally, sports scholars and academics have been observed to be increasingly drawn to the examination of the contribution of sports to human resource development values. However, there has been a very significant shift in the perception of sport activities from focusing solely on sports outcomes to emphasizing broader societal development outcomes. This shift is a significant transition from the mere development of sport to the use of Sport for Development (SFD), or more precisely, development through sport [1]. Furthermore, the shift shows that sports are no longer perceived merely as activities aimed at achieving athletic success, but more expansively, as

instruments for nurturing national growth and state-building.

In the current age, sports for development programs are being increasingly advanced to foster group solidarity, promote social cohesion, and empower communities, particularly those experiencing division. These programs also contribute significantly to the development of the younger generation [2], through the facilitation of social inclusion [3], promotion of national branding, and poverty alleviation [4]. Furthermore, Sport for Development (SFD) initiatives generally serve as a strategic framework for investigating sports programs. This framework effectively guides the measurement and understanding of the direct and sustainable social impacts of sports within communities.

On a global scale, sports have been actively seen as a medium of advancing the 17 Sustainable Development Goals (SDGs) set by the United Nations (UN) for the 2015–2030 period. These activities have also been reported to play a very substantial role in progressing SDGs across multiple levels. For instance, the sports ecosystem has acted as a catalyst for change in initiatives introduced with the primary aim of strengthening national unity in Spain, while the South Korean government has implemented sports-based development programs as a strategic vehicle to propel the nation toward full development [5].

Considering the findings made, it becomes appropriate for Indonesia, as a developing country, to prioritize and integrate sports into the mainstream of its development agenda. This strategic move would help to prevent further lagging developed countries and address various societal challenges through government-led sports programs grounded in the sport-for-development paradigm, particularly those specifically organized with the primary aim of fostering a positive younger generation. Among the 17 Sustainable Development Goals (SDGs) launched by the UN, goal 4 specifically emphasizes the importance of quality education. In this context, it becomes very appropriate for the government to prioritize inclusive and equitable quality education while promoting lifelong learning opportunities for all. Within the educational sphere, participation in sports holds significant potential to enhance learning outcomes by improving academic performance, leadership skills, as well as concentration and focus [6]. Moreover, sports-oriented programs have been reported to offer pathways for acquiring educational experiences and life skills that extend beyond the classroom into professional environments [7].

According to previous research, sports, physical education, play, and physical activity could motivate children and adolescents to attend school and engage in both formal and informal education [8]. In response to these needs, the Government of Indonesia introduced the "Freedom of Learning" (Merdeka Belajar) program through the Independent Curriculum. This curriculum emphasizes the development of students' character and social competencies, the provision of essential resources,

and the development of a flexible learning environment. Considering that the Independent Curriculum prioritizes character formation and the cultivation of soft skills, it would be highly appropriate to integrate learning activities with sports programs. These activities have been shown to be very effective in fostering positive youth character development.

The Pancasila Student Profile constitutes a very significant feature of learning outcomes within the Independent Curriculum. It serves as a primary tool for guiding educational policy and assisting teachers in nurturing both the skills and character development of students. As a result, all stakeholders are expected to be familiar with the Pancasila Student Profile. The Profile comprises six dimensions namely (1) faith, reverence for God Almighty, and moral integrity, (2) self-reliance, (3) collaboration, (4) global diversity, (5) critical thinking, and (6) inventiveness [9].

In the context of Physical Education, Sports, and Health (PJOK), the government, specifically through the Ministry of Education and Culture, places considerable emphasis on the effective implementation of PJOK learning in schools. Implicitly, the activities embodied in this concept are considered activities that comprise all aspects of human development, not merely the physical. This comprehensive view is closely in line with the dimensions of the Pancasila Student Profile, which include devotion to God Almighty, creativity, collaboration, global diversity, critical thinking, and independence.

Contextually, the implementation of PJOK learning in elementary schools in Jambi City has not shown optimal efforts toward achieving national education goals. This is evidenced by the observations made and interviews conducted in previous research, where it was found that teachers often failed to deliver well-planned learning activities. Furthermore, some educators were observed to still assume that learning outcomes associated with strengthening the dimensions of the Pancasila Student Profile will naturally be achieved without targeted efforts. These assumptions are in misalignment with established educational theories.

