



Analysis of Student Interest in Natural and Social Sciences Integration Learning (IPAS): Study of Grade IV Students at SDN 8 North Metro

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Abstract

This research investigated the engagement of fourth-grade students in Integrated Science and Social Studies (IPAS) learning at SDN 5 North Metro. Findings revealed that a significant majority of students (21 out of 25) exhibited high levels of engagement, characterized by enthusiastic participation, focused attention, and a strong desire to learn. These students demonstrated resilience in overcoming challenges, actively sought clarification, and displayed positive learning habits. The teacher played a crucial role in fostering student engagement through the implementation of diverse and engaging instructional strategies, including creative learning activities and a well-structured reward system. However, a small subset of students (4 out of 25) displayed lower levels of engagement, struggling with complex concepts and finding IPAS learning less interesting. This research highlights the importance of creating a dynamic and inclusive learning environment that caters to the diverse needs and learning styles of all students. Strategies such as connecting abstract concepts to real-world applications and incorporating more flexible learning approaches are crucial to enhance the engagement and understanding of all students in IPAS learning.

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INTRODUCTION

Education plays a vital and fundamental role in molding both the intellectual capacity and moral character of a nation. As a cornerstone of development, a high-quality education system extends far beyond merely educating society in academic matters. It serves as a crucial instrument in cultivating human resources who embody positive values, demonstrate exemplary attitudes, and exhibit constructive behaviors. This character formation becomes increasingly significant given the mounting complexities of global challenges.

In alignment with the educational demands of the 21st century, there is a pressing need for an education system capable of nurturing students' full spectrum of potential in a holistic and comprehensive manner. This encompasses the development of cognitive abilities, emotional intelligence, and practical skills, while simultaneously providing space for students to explore their interests and talents to their maximum capacity. Modern educational systems must facilitate the development of diverse competencies, ranging from critical thinking and creativity to collaboration and effective communication skills.

In the learning process, educational interest plays a pivotal and determinative role in student achievement. Interest represents an internal driving force that emerges from within an individual, generating personal satisfaction, heightened enthusiasm, and a powerful desire for particular subjects or activities. When students possess a strong interest in a subject or field of study, this manifests itself through various positive aspects of their learning behavior.

Students with high learning interest typically demonstrate distinctive characteristics compared to their peers. They tend to exhibit extraordinary enthusiasm in participating in learning activities, display intensified attention to the material being presented, and demonstrate remarkable consistency in following the learning process. This enthusiasm often manifests through active classroom participation, timely completion of assignments, and initiative in seeking additional information beyond what teachers provide.

Conversely, the absence of interest in the learning process can pose a serious impediment to achieving optimal learning outcomes. Without interest, students are prone to becoming passive, easily bored, and lacking motivation to delve deeper into learning materials. This can result in poor understanding of subjects, declining academic performance, and may even lead to failure in achieving established learning objectives. Therefore, the cultivation and maintenance of learning interest become paramount aspects of modern educational systems, serving as essential catalysts for academic success and personal development.

Furthermore, students who demonstrate high learning interest often show greater resilience when facing academic challenges, maintain better long-term retention of information, and develop stronger problem-solving abilities. They are more likely to engage in self-directed learning, seek out additional resources, and participate in educational activities beyond the standard curriculum. This intrinsic motivation, driven by genuine interest, creates a sustainable foundation for lifelong learning and continuous personal growth.

The Merdeka Curriculum represents a transformative shift in Indonesia's elementary education system, introducing substantial modifications to traditional learning approaches. One of its most notable innovations is the strategic integration of Natural Science and Social Science subjects into a unified course known as IPAS (Natural and Social Sciences Integration). This integration reflects a modern educational philosophy that recognizes the interconnected nature of scientific and social phenomena in the real world.

IPAS has been thoughtfully designed as a comprehensive and integrated learning approach with multiple objectives. At its core, it aims to cultivate students' critical thinking abilities, enabling them to analyze complex problems from both scientific and social perspectives. The curriculum emphasizes rational thinking development, encouraging students to make logical connections between natural phenomena and social contexts. Furthermore, it prioritizes experiential learning by providing students with direct, hands-on experiences that bridge theoretical knowledge with practical applications. This approach makes learning more meaningful and relevant to students' lives.

What makes IPAS particularly engaging is its strong connection to students' everyday experiences and real-world context. The curriculum materials are carefully selected and

presented in ways that resonate with students' daily lives, making abstract concepts more concrete and understandable. This relevance helps students recognize the practical applications of their learning and understand how natural and social sciences interact in their immediate environment.

SDN 8 North Metro stands as one of the pioneering institutions implementing the Merdeka Curriculum, particularly focusing on the integration of IPAS learning at the elementary level. However, the implementation of this innovative curriculum brings both opportunities and challenges. The effectiveness of IPAS learning is significantly influenced by students' learning interest and engagement. This relationship between student interest and learning outcomes becomes crucial in determining the success of the integrated curriculum approach.

The importance of student interest in IPAS learning cannot be overstated, particularly in grade 4, where students begin to develop more complex understanding of their world. At this critical stage, students' ability to grasp integrated concepts and their willingness to engage with the material can significantly impact their overall learning experience. Therefore, a comprehensive analysis of students' learning interest becomes essential to understand not only their current level of engagement but also the various factors that influence their interest in the subject.

This context has prompted the researcher to undertake a detailed investigation through a study titled "Analysis of Student Interest in Natural and Social Sciences Integration Learning (IPAS): Study of Class IV Students at SDN 8 North Metro." This research aims to examine multiple dimensions of student interest, including their motivation levels, engagement patterns, and responses to different aspects of IPAS learning. The study will explore both internal factors (such as personal preferences and learning styles) and external factors (such as teaching methods, learning environment, and curriculum design) that influence student interest.

The anticipated outcomes of this research are expected to serve multiple purposes. Firstly, it aims to provide a detailed and comprehensive picture of students' learning interest in IPAS, offering insights into their engagement levels and learning preferences. Secondly, the findings will serve as a valuable reference point for educators and curriculum developers in designing and implementing more effective IPAS learning strategies. Understanding student interest patterns and influential factors will enable teachers to create more engaging and student-centered learning experiences.

Furthermore, this research has broader implications for the implementation of the Merdeka Curriculum as a whole. By analyzing student interest in IPAS learning, the study will contribute to the broader understanding of how integrated curriculum approaches can be optimized to enhance student engagement and learning outcomes. The findings may also inform policy decisions regarding curriculum development and implementation strategies at both the school and regional levels.

Through this comprehensive investigation, educators and stakeholders will be better equipped to address challenges and capitalize on opportunities in IPAS implementation, ultimately working toward the goal of creating more effective and engaging learning experiences for elementary school students.

LITERATUR REVIEW

Education

Education is a crucial aspect that every individual must undergo throughout their life,

and it continues to evolve with time (Ruhardi & Prahastiwi, 2024). In line with this, Putra et al., (2024) emphasizes that education is an effort to advance the growth of character, mind, and body of children as inseparable components to promote the perfection of life. In its process, education proceeds systematically and continuously as a means of human self-development.

This positions education as a philosophical endeavor in humanizing humans through various planned learning activities, which not only encompasses knowledge transfer but also includes character formation, skill development, and the cultivation of life values. As stated by Khasanah & Muthali'in (2023), education encompasses all learning experiences that take place in all environments throughout life, influencing individual growth and development.

Furthermore, education can be viewed as a comprehensive transformation process, incorporating knowledge, values, and skills that continue throughout life. In this process, there occurs a dynamic interaction between educators and students aimed at optimizing all potential possessed. This aligns with Alfarisi, (2024) perspective, which states that education is a process of influencing students to adapt to their environment, thereby inducing changes within themselves that enable them to function optimally in society.

Personality formation aspects become an integral part of education, which includes the development of ways of thinking, behaving, and acting in accordance with societal norms. According to Ramdhani et al., (2023), education is a process of changing student behavior to become independent adults capable of living autonomously and as members of society within their surrounding natural environment.