Based on the above description, this research aims to rigorously examine and verify the extent to which an intentionally planned and integrated sports training program, incorporating small games, can enhance the development of the Pancasila Student Profile among elementary school students.

## 2. Methods

The current research was carried out using a quantitative method with an experimental design. Generally, experimental research is considered among the most powerful methodological approaches, renowned for its ability to establish causal relationships between variables [10]. It is widely recognized as the most effective research

type for testing cause-and-effect connections. Based on these perceptions, the experimental design approach was considered highly appropriate for examining whether the integration of sports training and small games could enhance the Pancasila Student Profile. Accordingly, within the context of this experiment, a one-group pretest-posttest design was utilized, following the plans presented in Table 1.

**Table 1.** Study Design

<i>O</i>	<i>X</i>	<i>O</i>
<i>Pretest</i>	<i>Treatment</i>	<i>Posttest</i>

During the course of this experimental research, the samples first carried out an initial test to assess the baseline condition of the respective Pancasila Student Profile. Subsequently, the demographic received treatment through the integration of sports training and small games over the course of 12 to 16 meetings. In the final stage, the samples were administered a posttest to evaluate improvements across several elements of the Pancasila Student Profile.

## 2.1. Participants

### 2.1.1. Research Population

A research population refers to the larger group to which the research results are intended to be applied [10]. For this investigation, the population comprised all students of Elementary School 151/IV located in Jambi City, totaling 430 individuals.

### 2.1.2. Research Sample

A research sample represents a subset of a research population, selected based on specific characteristics. The sampling method adopted for the exploration was the stratified random sampling technique, where samples were taken randomly but within designated strata [10]. A total of 32 students from grades 4 and 5 of Elementary School 151/IV Jambi City participated as the research sample.

## 2.2. Research Instrument

In this research, the instrument used to measure the level of the Pancasila Student Profile was a questionnaire based on a Likert scale. For the critical thinking dimension, the measuring tool adopted was a critical thinking test instrument for elementary school children developed by Wahyu Indra Bayu [11]. In order to assess the creative dimension of students, the Student Creativity Survey 2.0 developed by Better Lesson, which measures Student Creativity, including Perceptions and Behaviors, was utilized. Meanwhile, to evaluate the dimension of student independence, the instrument used was a student learning independence questionnaire developed by Kana Hidayati and Endang Listiyani.

## 2.3. Data Analysis

The data analysis technique in this research uses an Independent T-test test processed using Jamivo software.

## 3. Results

The present research was conducted with 32 students over 16 meetings at Elementary School 151/IV Jambi City from May to October 2024. Data were collected through a questionnaire using a Likert scale. For the critical thinking dimension, the measuring tool used was a critical thinking test instrument for elementary school children developed by Wahyu Indra Bayu. Accordingly, to measure the dimension of student independence, the instrument used was the Student Creativity Survey 2.0; Measuring Student Creativity: Perceptions and Behaviors developed by Better Lesson. To measure the dimension of student independence, the instrument adopted was the student learning independence questionnaire developed by Kana Hidayati Endang Listiyani. Table 2 presents the results of the Integration of Sports Training and Small Games to Improve the Pancasila Students Profile.

**Table 2.** Data Descriptive

	<i>N</i>	<i>Mean</i>	<i>SD</i>	<i>Shapiro-Wilk</i>	
				<i>W</i>	<i>p</i>
Post Indf	32	123.04	0.44	0.990*	0.988*
Pre Indf	32	115.05	11.18	0.949*	0.135*
Post Crea	32	67.9	3.89	0.958*	0.246*
Pre Crea	32	64.9	5.98	0.918*	0.246*
Post CT	32	40.00	0.089	0.954*	0.193*
Pre CT	32	34.04	3.33	0.938*	0.064*

\* the assumption of normality is accepted (Shapiro-Wilk *W* / Shapiro-Wilk *p* test, *p* > 0.05)

The results of the normality test analysis (descriptive data table) conducted using the Shapiro-Wilk test (*W/P*) for three variables namely independence, creativity, and critical thinking, through the Jamivo application, showed that all data groups were normally distributed. This was evidenced by the obtained *p*-values (Shapiro-Wilk *W/P*), which were greater than 0.05. Subsequently, hypothesis testing was carried out using the Paired Sample T-test analysis technique, also with the Jamivo application. The findings reflected that 1) in the independence group, a *p*-value of <0.001 was obtained, 2) in the creativity group, a *p*-value of 0.005 was recorded, and 3) within the critical thinking group, a *p*-value of <0.001 was achieved. Based on these results, the null hypothesis (*H*<sub>0</sub>) for all three hypotheses was rejected.