Education also plays a vital role as a vehicle for individual empowerment in developing their talents, interests, and abilities. Through this process, one is not only equipped with knowledge and technical skills but also develops social, emotional, and spiritual capabilities. All these aspects are necessary for every individual to actively participate and lead a meaningful life in society. As expressed by Nasarudin (2024), education functions to develop what students potentially and actually possess, as students are not empty vessels that must be filled from the outside.

IPAS

IPAS (Natural and Social Sciences Integration) is a learning approach that integrates Natural Sciences and Social Sciences into a comprehensive learning unity. This integration reflects the need for a holistic understanding of interconnected natural and social phenomena in daily life (Alfatonah et al., 2023; Ilham et al., 2024). IPAS learning enables students to understand the complexity of relationships between scientific aspects and social dynamics in modern society (Agustina et al., 2022; Renggani & Priyanto, 2023).

In its implementation, IPAS demonstrates a sophisticated approach that goes far beyond the simple combination of two distinct subjects. Instead, it represents a carefully crafted educational framework that creates meaningful learning experiences through a thematic-integrative approach. This integration process is methodically designed to weave together natural and social science concepts in a way that helps students understand their interconnectedness and real-world applications. The thematic-integrative approach allows students to explore topics from multiple perspectives, creating a rich tapestry of knowledge that bridges theoretical understanding with practical application.

As expressed by Alfatonah (2023), "IPAS provides students with opportunities to understand how natural phenomena interact with social community life, creating a deeper understanding of the world around them." This fundamental principle guides the implementation of IPAS, emphasizing the importance of helping students recognize and comprehend the complex relationships between natural phenomena and social dynamics.

Through this integrated understanding, students develop a more nuanced perspective of how scientific principles manifest in their community and how social factors influence environmental interactions.

This is reinforced by research from Budiwati (2023), which demonstrates that the IPAS approach enhances the relevance of learning to students' real-life experiences. This research-backed finding highlights how the integrated approach helps students connect classroom learning with their daily observations and experiences. By establishing these clear connections between academic content and real-world applications, IPAS creates a more engaging and meaningful learning environment where students can see the immediate relevance of their studies.

The thematic-integrative approach employed in IPAS facilitates a deeper understanding by presenting concepts in context rather than in isolation. Students learn to analyze situations from both natural science and social science perspectives simultaneously, developing a more holistic view of the world. This integrated approach helps students recognize patterns and connections across different areas of knowledge, fostering critical thinking skills and a more comprehensive understanding of complex phenomena.

Through this carefully structured integration, IPAS creates learning experiences that resonate with students' natural curiosity about the world around them. The approach acknowledges that real-world phenomena rarely exist in isolation and that understanding the interplay between natural and social factors is crucial for developing a complete worldview. This comprehensive approach to learning helps students develop the analytical skills needed to understand and address complex challenges in their communities and beyond.

IPAS learning possesses distinctive characteristics that distinguish it from conventional learning approaches. Research conducted by Budiwati et al., (2023) identifies five main characteristics of IPAS learning. First, learning is holistic, where according to Agustina et al., (2022), "the holistic approach in IPAS enables students to understand phenomena from various complementary perspectives."

The second characteristic is meaningful learning. (Rahmat, 2024) found that when learning concepts are linked to students' life experiences, the levels of understanding and knowledge retention increase significantly. The third characteristic is authentic learning, where according to (Alfarisi, 2024; Mabfiro & Sukmawan, 2024) research, learning based on real situations increases student motivation and engagement in the learning process.

Meanwhile, (Dunn et al., 2011) emphasize the importance of the fourth characteristic, which is active learning, encouraging student participation in constructing their own knowledge. The fifth characteristic is the interdisciplinary nature.

METHOD

This research employs a qualitative method with a descriptive approach. This method selection is based on the research objective to obtain an in-depth and natural understanding of students' learning interest in IPAS learning. Descriptive qualitative research enables researchers to observe and understand phenomena directly by positioning humans as the main instrument in data collection.

This research was conducted at SDN 8 North Metro, focusing on grade 4. The location selection was based on the consideration that this school has implemented IPAS learning according to the Merdeka Curriculum. The research was conducted during the odd semester of the 2024/2025 academic year. The research subjects were 25 fourth-grade students at SDN 8 North Metro and the fourth-grade teacher who teaches IPAS. These subjects were selected to

obtain comprehensive data about learning interest in IPAS learning.

Data collection in this research adopted a triangulation approach to enhance the validity of findings. As explained by (Donkoh, 2023), triangulation is a data collection technique that involves using various methods to confirm research findings. In this study, the researcher combined several data collection techniques: observation, interviews, questionnaires, and documentation. Direct observation allowed the researcher to deeply observe the IPAS learning process and student responses (Alfatonah et al., 2023; Wanti & Chastanti, 2023). In-depth interviews with teachers and students were conducted to gather further information about their learning experiences. Questionnaires were used to quantitatively measure students' learning interest (Apriyanti et al., 2020). Documentation, including lesson plans, learning outcomes, and photographs of learning activities, complemented the data obtained from previous techniques.

Data analysis in this research employed a systematic approach following the comprehensive model developed by Miles and Huberman, which encompasses three distinct yet interconnected stages that form the foundation of qualitative data processing. According to Pahleviannur (2022), data reduction, represents a crucial process where the researcher carefully examines and simplifies extensive raw data collected from various sources into more manageable and meaningful units of information. During this foundational stage, the researcher meticulously performed data coding by identifying recurring patterns, themes, and significant elements within the collected information. This was followed by a thorough categorization process where similar data points were grouped together to create coherent analytical units that could effectively address the research objectives.

The second stage involved the systematic presentation of the reduced data, where the processed information was transformed into accessible formats designed to enhance understanding and facilitate deeper analysis. This stage was characterized by the careful organization of findings into various presentation formats, including detailed narrative descriptions that captured the nuances of the phenomena under study, well-structured tables that organized quantitative and qualitative data in a systematic manner, and informative graphs that provided visual representations of patterns and relationships discovered within the data. These diverse presentation methods were strategically chosen to ensure optimal clarity and comprehension of the research findings.

The final stage of the analysis process focused on the critical task of drawing conclusions through an inductive reasoning approach. This stage involved a careful examination of the patterns and relationships that emerged from the processed and presented data, leading to the development of meaningful insights and conclusions that directly addressed the research questions. The methodological rigor applied throughout these three stages, combined with the implementation of various data collection techniques, established a robust framework for analysis that enhanced the credibility and reliability of the research findings. This comprehensive analytical approach ensured that the conclusions drawn were firmly grounded in the empirical evidence collected during the study, contributing to the overall validity and trustworthiness of the research outcomes. The systematic nature of this analytical process, guided by established methodological principles, strengthened the research's ability to generate meaningful and actionable insights from the collected data findings.

RESULT AND DISCUSSION

Result

Based on the comprehensive research conducted at SDN 5 North Metro, researchers observed distinct patterns in IPAS learning engagement among fourth-grade students. The study, which encompassed a class of 25 students, revealed that a significant majority - specifically 21 students - exhibited remarkably positive attitudes and enthusiasm towards IPAS learning. These students consistently demonstrated engaged behaviors that exemplified their strong interest, including maintaining focused attention during teacher presentations, diligently taking detailed notes, and actively contributing to various classroom learning activities. In contrast, the remaining 4 students displayed noticeably lower levels of learning interest, manifested through their limited attention spans and minimal participation in classroom activities.

The investigation into learning engagement revealed particularly encouraging results among the majority of the student population. Students showed impressive determination and resilience when confronting challenging tasks, persisting in their efforts despite encountering obstacles. A noteworthy observation was the students' proactive approach to learning, demonstrated through their willingness to seek clarification and pose questions when encountering difficulties in comprehending the material. The development of positive learning habits was particularly evident in their approach to homework completion and preparation for subsequent IPAS lessons, with many students displaying admirable self-discipline in managing their academic responsibilities.