### 3.1. Dimension of Independence

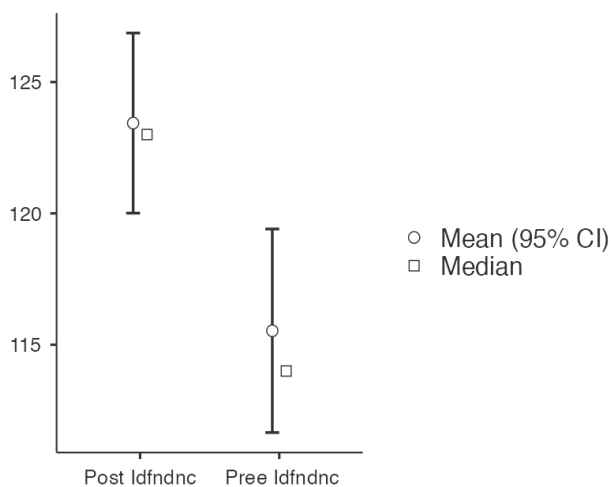
The results of the data analysis showed that the average score for the independence dimension of the Pancasila Student Profile among elementary school students increased significantly. This increase was observed after the student's received treatment through the integration of sports training models and small games.

**Table 3.** Independence T-test

		Statistic	df	P
Post Independence	Pre Indf	0.36	31.00	<.001
Post Creativity	Pre Crea	3.02	31.00	0.005
Post Critical Thinking	Pre CT	10.35	31.00	<.001

Note.  $H_a \mu \text{ Measure 1} - \text{Measure 2} \neq 0$

Based on the research findings, the pretest and posttest results for the Pancasila Student Profile in the independence dimension are presented in Figure 1. The posttest group achieved an average score of 123.04 (SD = 0.44), while the pretest group recorded an average score of 115.05 (SD = 11.18). Subsequently, using the Independent T-test, a significant difference was found between the posttest and pretest results, with a p-value of <0.001.



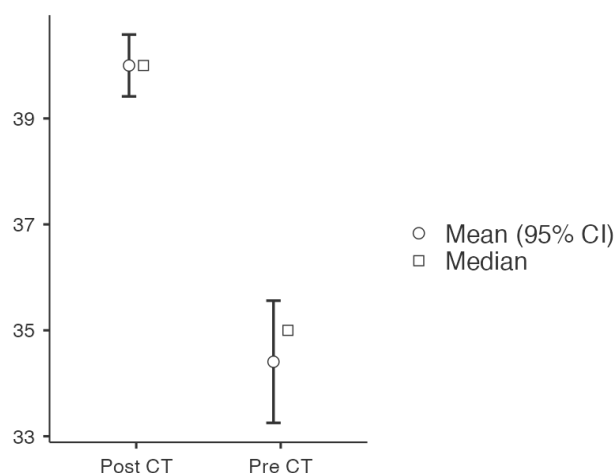
**Figure 1.** Average Pretest-Posttest Independence Data

### 3.2. Critical Thinking Dimension

The results of the independent test on the critical thinking dimension of the Pancasila Student Profile showed a significant improvement in the critical thinking skills of the students. This was achieved following the integration of the sports training model and small games.

The data analysis conducted showed a significant increase in the average score of the Pancasila Student

Profile in critical thinking skills. This was evidenced by the obtained pretest and posttest results for the critical thinking dimension of the Pancasila Student Profile, which are presented in the following percentage graph. The results of the independent test on the critical thinking dimension showed a significant improvement in students' critical thinking skills after being exposed to the integration of the sports training model and small games. Specifically, the analysis reflected a significant increase in the average critical thinking scores (Average Posttest =  $40 \pm 0.089$ ; Average Pretest =  $34.04 \pm 3.33$ ), and the independent T-test results showed a p-value of <0.001. The pretest and posttest results for critical thinking are presented in Figure 2.