The teacher's instrumental role in fostering and enhancing student learning interest emerged as a crucial factor in the study's findings. Through the implementation of diverse and creative instructional strategies, including carefully designed learning competitions at both individual and group levels, the teacher successfully created an engaging learning environment. The strategic use of reward systems, particularly the distribution of tangible rewards to students who demonstrated active participation and correctly answered questions, proved to be an effective motivational tool. The teacher's pedagogical approach was notably constructive, deliberately avoiding intimidating methods and instead emphasizing experiential learning opportunities that resonated with students' natural curiosity and desire to learn.

Nevertheless, the research also uncovered persistent challenges in IPAS learning that warrant attention. A subset of students continued to perceive IPAS as an unengaging subject, primarily due to difficulties in comprehending complex concepts and materials. This perception manifested in observable behaviors, such as limited participation during class discussions and engagement in off-task activities. These students often displayed a tendency to disengage from the learning process, preferring to involve themselves in activities unrelated to the lesson at hand. Such findings underscore the critical importance of developing and implementing more flexible and adaptive learning strategies that can effectively address the diverse learning needs of all students. Particular emphasis should be placed on establishing clear connections between abstract IPAS concepts and practical, real-world applications, thereby enabling students to better appreciate the relevance and utility of IPAS learning in their daily lives. This approach would not only enhance understanding but also potentially increase motivation and engagement among students who currently find the subject challenging or uninteresting.

Discussion

Research findings indicate that the majority of students demonstrate positive learning

interest in IPAS learning, as evidenced by compelling statistical data. Out of 25 students, 21 students (84%) showed high enthusiasm, while 4 students (16%) exhibited relatively low learning interest. This significant proportion of engaged students demonstrates a strong positive reception to the integrated learning approach. This aligns with Slameto (2020) view that learning interest is a persistent tendency to pay attention to and remember several learning activities that someone is interested in, continuously attended to, and accompanied by pleasure. The high percentage of students showing positive interest also supports Sardiman (2016) theory, which suggests that effective learning occurs when students have interest and are actively involved in the learning process.

Student engagement in IPAS learning manifests notably in their persistence in completing assignments, demonstrating a deep commitment to their academic responsibilities. This dedication is consistently observed across various learning activities and assessment tasks. Djamarah (2015) emphasizes that one indicator of learning interest is persistence and tenacity in facing tasks. The students' proactive behavior in confidently asking questions when encountering difficulties demonstrates strong intrinsic motivation, showing their genuine desire to understand and master the subject matter. This aligns with Alfatonah et al., (2023) research, which found that students with high learning interest tend to take initiative in overcoming their learning difficulties.

The teacher's role as a learning facilitator has proven to be crucial in building and maintaining students' learning interest throughout the educational process. Learning strategies implemented by teachers, including carefully designed learning competitions and thoughtfully structured reward systems, have successfully created a conducive learning environment that promotes active participation and enthusiasm. This strategic approach to teaching supports (Afifah et al dan Alfatonah et al., (2023) theory stating that the use of varied learning strategies and positive reinforcement can increase students' learning interest. Similarly, Nur (2019) also emphasizes the importance of constructive and non-intimidating learning approaches in building an enjoyable learning atmosphere.

The high level of student engagement observed in the study manifests in various ways beyond mere classroom participation. Students demonstrate their interest through active discussion participation, thorough completion of assignments, and eager involvement in practical activities. This comprehensive engagement suggests that the integrated approach of IPAS learning effectively captures students' attention and maintains their interest across different learning contexts.

The statistical findings revealing 84% high enthusiasm among students indicate not just numerical success but reflect a deeper transformation in learning attitudes. These students consistently display behaviors associated with high learning interest, such as attentive listening, active note-taking, enthusiastic participation in discussions, and thorough engagement with learning materials. Meanwhile, the 16% showing relatively lower interest provide valuable insights into areas requiring additional attention and potential strategy adjustments.

The observed persistence in task completion among students reveals a strong commitment to learning that extends beyond superficial engagement. Students demonstrate remarkable resilience when facing challenging assignments, showing willingness to invest extra time and effort to achieve mastery. This dedication is particularly evident in their approach to complex problems and long-term projects, where sustained interest and effort are crucial for success.