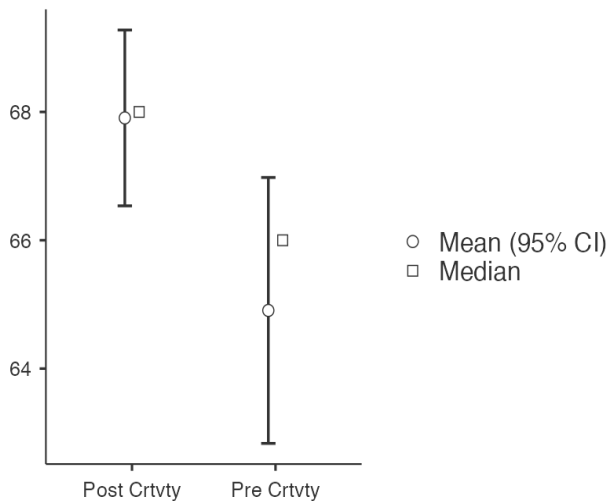


**Figure 2.** Average Pretest-Posttest Critical Thinking Data

### 3.3. Dimension of Creativity

The results of the data analysis showed that the average Pancasila Student's Profile in creativity increased significantly after being treated with the integration of sports training models and small games in elementary school students. Based on the research findings, the pretest and posttest results for the creativity dimension of the Pancasila Student Profile are presented in the following percentage chart.

The results of the independent trial on the creativity dimension showed a significant increase in the creativity skills of the observed students after being exposed to sports training models and small games. The analysis conducted in this regard reflected a significant rise in the average score of the Pancasila Student Profile for creativity skills (Average Posttest =  $67.9 \pm 3.89$ ; Average Pretest =  $64.9 \pm 3.89$ ), with the independent T-test producing a p-value of 0.005. The pretest and posttest results for the creativity dimension of the Pancasila Student Profile are presented in Figure 3.



**Figure 3.** Average Pretest-Posttest Creativity Data

## 4. Discussion

In physical education, the integration of sports exercises and small games has been observed to play a significant role in developing the Pancasila Student Profile, particularly in promoting independence, critical thinking, and creativity. Several factors explain why this integration effectively supports the achievement of these competencies.

### 4.1. Independence

Students are taught to take initiative and responsibility for respective selves through exercise sports and small games. Through these activities, the demographic is motivated to build strategies, recognize inherent strengths and weaknesses, and independently solve problems encountered in the field. For example, when playing small games such as the Odd and Even Number Game or Tom and Jerry Version 1, students must decide when to act and how to adjust respectively crafted strategies during the game. According to earlier research, students' independence and cognitive function are significantly improved by physical activity [12]. The integration of small-sided games into physical education classes has been reported to significantly improve the motor abilities of students [13]. Furthermore, supporting student autonomy in physical education has been proven to enhance the demographic's intentions to remain physically active [14].

### 4.2. Critical Thinking

Small games often include unexpected situations that require students to quickly analyze and assess the situation. The players must make strategic decisions swiftly, evaluate the game conditions, and predict the movements of respective opponents. Considering this context, students are required to disseminate information and apply the right strategies in real-time [15], the process significantly

enhances critical thinking skills. Game-based physical education programs typically increase enjoyment and engagement, which indirectly contributes to improve critical thinking, as students invariably become more invested in the learning process [16]. Moreover, students' participation in games that demand quick decision-making increases the critical thinking skills of the demographic by providing training on how to quickly consider multiple options before acting. As reported in previous studies, strong cognitive function is often associated with physical activity [17].

### 4.3. Creativity

In small games, there is often no single correct strategy. Students are motivated to improvise and explore new approaches to solving problems. During these games, creativity is demonstrated in cases where students must find innovative ways to avoid defeat, score goals, or navigate physical limitations and the rules of the game. Activities that use game activities, movement learning, and outdoor activities, emerge as catalysts to enrich critical thinking experiences for students. Critical thinking skills are identical to the ability to solve problems effectively [18]. Moreover, the benefits of game-based learning and gamification in physical education are well-documented, with these approaches significantly enhancing creative thinking and problem-solving skills [19].

## 5. Conclusions

In conclusion, the integration of sports training and small games into education was observed to possess the capability to improve the three main competencies of the Pancasila Student Profile, namely independence, critical thinking skills, and creativity. The obtained results showed how engaging students in games requiring independent decision-making, critical analysis, and creative improvisation, led to the comprehensive development of relevant competencies that are in accordance with the goals rooted in Pancasila values.

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