The effectiveness of the teacher's facilitative role is demonstrated through various successful interventions and teaching strategies. Beyond implementing competitions and

reward systems, teachers have created an environment where students feel safe to express their curiosity, ask questions, and take intellectual risks. This supportive atmosphere has proven instrumental in maintaining high levels of student engagement and promoting positive learning outcomes in IPAS subjects.

The presence of 16% of students showing low learning interest becomes an important note for learning improvement. Difficulties in understanding the material and lack of comprehension about IPAS learning's relevance to daily life are the main factors for low learning interest in this student group. According to Afifah & Putranto (2023), students' understanding of the practical benefits of learning materials greatly influences their learning interest. **This is reinforced by** Ilham et al., dan Mutiara, (2024) research, which found that contextualizing learning materials with daily life can significantly increase students' learning interest.

The research findings also underscore the importance of learning differentiation in accommodating diverse learning needs. Alfarisi (2024) emphasizes that differentiated learning is key to ensuring all students can develop according to their potential. Meanwhile, Malik et al., (2021) adds that meaningful and relevant learning to students' lives can increase their engagement in the learning process.

Based on these research findings, the development of more adaptive and contextual learning strategies has emerged as a critical priority in educational practice. These strategies need to be carefully designed and implemented to enhance learning interest across the entire student population, regardless of their individual differences and learning styles. Adaptive learning approaches allow for flexibility in teaching methods, accommodating various learning paces and preferences, while contextual strategies ensure that the material remains relevant and applicable to students' daily lives. The implementation of such strategies requires careful consideration of student backgrounds, learning capabilities, and environmental factors to create an inclusive learning environment that stimulates interest across diverse student groups.

This strategic approach to learning development directly aligns with the learning concept embedded within the Merdeka Curriculum, which emphasizes meaningful learning oriented toward holistic student competency development (Utari & Muadin, 2023). This curriculum framework recognizes that true educational success extends beyond mere academic achievement, encompassing the development of critical thinking skills, emotional intelligence, social competence, and practical life skills. The emphasis on meaningful learning ensures that students not only acquire knowledge but also understand its relevance and application in real-world contexts, thereby fostering deeper engagement and sustained interest in their educational journey.

The integration of real experiences in IPAS learning, as suggested by (Budiwati et al., 2023), can be a solution to improve students' understanding and learning interest in this subject. This approach involves incorporating authentic, hands-on experiences that bridge the gap between theoretical knowledge and practical application. By bringing real-world scenarios into the classroom, students can better grasp the interconnectedness of natural and social sciences while developing a genuine interest in the subject matter. These experiential learning opportunities allow students to observe, explore, and analyze phenomena firsthand, making the learning process more engaging and memorable. Such integration helps students see the direct relevance of their studies to their daily lives and future careers, thereby enhancing their motivation to learn and participate actively in classroom activities.

The implementation of real experiences in learning extends beyond simple demonstrations or experiments. It involves creating comprehensive learning environments where students can actively participate in problem-solving activities, conduct investigations,

and engage in collaborative projects that mirror real-world situations. This approach helps develop not only subject-specific knowledge but also essential life skills such as critical thinking, teamwork, and practical problem-solving abilities. Through these integrated experiences, students can better understand the practical applications of their learning, leading to increased engagement and sustained interest in the subject matter.

CONCLUSION

Based on the research on the analysis of students' learning interest in IPAS learning (Integrated Science and Social Studies) in grade 4 of SDN 5 North Metro, it can be concluded that students showed varying levels of learning interest in IPAS learning. The majority of students (84%) demonstrated positive learning interest, characterized by high enthusiasm, active participation in learning, and persistence in completing assignments, while a small number of students (16%) showed relatively low learning interest. The teacher's role in developing students' learning interest was significant through the implementation of various creative learning strategies, reward systems, and constructive approaches that supported the creation of a conducive learning environment. Nevertheless, challenges remained in the form of some students' difficulties in understanding the material and relating it to daily life contexts. This research provides important contributions to the development of IPAS learning strategies in elementary schools by identifying factors that influence students' learning interest and offering insights into the importance of learning differentiation and material contextualization in increasing students' learning interest.

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